

Universidad de Huelva

Departamento de Sociología y Trabajo Social



The social capital applied to cross-border cooperation in the cross-border regions of Alentejo-Algarve-Andalucía and southern Finland-Estonia

**Memoria para optar al grado de doctora
presentada por:**

Teresa González Gómez

Fecha de lectura: 18 de julio de 2014

Bajo la dirección de la doctora:

Estrella Gualda Caballero

Huelva, 2014





**Doctorate Official Programme in Globalization and Social Change: Inequalities,
Borders and Social Networks**

UNIVERSITY OF HUELVA

DOCTORAL THESIS

**THE SOCIAL CAPITAL APPLIED TO CROSS-BORDER
COOPERATION IN THE CROSS-BORDER REGIONS OF
ALENTEJO-ALGARVE-ANDALUCÍA
AND SOUTHERN FINLAND-ESTONIA.**

TERESA GONZÁLEZ GÓMEZ

Huelva, 2014



**PROGRAMA OFICIAL DE DOCTORADO EN GLOBALIZACIÓN Y CAMBIO SOCIAL:
DESIGUALDADES, FRONTERAS Y REDES SOCIALES**

UNIVERSIDAD DE HUELVA

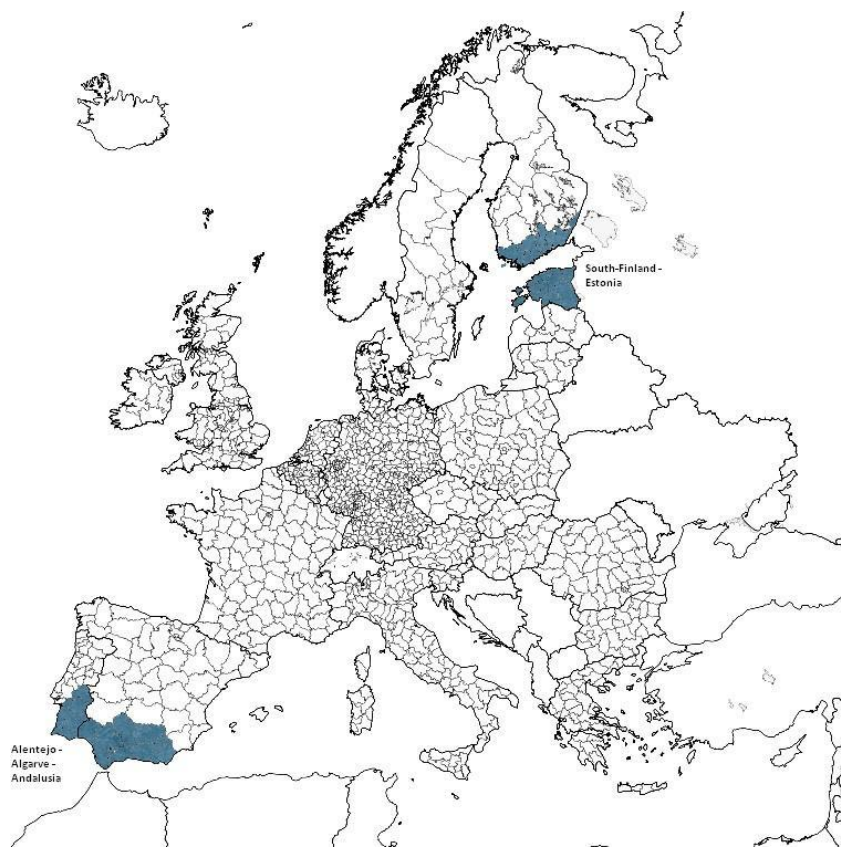
TESIS DOCTORAL

**EL CAPITAL SOCIAL APLICADO A LA COOPERACIÓN
TRANSFRONTERIZA EN LAS REGIONES FRONTERIZAS DE
ALENTEJO-ALGARVE-ANDALUCÍA Y
SUR DE FINLANDIA-ESTONIA.**

TERESA GONZÁLEZ GÓMEZ

Huelva, 2014

DOCTORAL THESIS



THE SOCIAL CAPITAL APPLIED TO CROSS-BORDER COOPERATION IN THE CROSS-BORDER REGIONS OF ALENTEJO-ALGARVE-ANDALUCÍA AND SOUTHERN FINLAND-ESTONIA.

TERESA GONZÁLEZ GÓMEZ

Supervised by: ESTRELLA GUALDA CABALLERO

**Doctorate Official Programme in Globalization and Social
Change: Inequalities, Borders and Social Networks**

Department of Sociology and Social Work

University of Huelva.

A mis padres, que les debo mis primeros
pasos en la vida. Espero con este trabajo
hacerlos sentir orgullosos y haber aprendido de
vuestro esfuerzo de artesanos.

A mi compañero Marti y a mi hermana
Elvira, por acompañarme en este largo camino,
inseparables. Mi esfuerzo ha sido también el de
ellos.

A mi hija Martina y mi sobrino Guille.
Por el tiempo entrecruzado que he pasado
entre ellos y estas hojas, y porque me han
animado en el camino que quiero seguir
construyendo.

AGRADECIMIENTOS

En primer lugar he de agradecer al apoyo institucional con el que esta tesis se ha podido desarrollar. El respaldo económico de las instituciones públicas que a continuación menciono ha sido clave en esta investigación y demuestra primero el interés de éstas por fomentar el valor añadido del conocimiento que aportan las ciencias sociales a la realidad social y económica; y segundo el interés en conocer y profundizar sobre las dinámicas que la cooperación transfronteriza genera en los territorios fronterizos de los que ellas forman parte también.

Agradezco primero a la Consejería de Innovación, Ciencia y Empresa de la Junta de Andalucía, quién concedió a la autora una beca pre-doctoral del Programa de incentivos para la formación de personal docente e investigador pre-doctoral en las universidades públicas de Andalucía para el periodo 2010-2014, según Resolución 24 de febrero de 2010 de la Secretaria General de Universidades, Investigación y Tecnología.

Esta tesis doctoral también ha contado con el apoyo de las siguientes instituciones:

La Consejería de Economía, Innovación y Ciencia de la Junta de Andalucía, quien ha concedido a la autora una beca de los Incentivos a actividades de carácter científico y técnico individuales de las universidades y organismos de investigación de Andalucía, para las modalidades de Estancias de Excelencia e Invitados, convocatoria de 2010.

Y el Instituto Estonio, quien ha concedido a la autora una beca del programa “Estophilus” para una estancia de investigación en Estonia, durante tres meses en la convocatoria de 2011.

Sin el apoyo de estas ayudas, la primera pre-doctoral, y la segunda y tercera para estancias de investigación, esta tesis habría sido mucho menos ambiciosa y seriamente limitada en los objetivos iniciales de la autora.

Por otro lado, el número de personas a las que la autora debe su agradecimiento es bastante extensa, lo cual lleva a resaltar que la misma elaboración de esta investigación ha resultado ser un proceso acumulativo del propio capital social que la autora ha creado a lo largo de un periodo de cuatro años. En este tiempo me he encontrado personas de distintos ámbitos

profesionales y países. Con ellas he establecido relaciones tanto fuertes como débiles que han constituido ambas distintas formas de capital social que he intentado preservar y de las que he obtenido todos aquellos recursos y beneficios que han repercutido en la creación de esta investigación. Todos ellos han aportado un gran enriquecimiento a nivel personal y profesional como investigadora.

Todas las personas abajo citadas y aquellas anonimizadas, por estricto seguimiento del rigor científico, han hecho posible este trabajo de investigación. Estas personas conscientes o no han significado mucho para la autora por su disponibilidad, apoyo tanto afectivo como cognitivo con sus comentarios y consejos durante los encuentros académicos y no tan académicos que hemos compartido.

Mi mayor agradecimiento es para mi Directora de Tesis, la Doctora **Estrella Gualda Caballero**, no sólo por su dedicación en lo concerniente a la realización de esta investigación, sino por su valor como guía profesional y su apoyo emocional. Ella ha sabido ver más allá de un horizonte limitado de posibilidades que, junto con su confianza en mí, me han hecho progresar como investigadora y persona. He aprendido muchísimo de ella, espero seguir haciéndolo y que este continuo aprendizaje revierta positivamente a nuestro favor.

Paralelamente, he tenido la oportunidad de conocer a distintos investigadores relevantes en las ciencias sociales y en el campo de la cooperación transfronteriza. Con el apoyo de estas personas he podido esbozar y concretar puntos cardinales de esta investigación, así como dar una dimensión internacional-europea al objeto de estudio. Por ello, agradezco enormemente al Doctor **Peeter Vihalemm**, de la Universidad de Tartu (Estonia), por su inestimable interés en esta investigación desde el principio y sus consejos en la fase inicial de este proyecto. Él también ha supuesto un gran apoyo estratégico durante el trabajo de campo que de otra forma no hubiera conseguido. Además siempre ha sido una referencia clave desde mucho antes de comenzar esta investigación y siempre le estaré agradecida.

Igualmente agradezco al Doctor **José Manuel Jurado**, de la Universidad de Huelva, por el gran interés y apoyo que continuamente ha demostrado por esta tesis doctoral. Le atribuyo un rol perfecto como “bróker de la investigación sobre fronteras”. Las charlas y comentarios con él me han permitido acceder a toda una red de contactos que han sido relevantes para esta investigación, y guiarla hacia resultados prácticos que puedan tener aplicabilidad real.

Más allá de las fronteras nacionales entre las personas que también me han apoyado, con las que estoy en deuda y a las que les demuestro mi más sincero agradecimiento, están el Doctor **Eduardo Medeiros** de la Universidad de Lisboa (Portugal), al profesor **Andu Rammer**, de la Universidad de Tartu (Estonia) y al **Doctor Joni Virkkunen**, de la Universidad de Joensuu (Finlandia). A todos ellos, les estoy muy agradecida y espero en el futuro poder aprender más de ellos. La motivación y ayuda que he recibido por su parte han hecho posible avanzar sobre todos aquellos momentos que han supuesto escollos en mi investigación.

Por último, quiero mostrar mi agradecimiento al Doctor **Thomas Lundén**, de la Universidad de Södertörn (Suecia), por su disponibilidad y agradable hospitalidad que en mi periplo por esta investigación también ha supuesto un gran estímulo y referente en la temática de la investigación.

Al Doctor **Jesús Felicidades**, de la Universidad de Huelva, al Doctor **Matti Fritsch**, de la Universidad de Joensuu en Finlandia, a la Doctora **Laura Assmuth**, de la Universidad de Helsinki en Finlandia, y a **Vânia Dias Martins**, de la Universidad de Algarve en Portugal, también les debo toda mi gratitud, ya que en algún momento me han ayudado en distintos aspectos técnicos para la elaboración de esta investigación. Considero que su dedicación personal para algunas tareas encomendadas de esta tesis ha supuesto también un esfuerzo altruista con el que me siento en deuda.

En mis agradecimientos, hago también alusión especial a mis compañeros de trabajo del proyecto “*Identidad europea, identidades fronterizas e identidades locales en Andalucía y Algarve*” (Ref.: SGAEX/SRICI/CR, N° Exp. 08.44103.82^a.015). Con todos ellos, mi directora de tesis la Doctora Estrella Gualda Caballero, el Doctor **Emilio Lucio-Villegas**, el Doctor **Antonio Fragoso**, **Juan Manuel Gualda Caballero**, **Vânia Dias Martins**, comencé mi andadura por la investigación y he construido puentes entre fronteras en lo personal y profesional.

Por último, expreso mi gratitud a todas aquellas personas y/o instituciones que han participado en el trabajo de campo de esta investigación, tanto en la realización de entrevistas como en el acceso a distintas fuentes de información y datos secundarios. Todas ellas representan a instituciones públicas locales, regionales y estatales, así como otras instituciones privadas. Todos en su anonimato han contribuido con su particular punto de vista y me han provisto de

una micro-lente a través de la cual alcanzar un conocimiento de primera mano sobre la realidad de las regiones transfronterizas objeto de estudio, por encima de los conocimientos más generalistas y superfluos.

Entre ellas he de hacer mención especial a la colaboración prestada de Anastasia Knor de la Fundación Archimedes de Estonia y el Organismo Autónomo Programas Educativos Europeos de España por facilitarme información sobre la movilidad entre países a través del Programa Erasmus; Jyrki Krzywacki de Estadísticas de Finlandia por facilitarme datos de la Encuesta Fronteriza; Arantxa Cantó García de la Dirección Internacional y Cooperación de la Federación Española de Municipios y Provincias por facilitar la información sobre ciudades hermanadas; Toivo Riimaa y Kaimo Käärman-Liive de la Asociación de Ciudades Estonias por facilitarme igualmente información sobre el hermanamiento entre ciudades, y Paulo Cocco del Instituto nacional de estadística de Portugal por facilitarme información sobre población residente de Portugal.

INDEX

	Page
AGRADECIMIENTOS/ACKNOWLEDGEMENTS	5
INTRODUCTION/INTRODUCCIÓN	13
1. Relevance of the research and choice of subject/ Relevancia de la investigación y elección del objeto de estudio/	13
2. Structure of the dissertation Estructura de la tesis doctoral	18
CHAPTER 1: THE STUDY OF SOCIAL CAPITAL	21
1.1. Defining social capital. Historical overview	21
1.1.1. The conceptual construction of social capital: Boourdieu, Coleman and Putnam	24
1.1.2. Other relevant authors of social capital	37
1.2. Multifaceted and multidimensionality of social capital	48
1.3. The measurement of social capital: Proposals of empirical frameworks	63
CHAPTER 2: SOCIAL NETWORKS AND SOCIAL CAPITAL: AN ANALYTICAL APPROACH FOR THE STUDY OF CROSS-BORDER COOPERATION	79
2.1. The structural analysis of social capital	79
2.2. The social networks analysis	84
2.3. The structural analysis of social networks	96
2.3.1. Glossary of network analysis	98
2.4. The study of personal and organizational networks	104
2.4.1. Personal Networks	104
2.4.2. Organizational and institutional networks	111
2.5. About social capital and networks in border regions and cross- border cooperation	124
2.5.1. The European cross-border cooperation and cross-border regions	124
2.5.2. The Euroregions	129
2.5.3. Why social capital and networks for the study of cross- border cooperation?	135

2.5.4. The study of social capital and networks in border regions and cross-border cooperation	141
CHAPTER 3: CONTEXTUALIZATION AND COMPARATIVE APPROACH OVER TWO CROSS-BORDER REGIONS: ALENTEJO-ALGARVE-ANDALUCÍA AND SOUTHERN FINLAND-ESTONIA	147
3.1. Two different border regions with common nexus	147
3.1.1. The water as natural border	151
3.1.2. Historical stability	153
3.1.3. Language affinity	155
3.1.4. The Iberism and the Balto-Finnic vision	159
3.2. Demographic and socio-economic introduction of the cross-Border areas. Main indicators	164
3.2.1. Demographic analysis	164
3.2.2. Brief economic picture of the cross-border regions	168
3.2.3. Trust and political confidence	175
3.2.4. Awareness and perception of regional policy, and cross-border cooperation with the neighbour	179
3.3. Opportunities for interaction: A basis for social capital creation	181
3.3.1. Transport and connectivity	182
3.3.2. Education Exchange	185
3.3.3. National residents living in the neighbour country and perception of the neighbour	189
3.4. A Brief introduction to the institutional cross-border cooperation in Alentejo-Algarve-Andalucía and Southern Finland-Estonia.	198
3.4.1. Twin cities agreements across the border	207
CHAPTER 4: OBJECT OF STUDY AND RESEARCH OBJECTIVES	209
4.1. Object of study.	209
4.2. Research objectives.	210

CHAPTER 5: METHODOLOGY AND RESEARCH DATA	213
5.1. Design of the study and methodology	213
5.2. Techniques for data collection	216
5.2.1. The secondary data	217
5.2.1.a. Data collection and analysis for the contextualization and description of the cross-border regions	217
5.2.1.b. Data collection of projects from Interreg IV programmes of cross-border cooperation	218
5.2.1.c. The network analysis to institutions (socio-centric- complete networks)	221
5.2.2. The interview to experts	222
5.2.2.a. The data collection of experts-respondents	223
5.2.2.b. The selection process of experts	226
5.2.2.c. The analysis of experts' first part of semi-structure Interviews	230
5.2.2.d. The analysis of experts' second part of the semistructured interview. Experts' personal networks (egocentric networks)	234
CHAPTER 6: EXPERTS' SOCIAL CAPITAL FOR CROSS-BORDER COOPERATION: EXPERTS' CROSS-BORDER NETWORKS AND ENTAILMENT TO THE CROSS-BORDER AREA	237
6.1. Experts' Profile (what people are)	238
6.1.1. Experts' sociodemographic profile	239
6.1.2. Experts' experience in institutional cross-border cooperation	241
6.1.3. Experts' cross-border living	242
6.1.4 Experts' linguistic competence	243
6.2. Experts' identity and attitudinal profile (what people feel)	245
6.2.1. Experts' trust in national and European institutions	245
6.2.2. Experts' feeling of identity	247
6.3. Experts' border network structure (what people do)	251
6.3.1. Experts' personal and cross-border networks	253
6.3.2. Types of experts' networks structures	265

6.3.3. The role of experts' cross-border relations in their personal networks	279
6.3.4. Experts' opportunities and resources from cross-border networks	295
CHAPTER 7: THE NETWORK STRUCTURE OF THE CROSS-BORDER COOPERATION IN THE FRAME OF INTERREG 2007-2013 IN ALENTEJO-ALGARVE-ANDALUCÍA AND SOUTHERN FINLAND-ESTONIA	305
7.1. The institutional network structure of cross-border cooperation programme Interreg 2007-2013.	306
7.1.1. The institutional profile	309
7.1.2. The network structure and key actors of the cross-border cooperation sub-programmes	314
7.2. Nature and content of the institutional relations	334
7.3. The role of the Eurorregión Alentejo-Algarve-Andalucía and Euregio Helsinki-Tallinn	343
CONCLUSIONS/CONCLUSIONES	361
INDEX OF TABLES AND FIGURES	373
REFERENCES	378
ANNEXES	411
Annex 1	413
Annex 2	417
Annex 3	423
Annex 4	425
Annex 5	461

INTRODUCTION

1. Relevancia de la investigación y elección del objeto de estudio.

El estudio de la cooperación transfronteriza se ha convertido en uno de los temas más recurrentes de la investigación sobre la Unión Europea ya que esta línea de actuación política es un objetivo crucial del tratado constitucional y uno de los tres pilares de la cooperación territorial en la política de cohesión regional (Rojo, 2011). Esta prioridad obedece a un doble proceso. Por un lado, la tendencia histórica del creciente rol de las regiones entre países, extralimitando las fronteras de las naciones europeas (Perkmann, 2002; Perkmann & Sum, 2002). En Europa durante siglos ha habido espacios transfronterizos entre países, aunque es recientemente cuando estos han evolucionado hacia proyectos políticos más ambiciosos y como alternativas políticas de gobernanza que se añaden a los Estados-Nación y a las instituciones intergubernamentales. Por otro lado, también ha contado la necesidad existente en la Unión Europea de armonizar los estándares socioeconómicos de las poblaciones de las distintas regiones para afianzar el proceso de integración y cohesión europea. En este contexto, la cooperación transfronteriza tiene el valor adquirido de contribuir a la creación del espacio común europeo a través de la eliminación de barreras, aproximación de los ciudadanos, la resolución de problemas comunes a las fronteras y puesta en marcha de metas de desarrollo comunes (Regional Policy–InfoREGIO, 2012).

Por ello, desde la puesta en marcha de los conocidos programas comunitarios Interreg en 1990, un nuevo mapa sociopolítico de la Unión Europea se ha reconfigurado yuxtapuesto a las fronteras nacionales de los estados miembros. Es a partir de la década de los noventa cuando se multiplica la aparición de las regiones fronterizas y nuevas estructuras institucionales de cooperación transfronteriza como las Euroregiones. Estas figuras institucionales surgen como estructuras de gobernanza multinivel y transfronteriza bajo unos criterios legales flexibles con capacidad de actuación en diversos ámbitos. El número de Euroregiones aumenta sobre todo a partir de los noventa motivado por el estímulo financiero y programático creado por la Comisión Europea con los programas de cooperación transfronteriza Interreg y otros. Este panorama financiero, político-institucional y social ha despertado el interés académico siendo la cooperación transfronteriza y las regiones transfronterizas uno de los temas más abordados en el campo de las ciencias políticas y sociales a nivel europeo.

No obstante, los estudios sobre la Unión Europea en el campo de la sociología han tenido menor relevancia que los estudios desde otras disciplinas como la economía, derecho, historia, o política. Se considera que la sociología al igual que otras ciencias como la Geografía humana, más aventajada en estudios sobre la Unión Europea, puede aportar un análisis “bottom up” bastante aclamado como fuente de la integración Europea (Favell, 2006). En este sentido, una sociología de estudios regionales y de la Unión Europea ha abierto distintas cuestiones de interés del proceso de la integración europea, obviadas hasta ahora o reducidas al análisis de procesos de integración económica y análisis de políticas europeas. La Unión Europea ha supuesto un campo casi infinito para el estudio de gran diversidad de fenómenos socio-culturales intrínsecos a la integración europea como los estudios de opinión pública, participación política, comportamientos transnacionales, que según Favell (2006) interesan para el estudio de la Identidad Europea y que tratan de responder y plantear cuestiones sobre la legitimidad democrática de la Unión Europea.

Por igual, la incursión de estudios sociológicos en el ámbito de la cooperación entre regiones fronterizas ha venido precedido por la investigación desde otras perspectivas. Van Houtum (2000) diferencia por un lado, los estudios clásicos de economía basados en el análisis de los flujos de transferencia económica entre fronteras y el impacto de estas nuevas dinámicas sobre las regiones fronterizas. Por otro, los análisis de políticas de cooperación transfronteriza y análisis político de regiones transfronterizas. Por último, un tercer enfoque en el estudio de la cooperación transfronteriza se basa en un análisis “bottom-up” o perspectiva humanista que se centra en el estudio de los procesos sociales y culturales que surgen de la cooperación transfronteriza y en las regiones transfronterizas, y que son considerados de gran relevancia para la legitimación del proceso de Integración Europeo. Es en este último enfoque disciplinar donde el análisis sociológico se ha adentrado en las últimas décadas en el estudio de la cooperación transfronteriza junto con otras disciplinas como la antropología o la geografía humana. Estas disciplinas abarcan aquellos procesos más informales de la cooperación transfronteriza como son el estudio de identidades, actitudes y opiniones de la ciudadanía de regiones transfronterizas ante el desarrollo formal de la cooperación transfronteriza, es decir, aquella consistente en los procesos de decisión política y económica, y de nuevas estructuras institucionales que tratan de incidir en un creciente proceso de integración europea del cual ellos también forman parte.

Paralelamente a esta incursión, las distintas aportaciones desde la economía y sociología han contribuido al desarrollo teórico-empírico del concepto de capital social que en las dos últimas décadas se ha convertido en una noción de gran maleabilidad analítica y de una gran aplicabilidad a distintas disciplinas (economía, sociología, salud, etc). A pesar de estar frente a un concepto que carece de un consenso en cuanto a su conceptualización y operacionalización, el estudio del capital social ha tenido una vida productiva en muy poco tiempo que le ha convertido en un concepto exitoso en el campo de las ciencias sociales (Herreros, 2004). El capital social, con antecedentes en el desarrollo de las nociones de capital económico y capital cultural, insta al estudio de las relaciones sociales y aspectos como la confianza y normas de reciprocidad social que facilitan la acción colectiva o un beneficio. Para los investigadores del capital social los aspectos tanto cognitivos (confianza, normas, reciprocidad, valores, etc., como estructurales (redes y relaciones sociales) resultan ser claves para el estudio de distintos objetos de estudio, que pueden abarcar desde un nivel macro a un nivel micro, como el desarrollo económico y democrático de sociedades y/o comunidades, el proceso de integración laboral y movilidad social, estudios epidemiológicos en el campo de la salud, éxito escolar de estudiantes, estudios sobre integración social de minorías, etc.

Por otro lado, el estudio del capital social se ha enriquecido también con el desarrollo del análisis de redes sociales que aporta al capital social un método empírico matemático para explicar cómo a través de la inversión en redes o relaciones sociales, las personas o actores sociales en general son capaces de obtener beneficios u obstaculizar el acceso a recursos. El análisis de redes consiste en un nuevo paradigma de teoría social que explora el comportamiento de las relaciones entre actores sociales (Breiger, 2004). Esta disciplina aborda el estudio de un capital social estructural, esto es, como una estructura de red en el que las redes y nodos (individuos o actores) son el objeto de análisis y a través de las cuales circulan distintas formas de capital social. A su vez, el tema del capital social ha sido uno de los más relevantes en la aplicación del análisis de redes sociales (Molina, 2001) y en este trabajo de investigación ambas aproximaciones han sido aplicadas para el estudio de la cooperación transfronteriza.

Por tanto, en este trabajo de investigación confluyen ambos marcos de análisis, la cooperación transfronteriza desde la perspectiva sociológica que utiliza el capital social y el análisis de redes para aportar un nuevo enfoque al estudio de la cooperación transfronteriza. Son muy recientes los estudios que utilizan el concepto de capital social o elementos claves del capital

social como las relaciones sociales, redes, y confianza, para el estudio desde un enfoque sociológico de la cooperación transfronteriza (González & Gualda, 2013). Aún así, abordar tanto un análisis “top-down” de políticas de cooperación transfronteriza, como el análisis “bottom-up” de procesos inherentes a la integración europea como son las relaciones sociales, identidades y actitudes de la ciudadanía de las regiones fronterizas, abren nuevas perspectivas más enriquecedoras sobre la cooperación transfronteriza y la conformación de las regiones transfronterizas como espacios de Unión Europea. La perspectiva del capital social y el análisis de redes puede captar el carácter procesual y relacional de la cooperación transfronteriza así como de la conformación de las regiones fronterizas. Además este enfoque puede ser aplicado a diferentes regiones dentro del mapa fronterizo europeo para comprender la naturaleza de las relaciones tanto institucionales como informales entre las fronteras, la dinámica de las relaciones sociales entre vecinos, así como las dinámicas de gobernanza transfronteriza entre las instituciones regionales, locales o nacionales de aquellas nuevas estructuras de gobernanza transfronterizas.

En esta tesis se ha partido de un trabajo empírico en dos regiones transfronterizas dentro de la Unión Europea para realizar un análisis comparativo sobre la construcción del capital social que surge a raíz de la cooperación transfronteriza. Estas dos regiones presentan tanto ciertas similitudes como diferencias, ambas relevantes para el estudio de casos, y que seguro aportarán tanto distintas realidades sobre las relaciones y cooperación transfronteriza existentes, como ciertos aspectos comunes. Por un lado, la región fronteriza comprendida por las regiones portuguesas de Alentejo y Algarve con la región española de Andalucía, y por otro, la región del Sur de Finlandia con Estonia. Ambas zonas fronterizas constituyen subregiones que forman parte de los programas de cooperación transfronteriza Interreg de la política regional Europea, en este caso POCTEP (Programa Operativo de Cooperación transfronteriza entre España y Portugal), y el Programa Interreg IV del Báltico Central. La cooperación transfronteriza en la región de Alentejo-Algarve-Andalucía representa una de las más longevas dentro del marco de la Unión Europea, frente a la región entre el Sur de Finlandia y Estonia que representa la cooperación transfronteriza extendida tras la ampliación de la Unión Europea a los países del este ex-soviéticos. No obstante, estamos frente a dos regiones fronterizas que comparten gran similitud lingüística, cultural e incluso étnica, aspectos sociales y culturales relevantes para el desarrollo de relaciones sociales y redes tanto formales e informales claves para entender el la construcción del capital social entre fronteras y la cooperación transfronteriza.

El objetivo de esta investigación es doble, ya que primero pretende contribuir al enriquecimiento del estudio de la cooperación transfronteriza desde un enfoque sociológico innovador aplicando el análisis de capital social y análisis de redes a un contexto poco explorado desde estas disciplinas (González & Gualda, 2013). Para ello, se plantean distintos objetivos explorativos que analizan, por un lado, aspectos cognitivos del capital social y el carácter y dinámica de las relaciones fronterizas entre aquellas personas que han sido consideradas en esta investigación como expertas por tener un perfil profesional íntimamente ligado a la cooperación transfronteriza. Esta indagación nos permitirá conocer qué tipo de capital social fronterizo emerge entre estas personas en ambas regiones fronterizas. Y por otro, la naturaleza y estructura de red que surge de la cooperación transfronteriza institucional financiada por los sub-programas de cooperación transfronteriza a los que pertenece cada región transfronteriza, Alentejo-Algarve-Andalucía y Sur de Finlandia-Estonia. Segundo, con esta investigación, se pretende enriquecer el estudio de la cooperación transfronteriza desde un análisis comparativo de dos regiones fronterizas distintas a cada extremo geográfico de la Unión Europea. Esta perspectiva comparativa resulta de gran interés ya que gran parte de los estudios en cooperación transfronteriza versan sobre estudios de casos, siendo más escasos aquellos que comparan varias regiones fronterizas (Anderson, O' Dowd & Wilson, 2003; González & Gualda, 2013; Medeiros, 2011; Van der Velde & Van Houtum, 2000).

La elección del objeto de estudio se ha basado principalmente en la experiencia y currículo de la investigadora. La autora de esta investigación realizó un Máster en Ciencias Sociales especializado en las sociedades de los países Bálticos (Estonia, Letonia y Lituania). Esta formación le ha permitido conocer sus aspectos históricos, sociales, políticos y económicos y así como aproximarse al conocimiento de otros países de la región Báltica, como Finlandia y Rusia. Por otro lado, la autora ha participado como investigadora en el proyecto de investigación “Identidad europea, identidades fronterizas e identidades locales en Andalucía y Algarve” dirigido por Estrella Gualda Caballero, y financiado por la Consejería de Presidencia de la Junta de Andalucía. Esta participación y la colaboración con la Universidad de Huelva, aproximó a la investigadora a la realidad fronteriza de las regiones del Sur de España y Portugal. El tema de investigación fue entonces elegido como innovador por analizar y comparar dos regiones fronterizas que, aunque comparten similitudes, representan a la vez dos regiones completamente distintas en sus características históricas, políticas económicas y sociales. Los objetivos de la investigación fueron concretados a medida que se avanzaba en la

investigación con la intención de ofrecer aportaciones prácticas y resultados significativos al debate académico centrado en el capital social y la cooperación transfronteriza.

2. Estructura de la investigación

Esta investigación se estructura en siete capítulos que forman una primera parte de exposición del marco teórico de referencia y el contexto de análisis, y una segunda parte de metodología y análisis empírico. Los conceptos claves de esta investigación son capital social, redes sociales y cooperación transfronteriza, por tanto, el capítulo uno, dos y tres son capítulos introductorios que permiten al lector familiarizarse con el estudio de estos tres conceptos, así como conocer las dos regiones fronterizas objeto de estudio. El primer capítulo presenta el concepto de capital social, su desarrollo histórico, las principales controversias en torno al concepto y su análisis empírico. El capítulo dos pretende igualmente explicar el análisis de redes sociales como paradigma que ha contribuido al estudio del capital social en su dimensión estructural. No obstante, en este capítulo se demuestra la idoneidad de aplicar el marco teórico y empírico del capital social y redes sociales al estudio de la cooperación transfronteriza. Para ello en el mismo capítulo se presenta el estudio de la cooperación transfronteriza, como un proceso histórico evolutivo de la Unión Europea que ha sido abordado desde distintas disciplinas, así como las aportaciones recientes que han estudiado distintos aspectos de la cooperación transfronteriza aplicando el concepto de capital social y análisis de redes.

El capítulo tres, es una extensa introducción a la realidad fronteriza de las regiones de Alentejo-Algarve-Andalucía, y Sur de Finlandia-Estonia. Se presentan estas dos regiones con similitudes con respecto a la estabilidad histórica de sus fronteras, la similitud lingüística del español y portugués, y del estonio y el finlandés que tiene sus raíces en el origen común de la civilización y raíz étnica Ibérica y Balto-finesa o Fino-Húngara. Aunque, por otro lado, los datos socio-económicos analizados y las oportunidades que ambas regiones presentan para la interacción social y el surgimiento de relaciones fronterizas las caracterizan como regiones completamente diferentes.

El capítulo cuatro, cinco, seis y siete forman la segunda parte empírica de esta investigación. El capítulo cuatro aborda brevemente la definición del objeto de estudio y el conjunto de objetivos que se pretenden alcanzar. El capítulo quinto describe el diseño de la investigación y la metodología usada, basada principalmente en el análisis de contenido de entrevistas y el

análisis de redes individuales e institucionales. Se describen las unidades de análisis, que han sido primero, aquellas personas denominadas como expertos. Por expertos se consideró a aquellas personas con una amplia experiencia en proyectos fronterizos y/o que han estado continuamente involucrados en la cooperación transfronteriza. Estos expertos proceden de distintas instituciones públicas y privadas tanto a nivel local o supra-municipal. Segundo, las instituciones que participan en proyectos de los subprogramas de cooperación transfronteriza 2007-2013 existentes en cada región fronteriza. En este capítulo también se exponen las principales limitaciones inherentes al trabajo de campo. El capítulo seis, se centra en el análisis del capital social individual de aquellas personas de la muestra seleccionada para explorar el alcance del capital social que tienen con respecto a las regiones del país vecino, y que se describe como capital social fronterizo. Este análisis se basa tanto en elementos cognitivos como estructurales del capital social. Tras el análisis de redes sociales en este capítulo también se obtiene una tipología de tipos de estructura de red que los entrevistados presentan. Por último, el capítulo siete se centra en el estudio de la estructura de red de cooperación transfronteriza que surge de los subprogramas Alentejo-Algarve-Andalucía y Sur de Finlandia-Estonia, para explorar el tipo de cooperación transfronteriza existente en cada región como forma de capital social fronterizo a nivel institucional.

CHAPTER 1: THE STUDY OF SOCIAL CAPITAL

1.1. Defining social capital. Historical overview.

The idea of what can be considered as the content of social capital concept has become in the last decades a very blazing topic in the social sciences. Social capital has evolved from its very early stages of conceptualization, based on the labels as “relationships matter”, and the “untouchable outcomes of the communities”, to a present acknowledgement of the complexity of the term and its empirical study. However, social capital has had a long and extensive development of its theoretical content and meaning, and empirical measurement, which is still on the way for academic consensus.

Indeed that could be the evolution pattern of the majority of concepts in social sciences, and it is comprehensive that when new concepts are coined, it arises and spontaneous ignited debate in order to test its validity and to get later a certain and accepted status in the academic community. However, if it does not exist a clear consensus on what it is social capital and how to tackle it empirically; it seems that there is a more generalized agreement on the lack of conceptual clarity and operationalization, than in the conceptualization of social capital per se as this is subject to different conditional aspects or axis and perspectives. This expanding and flexible nature of social capital concept can have two side effects. One promotes the enrichment over the assets of social capital (networks, norms, reciprocity, trust, etc) and its measurement. But the other can make the concept to walk on the tightrope due to its catch-all frame. In this sense a general concern reflected in many researches on social capital emphasizes the risk that the lack of solid theoretical basis, orthodox in its measurement can cloud progressively the term and end as a faddish concept, bordering the triviality (Lin & Erickson, 2010: 2; Bjørnskov, 2006: 36).

Despite its blurred demarcation and diverse empirical approach the use of social capital in social sciences has had a very successful life, for its short existence, estimated around two decades ago (Herreros, 2004: 14; Farr, 2004; Gualda, 2008; Portes, 2010). In a detailed study of social capital literature it is estimated that before 1981 the list of journals using social capital as key word were 20, and between 1996 and 1999 they increased to 1003 (Winter, 2000, in Putnam 2003: 11).

Precisely the adaptability or flexibility of the concept as well as its diffuse conceptual margins has allowed the use of the term in a different range of disciplines like political sciences, sociology, or economy, health, etc. on the study of its relation to a great variety of topics like in health promotion, corruption, social integration and exclusion, migratory dynamics, education, governance, political and civic participation, and even within the academic community.

The potential value of social capital for the economic development and growth has constituted one the most important reason for the awaken interest (Woolcock, 2001). The interest of the OECD and the World Bank on the role of Social Capital for the well-being of the nations is a good sign of this (OECD, 2001; World Bank, 2010). Concretely the World Bank created in 1996 the *Social Capital Initiative* with a triple goal which obeys to a greater efficacy of its development programs in the target societies. Its appealing attractiveness comes from the presumed idea that the investment or promotion of social capital generates positive outcomes in the economic performance and growth of a given society, as well as it has desirable effects for better and legitimized democratic governance (Grix, 2001; Harper, 2001). These effects are highlighted by Fukuyama (2001) as economic and political functions for the market economy and democracy, which constituted the concern of previous author like Marx (2010) or Tocqueville (1985).

How is this interaction between the aspects of social capital and a better economic or political development is then another question unresolved and the leitmotiv of the current research surrounding the concept. In doing so, Paxton (1999) argues how the analysis at an aggregated level of trust and associations makes possible to assess an aggregate-level analysis of the productivity and efficiency as the final outcome of social capital. In this aggregate level of public goods, she concentrates her analysis in the maintenance of democracy. Paxton tries to demonstrate how trust and associations influence in the aggregate-level public good of democracy. On one hand, trust contributes to the continuance of democracy, because it makes possible the turnover of power and that individual believe that the others follow the “rules of the game” (1999: 102). On the other hand, the associations increase the information flows which promotes at the same time a tolerant, moderate and public oriented political participation which reverts into the maintenance of democracy. This political participation enforces the development of an “enlightened self-interest” by which the individual moves

from the self-interest to the consideration of the public good and development of a common identity and shared responsibility.

Following Grootaert (2001: 9) traditionally the natural, physical and human capital have been related as the basis for the economic development. However, in the last decades it has become evident that there is something else which is not explained by the empirical results from these other forms of capital. And social capital seems the “missing link”. Actors and institutions are linked through different kinds of relations explicit in structures or in organization charts. Apparently the daily work is comprised by the norms, the program or procedure of activities, the labels or epithets ascribed to job positions, etc. in a way that the daily dynamic of work seems clear, apparently easily and objectively measurable. But there is “other unwritten reality” where people and institutions are embedded. This has been proved to be crucial at understanding why regions, communities, cities, certain social groups or individuals with comparable resources and attributes have different outcomes, even when the same initiatives are carried out. The answer to why the expected results in certain communities or regions are diluted among a variety of deviating and/or integrative aspects can be found in the turn to culture, social relations, trust, norms which are all about social capital.

Accordingly social capital appears like an evolution on the study of capital in general. Lin (2008) argues that for a better understanding it is necessary to trace social capital evolution in the historical development of different theoretical types of capital, that is, among financial, human and cultural capital. The notion of capital begins in capitalist societies meaning both a surplus value and investments by those capitalists. Capital is a material or monetary product of a process that at the same time is resulting from an investment process. The first theoretical contribution to capital comes from Marx and his classical theory of capital (2010). After Marx’s work, Lin situates the rest of capital theories into a broad category of neocapital theories. Progressively the discussion on capital is refined with a general assumption that the individuals or social groups are actors who invest in certain non material sources like technical skills with an expected beneficial return on the marketplace. The Human Capital theory argues that the investment in non material resources like education will return in material benefits like better occupational attainment. As a continuation, is Bourdieu who recognizes a cultural capital as the collective process by which certain privileged social classes invest in certain symbols and meaning in order to maintain their dominant positions. Social capital discussion appears then as initial theoretical clues that contribute to understand the flaws of the rest of

capital theories at explaining the relevance of social relations and interplays as forms of capital. Social capital seems to contribute initially to the understanding of human and cultural capital. In this sense, Burt states that “social capital is the contextual complement of human capital” (2008:31). The better positioned individuals in society are not only because they are better educated and more skilful, but also because they are better connected.

Part of the polemic character that social capital has got is a reaction against what it is considered as excessive individualism generalized in society, politics and economy (Field, 2004). Social capital could be a backlash against an excessive atomization of society. And this is accompanied by the awareness on the relevance that everyday life, people’s relationships and networks have lot to say also in the political and economic performance of society, besides the governments and markets, their explicit norms, structures and formalized procedures. So, the diverse elements that social capital concept encloses act as intermediary glues.

By other hand, though social capital has been a concept with a plethora of different author’s contributions, Robert Putnam has been the one who gave a boost to the term in social sciences or acted as a “spillover” (Farr, 2004: 7). Two of his engaging works (1994, 1995a) had a significant impact on academic debate and the grater audience of policy makers and public opinion for his easy understandable language, but also for the ignited criticism originated around the scholars interested in social capital. As Field points (2004) one may say “love him or loathe him”, but Putnam’s approach to the concept and its measurement provoked what could be the “Putnam’s effect”, this is, the revitalisation on the study of social capital, the subsequent reactionary attention on the term from the academic scholarship that though existing before under other labels was shadowed in the social sciences, and its staging into the popular and political discussion.

1.1.1. The conceptual construction of social capital. Bourdieu, Coleman and Putnam.

Having come so far in the discussion surrounding the notion of social capital but without reaching to its content, in what follows the purpose is to cover the debate around the conceptual construction of social capital and its operationalization with the final aim of clarifying a particular position in view of the theoretical and empirical research in this work. Surprisingly, though it has been noticed the diversity of the concept definitions, traditionally

the authors who are most rephrased and taken as references at the study of social capital are Bourdieu, Coleman and Putnam (Paxton, 1999; Field, 2004; Van Deth, 2008; Winter, 2000, Durston, 2002, Herreros, 2004, Portes, 2010). Nevertheless, social capital has received previous contributions from others scholars from different fields. Although they did not coined the term in the current label of social capital their approach to some of the assets which comprise it was the basis for the conceptual construction of social capital. Thus, despite an apparent short life, around twenty years old (Castiglione, Van Deth, & Wolleb, 2008), the readers might think that encounter with a new concept but created for old and diverse previous ideas and notions in the social sciences. And to some extent this does anything but to ratify that the idea and content of social capital has constituted a constant question in the social sciences research. This acknowledgment is probably one of the first conclusions that any researcher may encounter when studying about social capital, like Putnam (2003), Portes (1998), or Durston (2002) do.

In this line and going backwards to the classical social theory, Tocqueville's (1985) analysis of American dynamic association life on how citizens' active participation can contribute to democracy is in the first winks to the interest on social capital. It can be found basis for understanding social capital in Durkheim's (1985) description of mechanical solidarity and organic solidarity, both rooted in different types of norms, obligations and structure. Also his idea of "anomia" as consequence of the complex division of work and a symptom of increasing individualism in the industrial societies at the expense of more cohesive group life and reciprocity norms. The distinction between purposive association and instrumental association of Tönnies is similar to Durkheim analysis and reflects this acquaintance of the relevance of types of social relations assigned respectively to the *Gemeinschaft* as community and *Gesellschaft*, as society (Field, 2004: 5).

In Marx's analysis of the social classes, his attempt to explain the strength or weakness of solidarity among the oppressed encounters a basis for social capital idea in the distinction between the class in itself, defined by its position within the capitalist order and the class for itself which refers to a sort of collective awareness (Portes, 1998). In a different manner, in Weber's work *Protestant Ethic and the Spirit of Capitalism* (1995) is found connection with the social capital idea, like his ideas of honesty and cooperation can be considered as an externality of social capital (Requena, 2008: 24) or the "style of life" as a glue component of status groups (Field, 2004:6).

Perhaps from classical sociological theory is Simmel's interest and research on the forms of the social interaction the most closely related to the study of social capital. In a traditional distinction between the content and the form, he concentrated in the study of the possible forms of social interactions in order to find a possible frame for the study of associations existing in the complex and diffuse social reality. His development of an interactional sociological method constituted a starting point in the study of social networks which precisely are central assets in social capital (Ritzer, 1996).

However, all these contributions were embedded in a different social reality where the main worry of sociologists were to understand the new social order of industrial societies in order to find answers to phenomena like the increasing individualism and social exclusion. The purpose with this review on classical theory does not go beyond the attempt to show that social capital has been always in the concern of social sciences and constitute an intrinsic issue of the discipline, otherwise this exercise could have just a tautological value for the present research. A more direct approach to the current idea of social capital and based in a stronger awareness on the relevance of forms of solidarity between individuals within the community, social networks between citizens, associational life within societies, and membership to clubs, associations, etc. started in the XX century with a progressive contribution from diverse fields of activities. Lyda Judson Hanifan's idea of social capital is considered as the earliest and most approximated to present meaning of social capital (Castiglione, Van Deth & Wolleb, 2008; Putnam, 2003). Putnam rescued this rural educator, and from Hanifan's article "The rural school community center" (1916), took his description of social capital, which unfortunately went unnoticed supposedly by a dominant economic perspective in the social sciences, as a comprehensive definition that encompassed most of the assets attributed currently to social capital (Putnam, 2003: 11). Hanifan's appreciation of social capital was based in positive externalities that assets like the good willing and social intercourse have for satisfaction of community needs and developments. For Hanifan social capital means the progressive way in which a community is built, its spirit and its joint activities (Castiglione, Van Deth & Wolleb, 2008).

Later on, Farr has accomplished a deeper insight into Hanifan's treatment on social capital concept who emphasized social capital idea for the achievement of a "civic dream" that place education at the center of public life to affront the lack of social capital in the rural districts

(2004: 12). However, in his historical review on social capital term Farr points out the philosopher and educator John Dewey as the “seedbed” for social capital, for whom “democracy itself was nothing other than a mode of associated living” (Farr, 2004: 14). A assertion supported by Hanifanas well, who quoted Dewey’s work “School and Society”.

Revisiting some literature the Table 1, though does no pretend to be exhaustive, illustrates a chronological review on the theoretical construction of social capital as a concept increasingly settled down in the social sciences. What follows is the discussion of the main contributions to social capital (SC from now on) from different relevant scholars detailed in the Table 1. After this initial interest, the term is obscured probably due to the interwar period and appeared fleetingly between the fifties and seventies. According to Putnam (2003: 11), at the beginning of the XX century begins a more accurate treatment of the concept. On the fifties’s decade the term was used by others like the Canadian sociologist John Seeley as transferable profits from membership to clubs and associations. In the sixties the urban planner Jane Jacobs used the term to emphasize the value of informal networks in the modern metropolis. And in the seventies Glen Loury quoted by authors like Portes (1998), and Farr (2004), offers a more systematic analysis of social capital in his attempt to launch a contra-argument to the traditional orthodox economic theories based on the individual human capital for explaining the inequality and racial exclusion.

Table 1: Chronological review of authors dealing with social capital

CHRONOLOGY	AUTHORS' CONCEPTUAL NETWORKS		CONCEPT FORMATION AND RESEARCH EVOLUTION
Classics	Tocqueville, Durkheim, Tönnies, Weber, Simmel, Marx		Initial steps towards identification of different and mixed notions related to social relations of classical theory
Beginning XX	Dewey, Hanifan		Coin of the concept and contributions from different areas of public policy Mainly in USA
50's	Seely		
60's	Jacobs		
70's	Loury		
80's	Bourdieu		First systematic or more elaborated theoretical contribution about Social capital applied to economic performance and social cohesion in micro-level of analysis In USA and Europe
	Coleman based on	Economic branch Ben-Porath, Williamson, Douglas North	
		Sociologic branch Baker, Granovetter	
90's	Putnam based on	Classics, Hanifan, Seely, Jacobs, Ekkehardt, Loury, Seely, Bourdieu, Coleman	More systematic studies of SC in different societies, in different areas linking SC with economic and democratic performance
80's -90's XXI	Lin based on	Flap, Bourdieu, Coleman, Burt, Putnan Erickson, Portes)	Refinement of the concept and its operasionalization
	Portes based on	Dense ties: Bourdieu, Loury, Coleman	Attempts to build a framework theory for Social Capital and its measurement
		Open ties: Burt, Baker, Shiff	
	Woolcock, Fukuyama		
XXI Exponential increase	Foley and Edwards		Adding context dependency and institutional agency to social capital study Emphasis on structural social capital, Networks analysis
	Lin, Portes, ...		Innovative and original research on SC as "resources embedded in social networks" using network analysis across different fields and societies Progress for theoretical and empirical accepted perusal of the concept

Source: Author's compilation based on Castiglione, Van Deth, and Wolleb (2008), Coleman (1988, 1990), Durston (2002), Farr (2004), Field (2004), Foley and Edwards (1999), Lin (2001, 2003), Portes (1998), Putnam (2003), Winter, (2000), Woolcock (1998).

In this sense, the first contributions to social capital came from different disciplines and an economist concern that felt the necessity to explain certain aspects, like economic success and minimizing cost of entrepreneurial relations or the initial management of human resources. The concept itself of social capital is coined as a metaphor (Field, 2004: 4) or dimension of the

economic capital. Thus, most of the inquiry of social capital is related to its value for the economic development, what brings out the “economic past” of social capital study. This is the dominant discourse of neo-capitalist theories that conceives social capital as a resource that generates expected outcomes to individuals and collective actors (Lin & Erikson, 2010: 4). However, the attention to its intangible measurement provoked a progressive transition to the social and political sciences terrain, from where is most known its current and diverse approaches.

The eighties decade is estimated as the clear emergence of the concept with a solid analytical basis, and when start the proliferation of different authors, rephrased by others by their more systematic contribution to the concept. From Coleman (1988) it is distinguished clearly the influences of an economist and sociologist branch. In the economic approach he acknowledges the work from Ben-Porath and Williamson (Coleman, 1990), but also from Douglas North who distinguishes the formal from the informal dimension in institutions (Woolcock, 2001), and defines institutions as group of norms and values that facilitate the trust among different actors (Durstun, 2002: 20). In the sociologist branch, Coleman lies on authors like Baker and Granovetter. From both strands he goes further on in the analytical development of a new concept which is related to human capital though needs a concise examination. Other significant contributions from the economic branch during this decade are Ekkehardt Schlicht and Williamson. The first one, ascribed also by Putnam (2003: 11), exposes the question of the inadequacy of dominant individualistic vision for explaining the economic performance as entrepreneurial behavior.

But the first systematic treatments of the concept were offered independently, thought parallel, by two sociologists, Coleman and Bourdieu. Pierre Bourdieu offered a first hint to the term in what he called “provisional notes” on social capital. He defined social capital as *“the aggregate of the actual or potential resources which are linked to possession of a durable network of more or less institutionalized relationships of mutual acquaintance or recognition”* (Bourdieu, 1980: 2, 1986: 248). Later his analysis on the concept adopted a more sketched form in the paper “The forms of Capital” (1986), where he initiates the transition of the concept from the economy theory.

Bourdieu conceived social capital as the value that generates returns, bringing out its instrumental or functional value for the profit seeking of those individuals or social classes

that invest on it, as a resource of action (Winter, 2000). What it remarks also the material value that social capital has for Bourdieu. Social capital as the material and cultural capital is also fungible and it can be achieved through the investment on material and cultural resources (Portes, 2000:2). And though the outcome of possessing SC is economic capital, the processes that bring about this are not economical. Social Capital is made of two components or assets, the social relationships, and the durable moral obligations, which allow the access to resources owned by the agents with these networks and the amount and quality of those owned resources (Portes, 1998). His idea of social capital is also as a dimension of cultural capital where he was more focused, so social capital tended to be like an appendix that helps to understand the dynamic of cultural capital, especially within the privileged social classes of the society. As he titled on his paper, social capital is another inseparable form of the different kinds of capitals that he distinguished in order to clarify the dynamic of the social reproductions of inequality. That is, the same as explaining the dynamic by which very dense and durable relations or social obligations within-groups try to maintain their status through accumulative resources, specially based on acquisition of credentials.

Bourdieu concentrates in the social relationships among individuals or within much closed social groups, based on dense exchanges with a certain objective homogeneity that can be also instituted or guaranteed by a common name as family, schools, exclusive clubs, etc. These dense networks, like the kinship, are possible due the feeling of proximity or subjectively mutual recognition. This density and temporal dimensions of Bourdieu idea of social capital is what permits the “alchemy of consecration” (1986). In Bourdieu it is also emphasized the durable and accumulative nature of capital, as if it was an economy of scale, it takes time to accumulate social capital, to produce the same or multiply resources, so the entrusted inputs tend to be potentially enlarged with the time. The temporal length is one of the key factors of the conversion of resources into more profitable endowments. So from short-time relationships is less probably to quantify the potential amount of social capital.

Nevertheless, there are some issues criticized due to his clear Marxist heritage. He theorizes social capital as practically and exclusively possessed by certain elites, or social collectives who use it for they own interest, that is, the maintenance of their high or exclusive status, emphasizing the kinship character of the social relationships (Field, 2004). In this sense Bourdieu approximates to the bonding character of social capital, but only for one kind of

collectivity, the high social classes, what it serves for him to explain the unfair social reproduction of inequalities.

Bourdieu's contribution to social capital theory is considered as the most coherent (Field, 2004: 17), though it has lacked of visibility (Portes, 1998; Field, 2004) in the contemporary research. However, Coleman's work received more attention placing the concept in a wider audience (Fukuyama, 1999), specially in the North American sociology. Surprisingly, he does not account previous Bourdieu's work on social capital. Although both authors have similar interest on social capital from the field of education (Portes, 1998), once proven that economic, cultural or human capital are not sufficient to explain the educational achievements or to a more extended idea of social integration. Coleman detailed the social capital as a revealing concept at unifying two divergent theoretical streams of social action, the economic one based on rational choice theory and the sociological one based on the role of the social context. With social capital Coleman could make the transition from micro analysis where humans are supposed to behave fundamentally on their individual profit and interest according to the rational choice theory, to the macro analysis where humans behave on the basis of cooperation and mutual interests.

Coleman defined social capital as "a variety of entities, with two elements in common: they all consist of some aspects of social structures, and they facilitate certain actions of actors-whether persons or corporate actors, within the structure" (1988: 98). Consequently, social capital defines itself by its functions, which can product both economic and non-economic outcomes and which can result into useful-useless or positive-negative outcomes for actors. At the same time, in his definition Coleman considers that social capital is valuable for whether persons or corporate actors. This distinction can be significant to question the general believe about Coleman as an author that defended and applied the term fundamentally to the micro level of analysis or to small social groups like the family or the Jewish community (Field, 2004; Lin, 2008; Portes, 1998). Coleman centers the attention in the existence of a high degree of trustworthiness for the function of social capital. However, his reference to the use of social capital by corporate actors and for facilitating the price-fixing in an industry is perhaps Coleman's open door to the study of social capital in broader contexts and bigger social groups. At the same time, he was aware of the potential value that less dense relations studied by authors that himself quoted like Granovetter or Lin (Coleman, 1988).

If Bourdieu distinguishes two components of social capital, social relationships and the available resources, Coleman details social capital into three components of social organization, forms of social capital or facilitator of certain actions. First, there are obligations and expectations that depend on the trustworthiness of the social environment and the amount of obligations; second, the information channel that act as facilitator or actors actions, and third the norms and effective sanctions (1988:101). Although, Coleman highlights implicitly the importance of “*access to social networks*” for the individual (Grix, 2001), Portes affirms that Coleman “does not distinguish between the resources themselves from the ability to obtain them by virtue of membership in different social structures” (1998: 5).

In doing so, Portes (1998) claims the importance to differentiate between sources, donors, recipients and the resources themselves, distinction which is not clear in Coleman. However, can be this distinction between donors and recipients in the reality clearly separated? For Portes, donors and recipients both have resources which can be exchanged between them. This distinction is important for understating social capital dynamics and more easily understandable in small social groups like the family or the Jewish community of diamonds market. However, unlike in other forms of capital, in social capital of a given social organization there is not a clear purposive action in actors for creating benefits for the others members. Like in rational choice theory, actors guide their behavior for their own interest, independently of the possible public outcomes their actions provoke for the rest of actors in the social organization. Additionally, here is considered that resources are not individually possessed but relationally possessed and exponentially usable by the interaction between donors and recipients. In this relational nature the distinction of donors and recipients is based on the relational resources. In this sense, for Coleman social capital is a relational and public outcome that is fundamentally observable through the relations between actors. Thus, among the different types of capital like physical and human capital, social capital is the less tangible to the empirical observation. While the resources from the investment in physical or human capital are easily allocated in the actors who previously have done their efforts, in social capital these resources benefits others than the actors and are diluted among the social organization like in a “drawing fund” (Coleman, 1988: 117).

One of the clearest contributions of Coleman is the notion of closure. The closure is a property or type of the social structure that implies the existence of sufficient ties between a certain number of people to guarantee the observance of norms and promotion of trustworthiness

which at the same time promote the proliferation of obligations and expectations, like a social group with close relationships or community ties. Coleman interested more in the cohesive value of social capital against the instrumentality of new and contemporary social organizations (Field, 2004). Consequently, for him the closure is the most appropriated context for the study of social capital, though he recognizes the application of social capital to broader contexts. The closure is an evidence of the interest in Coleman for a more micro-level and analysis of social capital centered in the family and in the small tied community for the acquisition of human capital. And it can be related to other author's approximations to social capital like the mechanic solidarity of Durkheim (1985). Summarizing, Coleman main contributions reside in the idea of closure, the relevance of trust in the dynamic of social capital and in the advancement on the study of social capital, through the distinctions between obligations-expectations, information channels and norms. Although how these three forms of social capital are interrelated for the creation of resources of social capital remain in debate.

Both Bourdieu's and Coleman's approach to social capital is based in a refined advancement on the study of capital which focuses on the social interaction for the access and share of resources. From their lines of arguments both Bourdieu and Coleman has been ascribed into a micro sociological approach (Oorschot, Artsand& Gelissen, 2006, 49). They also centred in an endogenous and cohesive value of social capital (Field, 2004; Schneider, Plumper, & Baumann, 2000: 310). Although their theoretical background differs, they focus in different social groups and contexts, and in the different use and outcomes that the social capital could have for those specific social groups.

After Bourdieu'sand Coleman's contributions, social capital received a significant input with Putnam's influential studies. In *Making Democracy Work* (1994) Putnam associates the positive impact of civic engagements into the government performance across Italy different regions. And in *Bowling Alone: American's declining social capital*, he turns to American society studying the relation between a declining associational life, metaphorically symbolized through the bowling clubs, and the democratic ideal. If Bourdieu and Coleman represent the maturity of the concept, Putnam, through his works in Italy regions and the North American society, put the concept into the social theory debate (Castiglione, Van Deth & Wolleb, 2008) into the political debate and even into the public opinion of North American society (Field, 2004). At the same time, with these works one of the contributions praised to Putnam has been his attempt to combine in the study of social capital the macro and micro perspective. The

macro-aspects of society like government performance or democratic development of societies with a micro perspective through the involvement of citizens in associational life and indicators of political culture (Castiglione, Van Deth, & Wolleb, 2008; Portes, 2000). However, this enlargement of the concept from traditional micro parameters to macro level analysis is also a matter of discussion (Portes, 1998, 2000, 2010). Putnam exported the concept of social capital from a micro dimension of individual or social groups to the macro parameters of communities and nations. This jump would not be incompatible. However, for Portes, Putnam changed the heuristic value of social capital for becoming social capital in a value itself, as synonym of good public stock of societies (Portes, 2010).

Putnam defines social capital as “features of social organization such as networks, norms and social trust that facilitate coordination and cooperation for mutual benefit” (1995: 67). In this definition, social capital is emphasized more like a product or outcome of groups or societies, with a clear productive value “better achievements of certain aims” (Putnam, 1994: 167). This character of social capital as a structural attribute of society indicates the exogenous perspective of social capital in Putnam (Schneider, Plumper, & Baumann, 2000: 310). Consequently, as any other conventional capital, the more stock of social capital a society has the more democratic is or the better political and economic performance has. Like Coleman (1988) Putnam recognizes that social capital is a public good, unlike other types of social capital. This character implies sometimes its underestimation and placed it as a by-product of other social activities (Putnam, 1994: 170).

In *Making Democracy work* (1994), Putnam confers norms, trust and networks as the most important forms of social capital. More specifically he refers to social trust, norms of reciprocity and dense horizontal networks of civic engagement for the study of social capital. This notion of social capital has implied a great advance as it combines subjective assets (norms or values) with objective assets (networks, ties or engagements- and outcomes) efficiency or effectiveness in democracy- though is not clear how these three aspects are related (Newton, 1999). However, in a sort of light explanation of the possible dynamics between networks, trust, and norms, for Putnam networks are like the seeds or the setting for the formation of norms of reciprocity that subsequently generate social trust. Nonetheless, trust is the most important form of social capital as it allows cooperation whether for the economic dynamic or the government performance.

In the article *Bowling Alone* (1995a), Putnam demonstrates that the social capital he talks about is based on the bottom level of citizenship. This is a social capital made of dense relations or networks of social interaction, like traditional religious membership in The United States, labor unions, parent-teacher associations, civic and fraternal organizations, or bowling leagues, which are considered as “secondary associations”. For Putnam these types of associations promote more efficiently social capital than the increasing flourishing “tertiary associations” (mass membership associations like funs clubs or trnanational non profit associations), where ties are more superficial than one to another. For him, the decline of social capital is clearly the decline of those traditional organizations and traditional shape of social institutions like family, whose dense relations are the most appropriate for the formation of norms and social trust. In this article he treats briefly and warns over the role of the increasing tertiary organizations and the changes inhered in industrialized societies (the women labour integration, the technological transformation of leisure, demographic changes, etc.). Although he tries to refine and correct some of his assertions in a subsequent article (1995b), it is clear that Putnam, like Coleman in his study of social capital, shows his concern over the worsening of community ties and relations of solidarity as primary sources for social capital and without being replaced. That is why he practically reduces the parameters of social capital to certain phenotypes of trust, norms, and networks.

Many of the critics to Putnam lie down in these demarcations because there are multiple nuances. Not only the concept of social capital is multifaceted, but also trust implies different dimensions which should be discerned in the study of social capital (Grix, 2001). Other authors question the supreme and supposed value that trust has in the study of social capital (Foley & Edwards, 1999; 2001; Lin, 2003; 2008; Schneider, Plumper & Baumann, 2000). Although in some moment Putnam weighs the impact of political disillusionment and public policy (1995a: 76), in his analysis, the role of traditional secondary associations is overestimated. It confers to social capital a unique bottom-up dimension, as only civic engagement was responsible for the creation of social capital in a given society. On the contrary, in later researches, social capital entails a top-down perspective where governments have an important role sustaining the civic activity (Levi, 1996; Maloney, Smith & Stoker, 2000; Newton, 1999). Goldberg, for example in his critics to Putnam suggests that political actors have a powerful play for making democracy works (1996: 15). And the state agency must be considered for a more comprehensive study of the social capital performance (Lowndes, & Wilson, 2001). Other question obviated by Putnam is to consider social capital

as an attribute of society equally distributed among different social groups. His empirical research relies fundamentally on the middle classes associational life, what leaves other social sectors out of social capital analysis (Grix, 2001; Maloney, Smith & Stoker, 2000).

One of the controversies originated after his empirical research, has been the measurement of social capital forms through quantitative techniques and data like association membership. Critics in this sense question the excessive quantitative analysis of social capital in Putnam. He writes “our explorations will draw us deep into the character of civic life, into the austere logic of collective actions, and into the medieval history, but the journeys begin in the diversity of today’s Italy” (1994: 21). That is a suggestive incitation combines cross-sectional with historical–longitudinal data, and past political traditions in the analysis of political culture with present quantitative indicators for the analysis of democracy (Tarrow, 1996). However, this brave combination of space and time coordinates in the analysis of civic engagement and democracy has received much of critics. More specifically is criticized also the knowledge of Italy history and its application in the argumentation of Italy regional differences in social capital (Schneider, Plümper & Baumann, 2000). And last, but not least is the mentionable critical work on Putnam accomplished by Foley and Edwards (1996, 1999, 2001). Many of their critics reflect comments above. Especially in “Much ado about social capital” they scrutinize the pitfalls of Putnam’s metaphor of *Bowling Alone* in view of their operationalization advances. However, they go beyond these conceptual and measurement critics and pose *Bowling Alone* fuss on the neoliberal elite chord (Foley & Edwards, 2001: 230).

All in all, the merit of Putnam relies precisely on putting the concept into the political and theoretical debate. Despite all critics, his work has made great efforts in applying social capital to macro level analysis and making more operative its measurement. His results have provoked scholar specific works in the interest of applying the study of social capital in other societies for testing universalist conclusions in other latitudes (Kleinhans, Priemus & Engbersen, 2007; Torpe, 2003). Other studies support macro-level analysis of social capital components, like the relevance of trust in social capital promotion in the enhancement of governance and life satisfaction, or inquiring in the relation between trust, norms, networks at the roots of stocks of social capital (Bjørnskov, 2006). Probably the value of Putnam’s work is balanced between his contribution on the study of certain facets of social capital and the critical debate and motivation on the study of social capital as a reaction to his impressive

researches. They have served to create a “Putnam’s effect” in promoting further analysis on social capital conceptualizations and operationalization.

These three authors laid the basic foundations for an incipient social capital theory diverse enough to be applied multi-dimensionally in a great range of research interests. Future contributions of scholars have come like a thin rain allowing a progressive taxonomy of different approaches, whose origins depart fundamentally from Bourdieu, Coleman and Putnam. Concretely, for Woolcock (1998: 62), after these author’s contrinutions, generally in the eighties and in the nineties have emerged the most coherent theoretical advances in two different literatures, the new sociology of economic development at micro level and the comparative institutionalism studies at states-societies macro level.

Upon the contributions of Bourdieu, Coleman and Putnam, other studies try to clarify and to limit the theoretical underpinnings of social capital. All in all the different contributions to social capital have encountered with an old concern under a relatively new conceptual rubric in social sciences that have received different approaches demonstrating its multi-faceted nature. Although this research does not pretend to cover them, it can summarize that the theoretical underpinning oscillates among different assets like trust, norms, and networks, whose relations resist operationalization, being in certain moments object of parsimonious measure (Bjørnskov, 2006). And social capital presents different dimensions of analysis which add controversy to the study. At the same time, the attractiveness of the concept has provoked its indiscriminate application (Devine & Roberts, 2003; Oorschot, Arts & Gelissen, 2006; Van Deth et al., 1999), where each research stressed in certain aspects of social capital, logically depending on the interest and expecting results. However, in this amalgam of disciplines is precisely one of the innovative values of social capital, promoting the rapprochement and collaboration of disciplines that may would not happened with other theoretical and empirical concerns.

1.1.2. Other relevant authors of social capital.

In the last decade there have been significant attempts towards a consensual orthodoxy in the social capital theory, with an increasing general scholar consensus backed in significant empirical efforts (Lin, 2010; Portes, 2000; Woolcock, 2001). In order to promote later the discussion around the multifaceted and multi-dimensionality of social capital it is appropriate

to introduce the work of some relevant social capital authors. The Table 2 shows briefly the classification of these authors with some classics commented above, by the treatment of the concept, its level of analysis and measurement. What follows is an approximation to the contributions of Fukuyama, Woolcock, Portes and Lin, marked also in the Table 1. These authors aim a general approach to social capital applicable to different contexts, but specially Portes and Lin are prominent authors in the current debate of social capital. Far from being a simple description and enunciation of authors it will help to understand not only the controversies and facets of social capital, but also to apply their contributions to the study of cross-border cooperation.

Table 2: Social Capital different conceptualizations

Authors	Social Capital	Emphasized Assets	Level of analysis	Measurement	Function of Social Capital
Bourdieu	"The aggregate of the actual or potential resources which are linked to possession of a durable network of more or less institutionalized relationships of mutual acquaintance or recognition" (1980: 2).	Networks Resources	Micro	Case studies of social groups	Individual and collective action for social cohesion and integration
Coleman	"A variety of entities, with two elements in common: they all consists of some aspect of social structures, and they facilitate certain actions of actors-whether persons or corporate actors-within the structure" (1988: 98).	Networks Information-channels Norms Social action	Micro	Case studies of social groups and family	Social control Acquisition of individual human capital
Putnam	"Features of social organization such as networks, norms and social trust that facilitate coordination and cooperation for mutual benefit" (1995:66).	Networks Social Trust-Norms Cooperation	Macro	Quantative statistic data	Positive impact in Democratic performance
Fukuyama	"An instantiated informal norm that promotes cooperation between two or more individuals" (1999: 1).	Norms Collective action	Macro	Quantitative statistic data and qualitative measures	Economic efficiency Democracy performance
Woolcock	"Norms and networks that facilitate collective action" (2001:9).	Norms Networks	Macro	Quantitative statistic data and qualitative measures	Collective action with social and economic outcomes
Portes	"Ability of actors to secure benefits by virtue of membership in social networks or other structures" (1998:6; 2010: 27).	Access process Social networks Outcomes	Macro	Quantitative survey data and case studies	Positive/negative: Social Control Family Support Social integration
Lin	"Investment in social relations with expected returns in the marketplace" (2003: 3). "Resources embedded in a social structure which are accessed and/or mobilized in purposive actions" (2008: 12)	Investment/mobile-ization Social relations Resources/returns	Micro-macro level	Network analysis	Differential access to resources Attainment to/mobility in stratified society

Source: Author's compilation.

Woolcock is interested in securing the place of social capital in the economic performance, among a traditional skepticism over the potentiality of social capital as a development theory. In a continuum of previous work from Douglas North and Putnam, he emphasizes social capital relevance for social and economic outcomes. Thus, social capital is conceived as a clear independent factor of production which significantly affects the economic performance, like other types of capitals (labor, physical capital, etc). In a sort of synthesis and superior analysis from disciplinary provincialism, social capital is defined as “norms and networks that facilitate collective action” (2001: 9).

Along with this definition, several rigorous and universal standards are defended. Social capital is defined rather by its sources/causes than by its consequences. It is necessary to define the concept by what it is and how it is created, and not by what could do. In this way, he moves away from Coleman’s definition which assumes a presumably heuristic effect. Accordingly, relations are those sources whose investment allows certain outcomes like trust, which is an outcome of social capital rather than an active asset. In this diffuse relational dynamic between all mentionable assets of social capital like trust, norms, reciprocity and networks, Woolcock remarks the structural character of social capital given by those dynamics networks as the relevant asset of social capital. Trust is left out as a secondary asset which comes after a process of investment in networks. Consequently, social capital is a relational variable, entailed in the structure of social networks. And these networks show a multi-dimensional nature. They might create strong cohesion among the member of a group, known as bonding social capital, or to facilitate access to distant resources, what represents bridging networks, or even the access to resources located at high level positions of social stratification that is linking social capital. These bonding, bridging or linking nature of social capital can explain the diversity of resources and possible collective actions, and it will be discussed later on. By last, social capital is institutionally contextualized. It is not possible to understand social capital without the role of state or government performance. Networks are embedded in a institutional setting, whether the state agency complementary with social networks or whether a state that ignores or jeopardizes them.

Besides his efforts at shaping a theory of social capital, Woolcock concerns on the need to synthesize the apparently divergent micro and macro analysis of social capital (1998, 2001). For doing so, Woolcock remarks the need to integrate quantitative data measuring macro-level and universal and cross-country comparable variables through surveys with the qualitative

micro data at community level. The first ones would offer significant information about social capital outcomes, while qualitative measures are capable to capture the processes which in Woolcock are precisely the sources of social capital. However, he leaves this methodological integrative effort in noble intentions and to the guidance of previous pilot works, rather than in a descriptive and model empirical example

Fukuyama, like Woolcock, emphasizes the role of social capital for an efficient economy and even a *sine qua non* condition for democracy. It reduces the cost of transaction in the modern and extensive markets and promotes civic engagements that create an associational net necessary for the well being of liberal contemporary democracies. However, in respect to Woolcock, Fukuyama contemplates a different conception of social capital. For him social capital is “an instantiated informal norm that promotes cooperation between two or more individuals” (1999:1; 2001: 7). This norm can refer to a broad range of symbolic rules. Then social capital can be from a simple norm of reciprocity to more complex and elaborated moral doctrines. It refers to all the culturally shaped norms that promote cooperation like honesty, commitment, reciprocity, etc. Social capital is like the cultural glue of modern societies and consequently inherent to all individuals members who are virtually achieving their self-profit.

In this vision of social capital prevails a cultural dimension over the possible playing role of a structure of social relations. Presumably Fukuyama refers to structural networks when he distinguishes between in-group and out-groups for explaining the “externalities” that social capital provokes. These externalities are like positives or negatives outcomes in the form of cooperation or exclusion that emerge from those individuals sharing the same norm. In-groups would be those for whose social capital produces a positive externality, and out-group would be those for whose social capital has affected negatively. For explaining the externalities and the group membership he coins the term “radius of trust”, that is, “the circle of people among whom cooperative norms are operative” (1999: 2). Thus, his appreciation of social relations is based merely on the share of cultural norms, basically trust.

For the measurement of social capital, besides the census of group memberships and survey data of trust and civic engagement, he proposes for a macro level analysis of social capital a third metric which combines quantitative and qualitative measures. His formula for accounting the stock of social capital in a society contains the sum of memberships of all groups, with a cohesion coefficient. The coefficient radius of trust in order to measure the differentiated

access of individuals to collective action within the group sharing the same norms, and a coefficient radius of distrust for measuring the inter-groups relations. The result is a mathematic equation that tries to go in line with and beyond Putnam's empirical work.

Fukuyama also discuss the role of the state agency in a dichotomy between a bottom-up understanding of social capital like in Putnam, and a top-down perspective where governmental agency is high in the dynamic of social capital of a given society. State can promote social capital through education institutions indoctrinating people into certain rules and norms. However, it is recognizable its capacity to make a certain social control over the spontaneous collective action. In general, his position is ambiguous and he also equates the role of state with other important sources of social capital for him, religion and globalization process.

Portes and Lin are two of the most relevant scholars concerned about social capital as a developed and consolidated theory in social sciences. Both have tried to dismantle the dynamics between different social capital assets and its operative application in empirical research. In doing so, they alert on the risk that diverse and contrasting myriad of approaches may provoke on social capital as a catching-all but a losing concept (Lin, & Erickson, 2010; Portes, 1998; 2010). Starting with Portes, a consensual definition of social capital is the *"ability of actors to secure benefits by virtue of membership in social networks or other structures"* (Portes, 1998: 6; 2010: 27). Like for Woolcock, social capital has a more intangible nature because it is a relational concept, inherent in the structure of relations. His definition entails both the understanding of social capital (see Table 1) as a form of capital among small or cohesive groups like in Bourdieu or Coleman and the understanding of social capital more as an asset of extensive or broad structure of relations like in Burt (1992; 1997a, b) or Baker (1990). In his first claimed and rigorous approach to the concept (1998) he articulates the concept into sources and effects.

For Portes sources of social capital are these actor's motivations to cooperate, invest or make available the resources that he/she posses to other actors. These motivations depend on the direct or indirect reward that the individual may obtain from its initial efforts. Thus, the sources of social capital are consumatory when there is a felt obligation to behave or cooperate in a certain expected way, following very internalized norms. Accordingly, an actor will behave or cooperate as it is expected, as well as he would expect that other actors to behave in

the same way. Basically a consumatory social capital based on much internalized norms which individual should follow is needed and inherent in every society, group, or structure of social relations for its own existence. Sources are instrumental when the actors make an inward, investment or facilitate the access to their resources in the expectation that they will be rewarded in the future. However, this reward may be different from their initial inwards, and the time by which the actors will be rewarded is not necessarily immediate but it may be extended or unspecified.

These diverse sources have consequently different types of consequences or effects which are practically the functions of social capital. Portes attributes to social capital a function of social control, possible in tight community relations. Social capital is also a source of family and parental support especially visible in parent efforts for the educational attainment of adolescents, and social integration (Portes, 1998; 2000; 2010). These functions are related to the social control effect of social capital attributed by Coleman. Those communities and small groups with dense networks constitute structures of relationships that facilitate the observance of the actors among themselves. The third and most common function is a source of benefits from extra-familiar, loose or open networks. This function connects more with Bourdieu's previous conception of social capital as a form by which actors from extra-familiar and class relations maintain their status. But in more current studies the concern on the role of open and loose relations have been related to studies about stratification and occupational mobility like those by Granovetter (1973) and Burt (1992), both mentioned in Portes (1998: 12).

Regarding the work of those authors who have applied social capital to the community-national level like Putnam, Portes is more critical with this theoretical and empirical stretching. The most controversial aspect of the macro-analysis of social capital, is the circularity established between the causes and effects of social capital. Like in Woolcock, Portes criticizes in a more detailed argumentation (2000) the assumption that social capital sources lead presumably and obviously to certain positive outcomes. He does not neglect the pertinence of a macro-collective level analysis. However, he warns on the need to construct more refined logical criteria possible to find at the individual level. Thus, this analysis should go through the following logical criteria (1998, 2000). Social capital cannot be defined by its function and series of expected effects. Accordingly, it should be explained the *a priori* existence of social capital independently of its possible consequences. In the causal relation between sources and resources/outcomes the control of other possible variable is necessary to

avoid spurious attributes of social capital, as Portes demonstrates it happens in the study of - education attainment of immigrant children (2000: 7-10). By last, a more systematic approach to the history of communities should be done, regarding probably the soft dominion of Italy history in Putnam. By last, a distinctive aspect analysed by Portes is the negative nature of social capital, underestimated in the literature concerned mainly in the positive alleged effects that we will tackle in the section 1.2.

It is surprising that Portes does not take into account Lin's more current works even in his last compilation regarding social capital (Portes, 2010: 36). On the contrary, he mentions his initial writings, "Social Resources and Strong Ties" (Lin, Walter & Vaughn, 1981), emphasizing the role of strong or dense networks in the occupational attainment. The sociologist Lin who started firstly approaching social resources for developing later a consistent theory of social capital and contributing to its enrichment with the application of the term to other fields such as health or occupational attainment (Lin & Dumin, 1986; Lin, 1999; Song & Lin, 2009; Lin, & Erickson, 2010).

However, in last decade Lin has accomplished a more systematic, and conclusive approach to social capital. His works start in the eighties, but his collaborative attempts to offer a conceptual and methodological frame in the study of social capital are more recent. He places himself together with Bourdieu, Coleman, Putnam and others into the neo-capital theories, those scholar focused on the study of a capital different to the investment on economic production or commodities (Lin, 2008). Summarizing, Lin confers to social capital a more stable status in the social sciences, with a reaching point where many scholars agreed over any dispute "*that social capital is rooted precisely at the juncture between individuals and their relations and is contained in the meso-level structure or in social networks*" (Lin & Erickson, 2010: 4). Following Portes and Burt, he conceives social capital not in a double dimensionality between cognitive and structural aspects, but rather in the social network context. Social capital is then a relational asset that must be distinguished from collective assets like trust and norms of reciprocity. The cultural assets may influence but they should not be assumed as forms of social capital (Lin, 2003: 24-26). In a sort of compendium this conceptualization contains other previous and Lin defines variedly social capital as "resources embedded in social networks or social relations", or "resources embedded in a social structure which are accessed and or mobilized in purposive actions" (2008: 12). This social capital definition as

“the investment in social relations with expected returns” (2001: 19; 2008: 6) captures social capital essence to a relational process among social ties.

Trying to avoid the confused relation between the traditional assets ascribed to social capital – networks, trust, norms- his efforts are embedded in the clear operationalization of both networks and resources. Resources reverted to individuals might be also categorized and operationalized (Lin, 2001; 2008). Personal or contact resources are those possessed by actors in terms of material or symbolic outcomes. And social or networks resources are those possessed by the others’ social connections. The extensity and diversity of these social relations will affect in a more or less access to others’ resources. While contact resources can be mobilized directly, network resources imply the access to resources. On the other hand, networks are the roots of social capital. They should not be considered as mere precursors but as important variable in the study of social capital, which is the network location. With this variable is possible to measure the strength or nature of tie, and the bridge or access to the bridge. Those social relations based on mutual recognition, commented by Bourdieu, or resting in the closure described by Coleman, are dense networks in terms of Lin. On the contrary, there are social relations that permit the access to resources possessed by other’s networks, so they create like relational bridges that go beyond the family or closest groups.

At the same time, Lin rests the study of social capital in the stratification system, considering the role of inequality and stratification factors. Family, gender, ethnicity, educational level or working positions are resources distributed in a stratified society that consequently will influence in the access to social capital. These resources and the access to these networks are not equally distributed among individuals and different social groups. This unequal distribution differs from other scholars like Fukuyama, whose emphasis in the cultural component of social capital considers an apparently universal location of social capital among all social groups. This approach which defend social capital as networks with potential benefits are cross-class context and potentially conservative. Particularly, this is criticized by Das, who denounces the non-class approach in social capital study and places the study of social capital in of the class theory (Das, 2006).

In the attempt to build up a network theory capable to a more accurate operationalization Lin goes on in the further refinement of the concept. Social capital is the “*investment in social relations by individual through which they gain access to embedded resources to enhance*

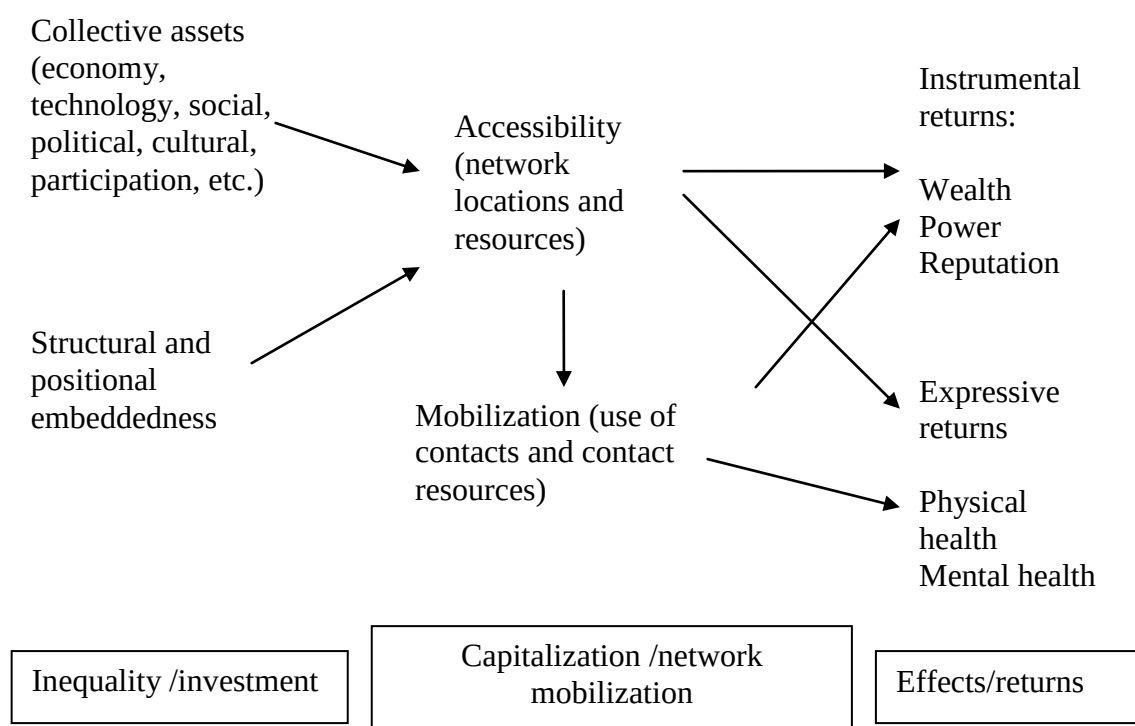
expected returns of instrumental or expressive actions” (Lin, 2008:18-19). This consensual and convergent definition contemplates an emancipated social capital which is procedural and relational. The conceptualization of social capital as a stock and an agglomerate of different unrelated cultural and structural assets could be a previous stage of social capital theory enhancement. But it is outstripped by the significance of the social relations empirically tackled across diverse works of networks researches like Granovetter (1973) and Burt (1992). Their approaches to social capital through social ties converge and is joined by Lin, who formulates a model of social capital in three processes. First the investment in social capital, second, the access to or mobilization of social capital, and third, the return of social capital or enhancement of expected returns. In this model of social capital there are clearly identified two core units of analysis, social networks and resources. Accordingly in what follows it is necessary to explain Lin’s analytical model of social capital.

Starting from the resources, Lin proposes instrumental and expressive outcomes or returns. Instrumental actions are those that permit the access to resources that the individual does not have. They can be economic, political and social, that is, wealth, power and reputation respectively. And while economic and political returns are clearly observable, the social is described by Lin in the form of reputation or status or social recognition. While the economic or political returns are more symmetric in the transaction between actors and are expected to be returned in short medium term, the social recognition may be asymmetric and may entail undefined period of return. Expressive actions are those that facilitate the maintenance of the resources already possessed by the individual. So they are actions that help to maintain or consolidate the resources that one already has. Lin identifies three types of returns: Physical health, mental health and life satisfaction, which might mean whether satisfaction with family and life or with neighbourhood and community. Both instrumental and expressive returns are likely to reinforce each other in the day to day life. As it was mentioned before there are those open networks which enable the access to resources beyond one’s closest circle. These types of relations facilitate the instrumental returns and refer to the already mentioned networks resources. In the same way, the dense networks and closures of relations which refer to one’s contact resources are likely to promote or to protect the resources that the actor already has, so they facilitate the expressive returns.

At this point, Lin presents in the Figure 1 his theoretical frame for analysing social capital. This model has three blocks. The first one indicates those preconditions or facilitator factors of

social capital. The second block represents the core unit of analysis, networks, and the possible returns in the third block. The social structure and the position of individual in this social structure might enhance or hinder the initial process of investment. In this block is recognized social capital as a process embedded in the social stratification where not all the individuals are positioned equally. Their capacity to mobilize resources will be determined by first the characteristics of the social structure where they belong, according to economy, political, cultural or social circumstances. And second, by the position that the individual occupies in this structure. Thus, the process from the first to the second block is undoubtedly influenced by this unequal starting point for the mobilization of resources. Better positioned or not in the second block takes place a mobilization process implying two elements, the access to the networks and their resources, and the use of these networks and resources. It is assumed that the better accessible are these networks the more resources probably will be mobilized for the actor. In the third block is where the mobilization of networks and resources are materialized into the expected returns, described before as instrumental and expressive. Is in the transition from the second to the third block where this analytical frame can explain how social capital returns into certain outcomes or gains. This model focuses on the analysis of the networks, in their differential access and in their mobilization. The causal relation between causes or forces and the consequences or returns is carefully described and remarked as an unequal process.

Figure 1: Modelling a theory of social capital



Source: Lin, 2008 (adapted from Figure 13.1, Lin, 2000).

For this constructivist analytical frame, the measurement of social capital is based on the study of the nature and structure of the social ties, leaving aside the study of values like trust. Lin rests on the previous work of those network oriented scholars like Burt, Granovetter and Freeman. Based on networks analysis the study of social capital is rather simplified and operationalized, through different techniques like the saturation survey, the name generator or the position generators techniques (Lin, 2008). These questions of measurement will be targeted in the next section and in the next Chapter 2.

1.2. Multifaceted and multidimensionality of social capital.

Along this theoretical and historical construction of social capital, different authors have contributed to the analysis of those attributive assets and dimensions of social capital, whether as problematic or as clearly stated. The previous approach to some of the relevant theorists exposed that social capital concept has turned towards the scholar concurrence. However, both concept and operationalization remain being complex. The debate surrounding social capital can be discerned across several axes, dichotomies or controversies which not all of them have been yet a matter of scholar consensus. Some of them are discussed as divergent opposites

within social capital and some are defended as complementary or compatible poles. Therefore, in any research about social capital it is necessary and important to identify these controversies for a careful approach. Van Deth (2008) claims that a very useful trick for an easier demarcation of the concept is the exploration of the common divisors around the multidisciplinary approaches to social capital, that is the core and common characteristics. In this section the attention is on the contextualization of those key issues and controversies for a better understating of social capital (see Figure 2). According to these key issues it is possible to identify the classification of authors from the Table 3 by their position in the view of these conflicting important issues of social capital, apparently divergent or not.

The first key issue to considerate is the generalized tautological use of social capital fundamentally promoted in Putnam's statements. As described above, this is the concern for many contemporary researchers (Farrel, 2007; Lin, 2010; Portes, 1998; Woolcock, 2001; Van Deth, 2008), especially when social capital is studied in a macro level as property of communities, cities or countries. According to Putnam those communities or regions with previous high social capital will promote or enhance the democratic well-being of their institutions. This causal effect is often attributed directly without empirical effort demonstrating why certain sources lead to the expected resources. For example this presumably effect is the lacking key issue explaining the doubtful economic payoff attributed to social capital. For Schneider, Plümper and Bauman (2000: 312-314), there is not an insight at demonstrating the nexus between different variables of political culture used by Putnam and the economic growth in societies. These authors prove that standard neo-classical factors are the variables with an impact on economic performance to the detriment of cultural values like trust, which is the core stone in Putnam's social capital. Precisely, this asset of political culture has a negative effect on economic growth, contrary to the presumed positive effects of trust.

Thus, it is necessary to avoid intuitive assumptions between presupposed causes and effects of social capital. Social capital cannot be defined a priori by its presumed functions or as a potential resource of society (Van Deth, 2008: 153; Portes, 2010). If so, then social capital is practically everything that facilitates cooperation and enhances democratic or economic performance. At the same time, according to this functional definition, social capital can adopt probably a broad and unspecified nature being practically everything depending on the research interest. And in this catching-all nature of social capital lies down the risk of becoming an empty concept with an invalid heuristic value (Portes, 2010).

Furthermore, in this circular and tautological conception of social capital the role of other variables is practically obviated. Schneider, Plümper and Bauman offer a summary of diverse studies proving the use of dummy variables that affect in the conclusions of the relative impact of cultural factors in economic growth (2000: 310). At this respect, Portes (2000) demonstrated the spurious character attributed to certain assets of social capital in his research of immigrant children's educational attainment. Portes tests the presupposed and positive effect of variables like the parents acknowledgement of other parents of their children's friends (networks closure of children's parents) and parents' school involvement (parental involvement). And what really influences on education attainment of immigrant children is the social and economic status of the family, children's ability in English and length of residence in the country. Whether to consider these control variables as pertaining to the ancestral roots of social capital, is also a matter of further research. However, Portes (2000) shows that clear traditional assets of social capital like engagement and even networks have not demonstrated the presumably effects attributed to social capital, in this case, a better educational attainment of immigrant children in United States. Based in the results of the National Education Longitudinal Study (NELS), Portes points that there is a spurious effect of social networks of immigrant children in their educational success. And other variables like the children's parents social and economic status, the childrens' ability in English or their length of residence might be blurred by the sparkling popularity of social capital.

Where the circularity relation between cause and effects of social capital becomes more evident has been fundamentally at the collective level of social capital. Here social capital is understood as a given character of society, instead of being a causal process of investment clearly specified at individual-relational level. Portes (2000:3) identifies that the relation between the sources-causes and effects-outcomes can be clearly operativized at the individual level like the simple fact by which an individual through his relations may get certain resources or better access to resources. On the contrary, at the collective level this causal relation is not so easily distinguished. At the same time, the causal relation circulates whether from social relations or nets of engagement which promote norms and trust or vice versa (Lin, 2008:10). However, this a priori rejection to conceive social capital as an attribute of collectives does not affect to the validity of the study of social capital at collective level. In this sense it is mentionable the attempt to make a compatible measure of individual and collective social capital. Milyo and Leininger (2004) propose their construction of a structural

model which equates individual trust and civic engagement with collective trust and membership.

One of the problematic approaches is whether to consider social capital as a private-individual outcome or as collective-community benefit. In the former the individuals would get a direct benefit from their relational activity and social interactions, like an investment in monetary capital or human capital, the benefits, will report on the person for a better economic profit or better occupational position. But in the literature social capital has been approached as a community or public good in the country level research like in Putnam. This enlargement of the concept to collective property is criticized by Portes (2010) who defends the individual treatment of social capital in Bourdieu or Coleman. However, both levels of analysis have been used simultaneously and indiscriminately. Lin (2008) proves how different scholars treat both levels in their approach to social capital. For example, it is difficult to separate the treatment of social capital in Bourdieu or Coleman as a form for educational achievements, compatible with the treatments that Coleman does of social capital in form of social control, and Bourdieu in a form of maintenance of group status-quo. Others have posed the problematic in term of a micro or macro approach to social capital. In the Table 3 it is possible to distinguish those authors more prone to micro-level like the founders Bourdieu and Coleman or Portes, and those prone to society-country study of social capital like Putnam and Fukuyama. By last those authors who try to defend, more than making compatible, the combination of a micro and macro perspective like Woolcock.

However, for Lin (2008) the confusion arises in the empirical work with the treatment of social capital in terms of collective trust, norms and other collective good shared by people, when is not. Values and norms should not be involved indiscriminately with networks, as these both types of assets pertain to different analytical frames and imply different techniques of research. For this author, social capital is above all a relational process, resulted from interactive activities between different individuals. This premise permits to accomplish a coherent empirical approximation to social capital created by individuals members of a community. What for Lin and other authors has been important in the advance of social capital theory is the distinction between the relational dimension of social capital empirically focused in the study of networks, and the collective dimension focused in the study of norms like trust and reciprocity. This relational versus collective is based in the analytical distinction between structural social capital and cognitive social capital defended in the last decade.

In tune with this, other authors have discussed about this dichotomy in two analytical dimensions, the structural-relational social capital versus the cultural-cognitive social capital. The structural dimension refers to more or less institutionalised networks while the cultural dimension consists in a set of values and attitudes like trust, reciprocity and willingness to cooperate (Oorschot, Arts, & Gelissen, 2006:151). Paxton (1999) refers to these double dimensions as two components of social capital, the objective associations between individual and the subjective type of ties that can be trust, reciprocity or an evolving positive emotion. Foley and Edwards (1999) in a revision of 45 articles about social capital make a clear division between those empirical works using the concept of social capital in terms of norms and values, which has been tackled traditionally by economists and political scientists in cross-country studies, and those studying social capital through networks and social relations, dominated by sociologists. This distinction offers a fundamental operative key for clarifying much of the confusion related to social capital as an agglomerate made indistinctly of norms, values or networks. Indeed this distinction is talked by previous authors like Coleman, Bourdieu and Putnam who explicitly or implicitly recognized this double nature of social capital (Grix, 2001), though it has been more recent when authors like Uphoff (1996), Burt (1997a, b) or Foley and Edwards (1999) have made significant advances in a systematic distinction between the structural and cognitive or cultural dimensions in social capital. Parallel to this, in the Chapter 2 it will be discussed/ how social capital debate encounters in researchers from social network analysis a solid empirical basis for the consolidation of the paradigm as a theory in social sciences.

Uphoff started at decomposing social capital like can be possible to do it in economic capital. Social capital exists in structural and cognitive forms. Both pertain to cognitive process, however, while the structural assets are still observable in the manifestation of social relations, the cognitive are purely mental process unobservable directly (Uphoff 2000, Uphoff & Wijayaratna, 2000). The structural social capital is compounded of “roles, rules, precedents and procedures as well as a variety of networks that contributes to cooperation” (Uphoff 2000: 218), and specifically to mutually beneficial collective action (MBCA), that is for Uphoff the benefit or outcome of social capital. The cognitive social capital is formed by norms, values, attitudes and beliefs which predispose people to cooperate. The first category is compounded by a sort of facilitator factors of cooperation among individuals, while the second category is understood as factor predisposing cooperation. The structural dimension of social capital feeds

from Bourdieu and Coleman instrumental interpretation of social capital, while the cognitive or attitudinal dimensions is based on Putnam's interpretation of social capital as a collective good like civic engagement or social trust, produced and available in the culture of a given community or country (Edward & Foley, 2001).

These two dimensions are interacting continuously and they are interrelated in practice and they are complementary (Devine & Rober, 2003; Requena, 2008, Uphoff, 2000). They are indissoluble, as for Uphoff is not possible to envision any structural forms of social capital without any cognitive form supporting it or vice versa. How the relational dynamic between these two dimensions develops is not taken to a chicken-egg problem. Rather is a matter of further discussion that Uphoff demonstrates through real empirical cases in different communities like Gal Oya in Sri Lanka (Uphodd, 2000; Uphoff & Wijayaratra, 2000). Rescuing theoretical grounding of values and Uphoff's distinction between disposal and facilitators categories is plausible to assert that trust and other norms encouraging cooperation as cultural values might be placed in the roots of the structural relations of coordination or relational activities among individuals. The cognitive dimension creates a sort of threshold that channels the work of roles, rules, procedures, etc. Nevertheless, the compatible nature of these two dimensions is not shared by others like Foley and Edwards and Lin. For them structural perspective drawn upon the social networks and structure of networks have demonstrated major capacity to explain and understand the relation between sources and resources of social capital. According to them, the focus on the structure of networks proves to give a more heuristic value to social capital concept. Contrary to the cultural root of networks implicit in the social networks, Devine and Roberts (2003), find out reasonable to assert that the dynamic social networks shape the nature of the norms and values emerging from them.

For Grix (2001) the empirical tendency towards structural or cognitive social capital has brought out two divergent paradigms, the Putnam school and the Qualitative Critical Debate. Putnam's approach (1994, 1995a) has been dominant in the nineties using the same methodological mold of regional, national surveys of values and attitudes and quantitative data of membership or civic activity. After Putnam there have been scholars and even more effusive political attempts at showing systematic approaches to the collective level of social capital proving its validity for economic and democratic welfare, like those promoted by the World Bank, or the OECD (Woolcock, 2001). This work follows a more network approach to social capital invigorated in last decade. But at the beginning of XXI century there is a claim

for a more refined approach to social capital, with its roots in Coleman, capable to capture the nuances of a flexible concept like social capital and adapting it to the particularities of the context in which the research is embedded (Grix, 2001).

In a sort of digression, for Grix, these cognitive assets like norms, values and attitudes can be studied at the individual level. This methodological remark should not be misunderstood considering the previous distinction of collective social capital as cognitive, and relational social capital with structural dimension. First, norms and values studied at individual level means that they refer to data of individuals collected through national surveys, civic activity registers or citizenship polling but they explain collective tendencies in term of trust and norms. This appreciation is important to consider later on the discussion of the measurement of social capital. While in the structural dimension, the level of analysis is institutional.

A more recent nuance introduced or contemplated by the Qualitative Critical Debate in this structural approach to social capital is the role of the political structures. Institutional agency has a role to play which at the best has been shadowed in the Putnam school or cognitive studies of social capital. Although Putnam refers slightly to the impact of political disillusionment and public policy (1995a: 76), in this paradigm social capital is fundamentally bottom-up promoted. But it seems paradoxical to believe in social capital as a mean for the improvement of democracy where the institutions' roles towards the community's values and associational activity are not contemplated. On the contrary, more recent empirical efforts especially from approaches based on structural social capital, analyze the role of political institutions in the relation to social capital, worsening or improving it in the communities. Several works centered in local government's role, institutional capacity to encompass and facilitate associational activity (Knack, 2002; Grix, 2001; Lowndes & Wilson, 2001; Maloney, Smith & Stoker, 2000; Newton, 2006). In this research line, these studies tackled a top-down perspective in the creation and maintenance of social capital in communities, regions, or states. Institutions or governments take a role at promoting values closely related to social capital such as trust and transparency. At the same time, institutions become a crucial actor within the structure of networks in a given society. For instance, Jackman and Miller (1998: 56) treat political institutions as key actors at generating trust in ethnically divided societies.

However, the institutional agency, whether at cognitive or structural dimensions, introduces another relevant cleavage in the study of social capital. Empirical studies based on cross-

national data emphasizes the stock of social capital in each of these compared societies. These studies analyze aspects of social capital like trust individually, and later they establish a comparison across different spaces. The controversy starts if for instance researches question about how this trust is formed: if it is based on the individual characteristic or if it is molded in a certain environment where other facet rather than sex and age takes place (Harper, 2001).

To consider in the analysis of social capital the weight of institutional agency leads to the dilemma if social capital is context dependent or context independent. In the research based in Putnam's approach (1994, 1995a), social capital is an independent variable with measurable impact over economic growth or political governance. But for many authors, the methodological inclusion of social capital in its context is fundamental for the validation of social capital (Baron et al. 2000: 28 in Harper, 2001). Foley and Edwards (1996, 1999) emphasize and clearly state the context contingent character of social capital. These authors start their contribution from the classical founders of social capital, Bourdieu and Coleman, for whom this capital was attached to a given contextual structure or embedded in a given structure of social relations. In Bourdieu and Coleman social capital is endogenously created in the specific context of social relations. And aspects like trust in Coleman is not a generalized trust like in Putnam studies, but a specific and intense value of trust emerging from certain network structures like the trust among diamond traders. Accordingly to the first analysis of Bourdieu and Coleman, Foley and Edwards state that the "use value" and "liquidity" of social capital is dependent on the specific social context in which is found (1999: 146). At the same time, social relations as in any context are not equidistant one to another. This implies that social capital as investment for social resources is not equally distributed. Up to now the tendency has been that in those studies at higher level of analysis like cross-national levels, they assume that social capital has the same nature and content and it is equally distributed among all the possible networks. But to assume that social capital is context dependent means that the production of social capital is different in every context. Even aspects of social capital like trust have a different or subjective meaning totally dependent on the context where they emerged. And the access to resources is not equally distributed, what make comparisons of social capital across different context an unproductive exercise at long-term. To consider then social capital as context dependent is crucial for a better understanding of the process by which social capital is formed, and it facilitates the access to social resources. This starting point implies significant methodological nuances obviated in the study of social capital as a universal outcome equally measureable across

nations. At the same time, it implies a series of empirical difficulties or challenges in the analysis of social capital that will be target of the next section.

In the distinction of social capital as dependent or independent variable others have posed another dilemma of exogenous vs. endogenous social capital. This is a discussion focused around social capital as a set of values and norms. For Jackman and Miller (1998), in those studies carried out by Putnam, Fukuyama, Harrison or Inglehart, social capital, as community norms and values like trust, has an exogenous character belonging to culture, ideology or religion. Here trust as exogenous asset means that is a value given previously in a given society. This exogenous trust tends to be perpetual along time and more or less generalized to the whole society. It is a culturally shaped value shared by all the individuals belonging to the same culture. For them, in this assertion there is a risk of packaging social capital as a cultural aspect or as a facet of political culture, and ultimately it would make unnecessary paraphrase renew theories of cultures and values prone to cooperation. Accordingly, the trust measured in national surveys have worked whether for cultural studies or for social capital researches indistinctively for its effects on democratization or development processes.

On the contrary, endogenous social capital is a phenomenon very contextualized in the time and space coordinates. Following Jackman and Miller (1998), trust is a social value originated endogenously in the frame of certain social relations embedded in a specific context. Thus, the treatment of social capital as endogenous trust leads to inquire in those arrangements that generated trust. This endogenous trust has its roots in Coleman. For example, the kind of trust among diamonds' traders is much contextualized to the structure of networks and it is a by-product of this community. Endogenous trust is developed specifically within the social relations, independently or a general social trust exogenously and universally existing as cultural value in society.

Once immerse in the study of the structure of networks a subsequent dilemma is whether to conceive social capital made of dense and strong social relations or broad and weak networks. In this distinction two significant approaches emphasizes social capital as a cohesion force in community or as integration process. In the initial systematic treatment of the concept with Bourdieu and Coleman there is clear focus of those tight relations emerging traditionally in small social groups, like in family and small communities in Coleman. The concept of closure represents this ideal form of social capital. In Coleman the social relations where norms can be

more effective and the collective action better achieved are those ones where individuals are related by dense or close ties of frequent interaction. These are ties of obligations and expectations which allow the observance of actors, discouraging from malfeasance and promoting high degrees of trustworthiness. These relations permit the function of social control attributed by Coleman. In the same way, Bourdieu refers to durable networks of mutual acquaintance or recognition especially among individuals of the same social class, sharing ideology, attitudes and habits. The validity of social capital lies in the ability of the individuals of the same social group to maintain their status and exclude possible intruders. Lately these contributions emphasizing the role of close or dense networks of small social groups have converged to what is known as bonding social capital meaning by this, relations among relatively homogenous groups with frequent social interaction.

In the last decades, Bourdieu and Coleman successors have rescued the equally effective role of those social loose relations, not presumably for social control purpose or maintenance of group cohesion, but for enlargement of social opportunities in broad contexts. This value of social capital already appears in classical sociology, for example Simmel's conception of "bridges" (1994). Lately in contemporaneous to classics of social capital emerges the interest over those weak extra familiar contacts. Especially these scholars interest in the role and dynamics of social networks. Granovetter (1973) remarks the strength of weak ties for achieving occupational attainment or general individual's integration in society. One's acquaintances are direct opportunities for mobility within the social stratification. And generally these weak ties act like bridges between separated networks. In the same way, Burt (1992) coins the "structural holes" to refer to those weak connections between groups in the structure of networks like friends, colleagues or acquaintances that in certain moment represent a potential opportunity for one's own benefits. Society is like a market and these structure holes are like relational advantages that positionate individual or actors in better competitive conditions as they have access to other distant groups. They can broker the flow of information between them (Burt: 2008: 34). These authors demonstrated how loose social networks, characterized by weak ties of obligations and expectations, are practically an important source for achieving resources, what practically social capital is about. These contributions claim a bridging social capital, by which social relations tend to be distant, less frequent or not embedded in tight ties of obligations, where actors probably do not share many common aspects, like in a family or any relatively small homogenous social group.

The bonding social capital tends to reinforce the cohesion among individual of a same group, emphasizing redundant information and maintaining the embedded resources. This cohesiveness has a direct side-effect on the clear exclusion of those outsiders, what can be consider as a negative effect of this kind of social capital. On the contrary, the bridging social capital tends to reinforce the openness to other social groups, it is a source of knew knowledge and access to new resources or opportunities. It may convey in an inclusion of outsiders and the exchange among different heterogeneous social groups. The bonding capital in a metaphoric meaning is like a clingy pastry that achieves the cohesion and offers support – both material and emotional- within the group, promoting the exchange of resources among the members in the group. The bridging social capital symbolizes the bridge between distant groups. The investment for or the access to resources in the bridging social capital represents an outward-looking process. Kleinhans, Priemius and Engbersen (2007:1074) show in the Table 3 how different authors have tackled this distinction of social capital internally and externally promoted.

Table 3: Two types of social capital

Social Capital	Internally	Externally
Granovetter (1973) Henning and Lieberg (1996) Portes (1998)	Strong ties	Weak ties (bridges)
Briggs (1998)	Social support (to get by)	Social leverage (to get ahead)
Woolcock (1998)	Integration (group)	Linkage (between groups)
Gittell and Vidal (1998) Putnam (2000) Heffron (2001) in Oorschot, Arts, Gelissens (2006), Warren et al. (1999) in Foley and Edwards (1996) Lozares (2011)	Bonding capital	Bridging capital Linking capital
Lang and Hornburg (1998) in Foley and Edwards (1996)	Social glue	Social bridges
Foley and Edwards (2001)	Within group	Between group
Lin (2001)	Expressive action (homophilous ties)	Instrumental action (heterophilousties)
Burt (2000)	Network closure	Structural holes
Adler and Kwon (2002)	Internal	External

Source: Author's compilation based on Kleinhans, Priemius and Engbersen, (2007); Foley and Edwards, (1996), and Oorschot, Arts and Gelissens, (2006).

These perspectives of social capital into open or dense networks have not emerged as contradictory one to each other, but rather they represent two different use value of social capital and both have been continuously demonstrable. Thus, the discussion whether to stress the use value of bonding social capital or bridging social capital lies basically in the context and the purposive actions in which the networks are embedded. That is, if the context and expected resources are for example to avoid the exclusion of an individual from its basic social group of reference, then dense networks like family members, or long-life friends probably are the potential networks. If the context and expected outcomes are achieving integration of newcomers to a group of homogenous natives, it is obvious the potential value of all possible weak ties among these different social groups. By last, while bonding and bridging social capital refer to a horizontal metaphor of relations between individuals, there is also a vertical dimension on these relations, which allow the individual to get access to institutions. This is linking social capital that for the World Bank means these linkages that facilitate resources, ideas and information from formal institutions beyond the community (Woolcock, 2001). The work of Lozares (1996, 2011) advances in the distinction of the linking social capital from

bonding and bridging social capital that will be discussed in the Chapter 2. More recently, Lozares et al. (2011) take a step forward integrating the concepts of social cohesion and integration with social capital. Social capital integrates aspects that have been traditionally studied under the rubric of cohesion and integration. The authors explain how the bonding and bridging social capital are the relational character of cohesion and integration that we will explain further on in the Chapter 2.

By last, one of the peculiarities that have made of social capital a successful concept in academic field but more especially in the political arena is the supposed beneficial outcomes that social capital promotes. This idea is likely related to the traditional link of social capital links to classical theories, based on what could make a society better (Paxton, 1999: 123). The research on social capital at collective level in forms of exogenous and cultural values and norms has insisted particularly in the positive effect that social capital has in economic welfare and political democratization process. A less visible facet of social capital is that whether networks of cooperation or norms of reciprocity may entail negative effects as well. This harmful character of social capital might help also to understand the perversity of those tautological arguments at defining social capital by its function and results, when these are precisely positive.

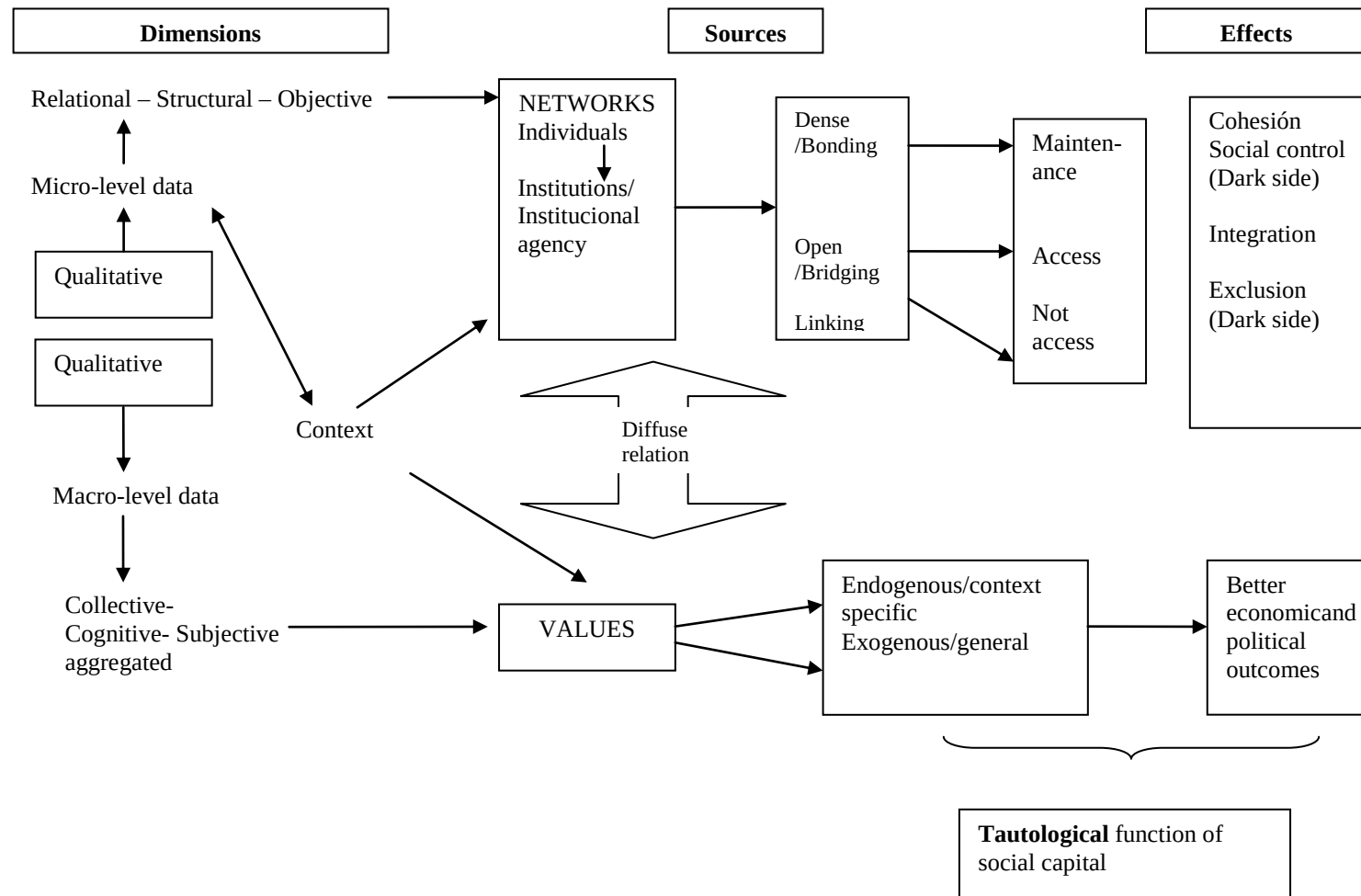
In “The downside of social capital” Portes and Landolt (1996) emphasize that social capital is also a source of exploitation, corruption, efficient criminal groups like mafia, and etc. In this kind of networks structure and for these kinds of outcomes social capital might functions as well. Although, again, its causal relation should not lie on the same circularity of the positive social capital. And the presence of negative outcomes cannot be equivalent to the presence of social capital. Thus, positive and negative outcomes are like the two faces of same coin which is contemplated in many of the definitions of social capital commented above. Neutral enough is for Portes “the ability of actors to secure benefits by virtue of membership in social networks or other structures” (1998: 6), or the “investment in social relations with expected results” of Lin (2003:3), that clearly shows the impartiality of his consensual definition of social capital.

Previously, Fukuyama has recognized a dark side of social capital when he refers to out-group externalities. However, here it is argued that the dark side of social capital is transverse to bonding and bridging social capital. Accordingly, social capital might take two different

slopes. A dark bonding social capital might exert in the form of excessive social control inside cohesive groups. The individuals' initiative might be oppressed through very restrictive norms and tight relations of obligations. At the same time, for those outsiders of the cohesive groups, social capital is a form of social exclusion. If social capital has a positive effect for "we" it has a negative effect for "them". The down side of social capital is mostly considered as undesired consequences at micro level of cohesive groups like the individual oppression or outsiders exclusions (Farrell, 2007). In this micro perspective Portes (1998) specially replaces social capital in the two-way road with four negative consequences of social capital: exclusion of outsiders, excess claims on group members, restrictions on individual freedoms and downward leveling norms. But there is also a dark bridging social capital that though it has not taken so much attention it might take place as well. For instance, when access to certain resources is restricted for those who are outside of certain open networks; or when certain networks are mobilized in order to neglect the exchange of information flows or to avoid certain occupation attainments.

Finally the Figure 2 represents the map of debate discussed in this section about the main aspects and controversies surrounding social capital concept and its operationalization. At the same time, it is identified the measurement through qualitative and quantitative methods aligned to the distinctive structural and cognitive dimension of social capital. Coming back to the controversial analysis of social capital as relational versus as collective phenomenon, or as cognitive versus as structural nature, a direct consequence is in the empirical treatment and methodology used. The empirical research practically is aligned with this distinction. If the conceptualization of social capital is a complex task, the measurement has the responsibility to be comprehensive enough to tackle the multi-dimensionality of the theoretical construct. As it is mentioned above, high expectations are over the empirical research, which is expected to solve or to contribute to the theoretical refinement of the concept, but this will be discussed in next section.

Figure2: Map of Social capital debate



Source: Author's own compilation.

1.3. The measurement of social capital: Proposals of empirical frameworks.

The research of social capital faces a difficult task. Presumably any measurement is preceded by the conceptual clarification (Grootaert, 2001). Precisely, social capital is characterized for being in the continuum process of conceptual discussion and operative building. This confers to the measurement of social capital an inherent difficulty, which still has not found consensus. On one hand, it is assumed that the greater is the empirical research on social capital; the better will contribute to the conceptual refinement. However, the measurement of social capital has become in an explorative exercise, producing a great diversity of studies and dispersion in their research focus. This has contributed to a theoretical and empirical debate surrounded by the confusion. To some extent, this has provoked some questioning about the validity of social capital among others forms of capital like human capital (Grootaert & Bastelaer, 2002: 30).

Thus, social capital is immersed in a gulf between the theoretical understandings and the attempts of measurement (Paxton, 1999; Stone, 2001). In this terrain the methodological research has moved from the strength of applying diverse quantitative and progressively qualitative methods, to a double challenge. First, the measurement of social capital seeks for the fairest approximation to the theoretical underpinnings. Notably the empirical studies have failed at connecting the measures and indicators of social capital to the theoretical definition and its traditional aspects such as norms of trust and networks. Accordingly most of scholars claim for further research (Grix, 2001; Grootaert, 2001; Paxton, 1999; Portes, 2000; Stone, 2001; Van Deth, 2008; etc). At the same time, they are occupied at refining the operative terms, at using the most appropriate methods, and finding the valid relation between the conceptual contents and their indicators.

Second, the measurement of social capital faces the need to separate the sources from the consequences of social capital. In the study of social capital the interest has been frequently in the measure of outcomes (Stone, 2001) in order to correlate aspects of social capital with certain outcomes in the economic growth or political culture and democracy. However, it is important to distinguish what social capital might be from the consequences. In doing so, more recent researches separate the sources of social capital from the possible consequences. For instance, the Social Capital Initiative (SCI)

launched by the World Bank seeks for the developments of indicators of social capital and the measurement of its impact on development (Grootaert & Van Bastelaer, 2002). Paxton uses the General Social Survey to demonstrate how national aggregated data of trust and association memberships enhance public goods such as a healthy democracy (1999: 104). Stone (2001), for researching social capital in family and communities, stresses the relevance of this analytical task, proposing simply to link social capital measurement to the theoretical underpinnings. Only in this way is possible to avoid ambiguous research. Lin (2008) and Burt (2000; 2008) go beyond the operative distinction and establishes a classification of potential benefits or outcomes from the access to networks.

Since the theoretical jump that Putnam made applying social capital as features of regions and nations, the empirical work for capturing social capital - its evolution, effects, comparisons across nations, and its application to specific areas as a motto of political welfare or economic growth – has followed a more quantitative-oriented approach. In this model of research social capital is collected in form of attitudinal and membership data basically in country level where increasing international surveys allow the cross-country comparisons. In the empirical research Fukuyama (2001) distinguishes two general approaches in social capital measurement: those searching for a sort of census of group membership in a given society, and those using survey data on trust and civic engagement. In the same way for Harpham, Grant and Thomas (2002) the empirical studies have taken two patterns: those done at large scale, usually national level, where social capital it is a small component of analysis reduced to trust and membership data; and those at smaller scale where social capital is measured in a more holistic and comprehensive manner.

In a sort of summarizing work, Van Deth (2008) remarks that empirical studies of social capital have relied on four data collection methods which might be categorized under the relational/collective and the structural/cognitive dimension. These methods vary from the quantitative measurement of surveys and statistical data to less numerous qualitative approaches of community studies and anecdotic projects. The surveys and polling methods have been the most common and dominant, fundamentally for observing norms and values, that is, the cognitive dimension of social capital. With this method the study of networks dynamics is more difficult and it is reduced to indicators

about the levels of engagement and associational activity. The most exemplary study was carried out by Putnam. He uses an integrative index of a) intensity of involvement in community and organizational life, b) public engagement, c) community volunteering, d) informal sociability, and e) reported levels on interpersonal-trust (Cote & Healy, 2001: 43; Putnam, 1994, 1995a, 2003). Statistical indicators and official statistics have been also an attractive method complementary to the surveys. But in many of these statistical data social capital is measured by its function or its dysfunction, that is, by its positive or negative outcomes. In the measurement of negative outcomes or dysfunction social capital, the increasing scores in indicators like corruption indexes, crime rates, declining on voluntary membership and etc., are considered as inverse indicators of social capital (Cote & Healy, 2001: 43).

Generally, these studies are characterized by the use of two types of indicators, proxy indicators and distal indicators, that is, direct or undirect indicators of social capital. The proxy indicators are practically outcomes of social capital which are related to the key components of networks, trust and reciprocity (Stone, 2001: 5). Additionally, the general trend using polling methods is that the researches rely on secondary data collected for other purposes using proxy measures to ascertain about social capital aspects. Indeed, this is a logical approach when available data of social capital is limited, and the research is constrained by time and cost. For instance: the World Values Survey (WVS <http://www.worldvaluessurvey.org/>); the European Social Survey (ESS <http://www.europeansocialsurvey.org/>) in Oorschot, Arts and Gelissen (2006); or the Euro-barometer survey (http://ec.europa.eu/languages/languages-of-europe/eurobarometer-survey_en.htm) (EB 44) in Schneider, Plümper and Baumann, (2000). They have been the most common data bases for these purposes, but also national surveys like National Educational Longitudinal Study (NELS) used by Portes (2000) or the longitudinal data available in the General Social Surveys used by Paxton (1999). The most famous proxy indicator used has been social trust. But the risk of using proxy data is quite evident if already the existing data designed for other purposes is taken for the study of a concept revealed as complex. Following Harper's analysis (2001) different authors agreed that to infer from the idea of "most people can be trusted" conclusions about the stock of social capital in different societies is nothing more than a mediocre but decent approximate measure of social capital.

Other types of indicators used for measuring social capital are distal indicators. They are not directly related to any key component of social capital (Stone, 2001). Generally these indicators mostly related to the population, like life expectancy, unemployment rates, rent per capital, distribution of households, etc, aspects of political organization, or social exclusion and disintegration. These indicators should not be contemplated in the empirical measurement as they contribute to the tautological conclusions about social capital. Grootaert (2001) resumes in the Table 4 many of these both proxy and distal indicators used in empirical studies.

Table 4: Indicators of social capital

Horizontal associations	
Number and type of associations or local institutions Extent of membership in local associations Extent of participatory decision making Extent of kin homogeneity within the association Extent of income and occupation homogeneity within the association Extent of trust in village members and households	Extent of trust in government Extent of trust in trade unions Perception of extent of community organization Reliance on networks of support Percentage of household income from remittances Percentage of household expenditure for gifts and transfers
Civil and political society	
Index of civil liberties Percentage of population facing political discrimination Index of intensity of political discrimination Percentage of population facing economic discrimination Index of intensity of economic discrimination Percentage of population involved inseparatist movement Gastil's index of political rights	Freedom House index of political freedoms Index of democracy Index of corruption Index of government inefficiency Strength of democratic institutions Measure of 'human liberty' Measure of political stability Degree of decentralization of government Voter turnout Political assassinations Constitutional government changes coups
Social integration	
Indicator of social mobility Measure of strength of 'social tensions' Ethnolinguistic fragmentation Riots and protest demonstrations Strikes Homicide rates Suicide rates	Other crime rates Prisoners per 100,000 people Illegitimacy rates Percentage of single-parent homes Divorce rate Youth unemployment rate
Legal and governance aspects	
Quality of bureaucracy Independence of court system Expropriation and nationalization risk	Repudiation of contracts by government Contract enforceability Contract-intensive money

Source: Grootaert (2001).

Doing a retrospective evaluation, Castiglione, Van Deth and Wolleb (2008) remark that despite it might be believed, there have not been great empirical diversity in the indicators used in traditional polling and surveys. Other major critic to this empirical research is that social capital has been studied as an aggregated of individual responses. In the empirical research up to now, though social capital is understood as a community characteristic or property, in practice the measure is done through the collection of individual data. Surveys obtain information of individuals according to their subjective perception. Later on the conclusions for explaining social capital in the society result from the agglomerate of all these individuals' answers compiled. It is then an analysis based on attributes collected at individual level. For instance, Paxton's theoretical model of social capital is clearly decomposed by the association and trust categories, though both are operativized into more concrete subcategories. She proposes to study social capital in an aggregate manner. Trust is measured by the aggregate of individual responses to questions about trust and associations, and social relations are measured by the aggregate of formal membership and informal relations indicators. In a different field of interest Harpham, Grant and Thomas (2002) quote two studies that most have guided health-related studies of social capital, as typical examples of these kind of research. But as Portes and Landolt (1996) alert, the collective social capital cannot be measured as the simply sum of individual indicators ascribed to social capital.

Following Van Deth's classification, less numerous methods have been the Community studies and observations. They are appropriate methods if the purpose is to study social capital as a process through people's networks. For instance, Van Deth mentions the CID project "Citizenship, Involvement, democracy" funded by the European Science Foundation. In the second phase of this project interviews are applied to activist and volunteers of the communities. There are also some mentionable projects and experiments, though in this kind of research social capital is defined by its functions and measured by expected consequences. He emphasizes the experiment carried out the Reader Digest mentioned by Knack and Keefer (1997: 1257). An experiment of intentional losing of wallets containing money in several cities, the number of returned wallets was used as predictor of social trust at the time of inferring information of social capital as a collective good. However, though this kind of experiment is primary data, they end to be also approximative measures to some aspects of social capital. As Knack

and Keefer (1997) comment, there was high correlation between trust of World Values Survey and the number of wallets returned.

The quantitative oriented research still encounters with a rather complex concept, with multiple facets. Some scholars refer that the empirical research seems to be in a “immature period”, or in its “infancy” (Cote & Healy, 2001) which has not been capable to tackle the main assets attributed to social capital (networks, values and norms) and the relation between its structural and cognitive nature. These surveys and statistical data seem not to encompass the density of social capital. For instance, how to measure the differences of bonding or bridging social capital, how surveys can assure that certain civic engagements are not negative for certain social groups; is it considered in questionnaires the role of institutional agency?, or how surveys might tackle the slippery ground of informal social relations?. At the same time, despite efforts through longitudinal surveys, these methods take punctual photographs of those proxies to certain stocks of social capital, skipping the meaning of a process of investment inherent in social capital. In this sense, the quantitative approach has narrowed the measurement of social capital to the cognitive-individual-attitudinal facet of social capital (Van Deth, 2008; Harper, 2001). These traditional quantitative measures have not captured the multiple nuances of social capital manifestations. Logically, the conclusions of this quantitative approach with survey and statistical data have played a funnel-role at explaining the complexity of social capital concept.

In last decade a debate has come out about the ideal measurement of social capital (Castiglione, Van Deth & Wolleb, 2008; Cote & Healy, 2001; Farrel, 2007; Grix, 2001; Harpham, Grant & Thomas, 2002; Inkeles, 2000; Morgan & Swann, 2004; Roche, 2004; Stone, 2001; Van Deth et al, 1999; Woolcock, 2001). Different scholars have made new attempts to go beyond the limits of the traditional quantitative researches apply ingmixed-method (quantitative and qualitative) and multi-level methods approached. For Van Deth generally the mixed-methods approach use other complementary methods to the dominant surveys and polling methods, like the experimental methods. And practically refined mixed methods researches are something more rare than average (2008: 165). In current research is clearly assumed that the idea of creating a sort of census of a society’s stock of social capital is practically impossible (Fukuyama, 2001: 15) or unnecessarily if the study of social capital seems to be self-

filing in the context where its embedded. However, the measurement of social capital has spread out over a multilevel - using jointly micro-meso and macro indicators of social capital-, and at the cross-context level (Van Deth, 2008: 167) - making comparisons of social capital in different contexts, communities and nations- like the works of Krishna and Shrader (2000), within the Social Capital Initiative (SCI) from the World Bank, or those of Lillbacka (2006), Onyx and Bullen (2000), or Bullen and Onyx (2005).

To construct an specific and deliberated empirical frame for social capital measurement has become necessary. In doing so, Cote and Healy (2001) in their work for the OECD propose that the ideal measurement is pretended to be comprehensive enough to coverage all the key aspects of social capital, balanced between the cognitive and structural dimension and contextualized to the space and time coordinates in which social capital is measured. Increasingly more scholars state that is possible to create more reliable and valid measures of social capital using surveys-matrices with different indicators of cognitive and structural social capital (Bullen & Onyx, 2000; 2005; Grootaert, 2001; Paxton 1999, Stone, 2001). In their opinion, there should be more ad-hoc appropriate and original studies. With these purposes, in last decades several research projects have been accomplished with the support of different national and international institutions increasingly worried and interested in the relevance and impact of social capital in their societies. In these projects, the measurement of social capital have become in a more realistic task. Among them several empirical approximations could be distinguished.

For instance, among professional and scholars in the field of health there is an increasing awareness of the relation and the influences of social aspects in health. They value the benefits that social support has over the health of population. Several attempts have proposed instruments for the measurement of social capital, for instance the work of Kreuter et al. (1997, 1999, in Stone, 2001). Others like Harpham, Grant and Thomas, (2002), Morgan and Swann (2004), and Blaxter (2004) have worked for the refinement of surveys and the combination with other qualitative methods.

At international level there are also some mentionable works. The Social Capital Initiative (SCI) was launched in 1996 by the World Bank, an institution clearly

interested in social capital research based on the potential benefits over the societies. This initiative has sought for the development of best indicators and methods for measuring social capital and its impact on development. Through this initiative 12 studies were selected with a broad methodological variety. One of the conclusions of the SCI is that, supporting previous Fukuyama's statement, it is not possible to find the "best indicators" applied as universal or cross-context indicators. Instead is possible to reach a consensus with three broad classes of indicators underlying the quantitative analysis of social capital (Grootaert & Van Bastelaer, 2002). They created an integrated questionnaire for social capital measurement (Grootaert et al. 2003). The CID project represents other international initiative in European countries. This research carried out by the European Science Foundation worked for the creation of "common core questionnaires" about population and civic voluntary associations' activity, to be used in each country in a similar way.

At national levels significant contributions have come from United Kingdom (Roche, 2004) and Australia and New Zealand. Harper (2001) has designed an integrative measure used in the Socio-Economics Inequalities Branch at the Office of National Statistics (ONS) of United Kingdom. He proposes a framework of a harmonized set of questions capable to cover all the key aspects of social capital (networks, values and norms), and creates a survey-matrix, better elaborated in 2002 report (see Table 5). The matrix has five dimensions each of them related with the key aspects of social capital, and with given examples of the facets which can be measured. The survey matrix contemplates the structural (networks) and cognitive -values, norms and cooperation-dimension as well as social capital as an individual and collective property. This survey relies also on the analysis of social networks from formal institutions like state institutions, organizations, etc., to informal institutions like family and friends - (Spellerberg, 1997, in Harper, 2001: 18). The perception of local area is considered to be important in this matrix in order to contextualize the measurement of social capital. Though Harper does not indicate it, the classification of the five dimensions has been included according to the individual and collective level of analysis.

Table 5: Survey-matrix for social capital measurement

Level of analysis	Dimension (aspect of operational definition to which the dimension relates)	Facet for which measures may be developed
Individual	Social participation (networks)	Number of cultural, leisure, social groups belonged to - Frequency and intensity of involvement - Involvement with voluntary organisations - Frequency and intensity of involvement - Religious activity
	Social networks and social support (networks)	Frequency of seeing and speaking to relatives, friends or neighbours - virtual networks - frequency and intensity of contact - how many close friends or relatives live nearby - who can be relied on to provide help - who provide help to - perceived control over life - satisfaction with life
Collective	Reciprocity and trust (shared norms and values)	- trust in other people who are like you - trust in other people who are not like you - people will do favours & vice versa - perception of shared values
	Civic participation (co-operation)	- confidence in institutions at different levels - perceptions of ability to influence events - how well informed about local or national affairs - contact with public officials or political representatives; involvement with local action groups; frequency - propensity to vote
	Views of the local area (shared norms and values)	- views of physical environment - facilities in the area - enjoyment of living in the area - fear of crime

Source: Model of Social Capital Measurement (Harper, 2002: 5).

Other significant contributions to the measurement of social capital come from Australian and New Zealand. In both countries there have an increasing recognition of social capital potential applications. Statistics New Zealand and the Australian Bureau of Statistics have invested empirical efforts on this task, for which has been established also a working connection with the above mention Office for National Statistics in UK (Spellberg, 2001). Many of the proposals from this social capital working net have been holistic and very integrative surveys as the main measurement tool for social capital. Their questionnaires have been designed in order to encompass not only all features of key components of social capital, but also they incorporate the context where the surveys are applied.

Among scholars from this branch, Bullen and Onyx (2005), started from a discussion with participating members of both countries. They made a draft questionnaire capturing what people thought would be the characteristics of communities with high levels of social capital. This questionnaire has eight distinct elements that all together define and make possible the measurement. Each of them are related to a variety of questions. In the Table 6, the eight elements of social capital are categorized by the main dimensions of analysis, participation and connections, and the building blocks, which are distinctively the structural and cognitive dimensions of social capital.

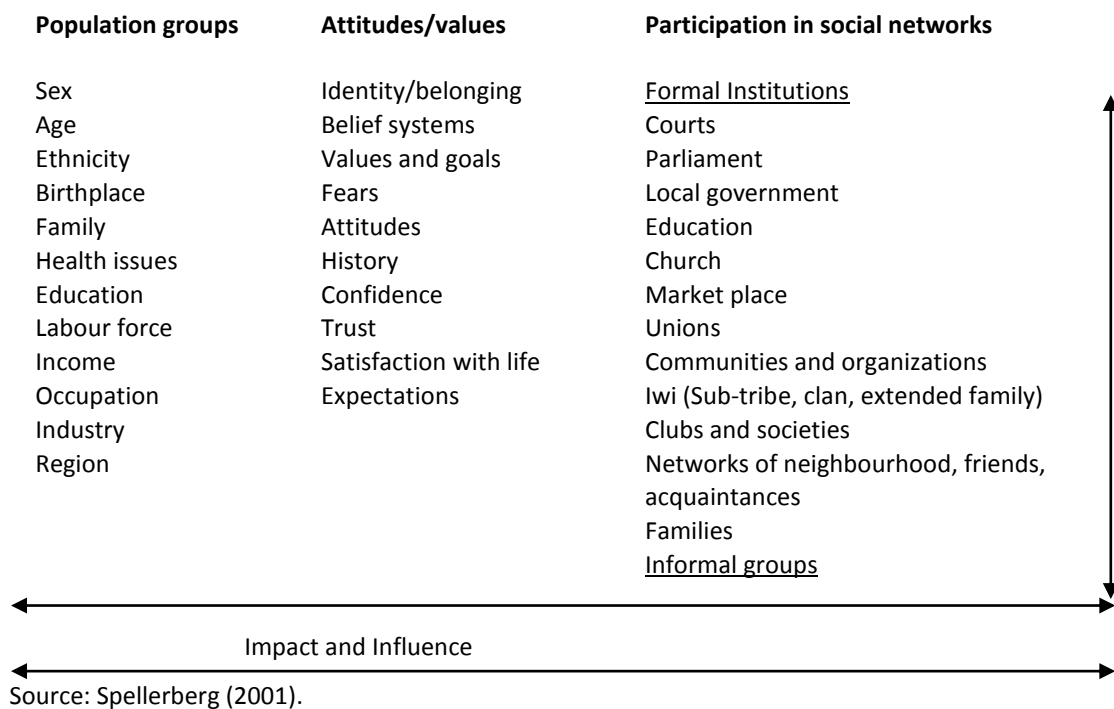
Table 6: Elements of measurement of social capital

Elements of social capital	Dimensions of social capital
Participation in local community	Participation/connection Structural social capital
Family and friends connections	
Neighbourhood connections	
Work connections	
Pro-activity in a social context	Building blocks of social capital Cognitive social capital
Feelings of trust and safety	
Tolerance of diversity	
Values of life	

Source: Compiled by the author, based on Bullen and Onyx (2005).

Very related is the measurement proposed by Spellerberg (2001) in New Zealand. Social capital measurement is targeted to three different groups of data. Population, Attitudinal and Participation data. A draft framework was developed in 1997 for the measurement of these components, based on Coleman's conceptual aspects of social capital (2001: 11). Additionally to the study of both structural and cognitive aspects Spellerberg underlies the relevance of the population characteristics because it is necessary to understand the community, what includes not only demographic aspects but also others like family, cultural and employment aspects. This model has also certain distinctive characteristics. An interesting particularity of Spellerberg's measurement framework is that aspects like identity, sense of belonging, belief systems and ideologies are crucial components of the attitudinal analysis of social capital, besides the traditional measurement of trust and other values. At the same time, the Statistics New Zealand has incorporated the characteristics of New Zealand society, including the Maori vision and concept of social capital. Thus, the analytical framework developed by Spellerberg is much contextualized and stresses those aspects that for Maori society should be considered in the analysis of social capital.

Figure 3: Three component model of social capital measurement



This initial framework represented in the Figure 3 was refined into a four category model, the “organization” component to examine the role of organizations as social structure and likely to help to understand the other three components. In this final draft (see Spellerberg, 2001:20) is possible to analyze what people do (behavior), what people feel (attitudes and values), what people are (population groups) and how is the organizational activity. Spellerberg defends a case-study approach for measuring social capital, as the best method for measuring not only the quantity but also the quality of relationships. However, for his proporsal he turns to the available survey data in New Zealand from which to take indicators that measure social capital aspects.

Stone (2001) is other of the relevant researches besides the Australian matrix-surveys approach. Stone stresses the need for further research for linking congruently the measurement of social capital with its theoretical components avoiding a traditional tautological explanation of social capital. His analytical frame, represented in the Table 7, adds a different approach to the analytical frame of others described above. Unlike his colleagues, he states for the network analysis developed by Scott (1991, in Stone, 2001), in tune with Lin’s study of structural social capital through social network analysis. Although Stone does not specify much about it. The integrative framework of Stone does not separate the structural dimension from the cognitive a priori, but rather

includes the analysis of norms of trust and reciprocity very contextualized to the structure of networks. By this analytical distinction he studies the specific trust and reciprocity emerging from the specific networks at the stage. This more contextualised vision and measurement of trust is the trust argued by Coleman and the endogenous trust of Jackman and Miller (1998). For Stone, while the study of networks has received more attention, the cognitive analysis of social capital has been shadowed, and concentrated in the analysis of generalized values of trust. For that reason it is important to consider that norms of trust or reciprocity “are likely vary across different networks types” (Stone, 2001: 25) as it is not the same the trust between members of a family that the trust between members of company, or members from different institutions working together.

Table 7: Analytical frame for social capital measurement

Dimensions		Operative categories		Measurement
Structural	Social networks	Structure (size, dispersion)		Network analysis
		Nature of networks: density, frequency		
Cognitive		Content	Flows of good and services Norms of exchange: Norms of trust and reciprocity operating within the structure	

Source: Author's compilation based on Stone (2001).

The particularity of all these proposals for measurement social capital is not only that they design models of most appropriate holistic or integrative questionnaires or analytical frames, but also they propose other alternatives measures. Most of them claim to some extent the use of more qualitative methods stating as the ideal measurement a mix-method approach as Van Deth points above. Spellberg (2001:10) propose the study case approach as the best way for capturing the context manifestations of social capital which might be suitable for considering the Maori concept in New Zealand. Roche (2004: 108) proposes that in-depth interviews and focus groups should be complementary to surveys and a mean to guarantee the context-sensitive of social capital. For Stone it is important to use qualitative instruments for a collective measurement of the community itself, instead of focusing exclusively in aggregate data of individuals of the community. Participant observation, surveys to individuals about the local area could offer significant understanding of social capital (Stone, 2001: 3). From those health-oriented social capital researchers, qualitative methods are necessary

to flesh out the more dominant quantitative methods like thick descriptions or case studies (Harpham, Grant & Thomas, 2002: 108).

However, most of these claims do not go beyond their desirable statements. And those studies applying mix method are less numerous. For instance Kreuter, Young and Lezin (1999) use local documents and histories for their micro level study in small communities (Stone, 2001: 3). It is mentionable the study of Stewart-Weeks and Richardson (1998). They use in-depth interviews to show 12 study cases of Australian households. They touch different aspects of social capital like who they trust, who they call for assistance, how they participate in their communities, and how they support to others (family, friends, and neighbours). With this qualitative study the authors want to leave no doubt about the relevance of social capital demonstrated with qualitative research, contributing to the research on social capital. Nevertheless, works like this by Stewart-Weeks and Richardson using only qualitative research are less frequent.

Nevertheless, the demand for applying more qualitative methods to research social capital is a constant (Devine & Roberts, 2003; Farrel, 2007), against the limitations commented above of quantitative methods and specially in those studies at local or community levels. For those more qualitative oriented researches the context where social networks and values of trust are embedded is an important conditioning. At the same time, the qualitative methods are likely to facilitate the understanding of the meaning and interpretation of the local area, networks and values given by the individuals of the community. New aspects considered in previous analytical frames like identity, belonging (see Figure 3) or pro-activity in the social context (see Table 6) are more prone to qualitative methods like interviews. Indeed, this qualitative claim rescue the original empirical treatment of social capital through study cases at the micro level analysis used in first social capital contributors like Hanifan, Loury, Coleman or Bourdieu. For the argumentation of social capital dynamic classical authors turned to the study case at family or community level of the societies where they belonged. This method allowed explaining the dynamics or processes by which relational activity reported into individual and community benefits.

At this point, the distinction that Grix makes between two methodological paradigms in social capital clarifies also the relevance of qualitative methods for a more holistic

understanding of social capital. A traditional Putnam School is formed by those scholars and researches based in social capital as a cognitive feature and use quantitative methods. But there is a more recent and second strand, the structural and institutional social capital. This approach is prone to Coleman theoretical interpretation of social capital and to qualitative methods. It incorporates the context dependency of social capital and institutional agency, commented in previous section. Grix defends a more structural and institutional social capital besides a cognitive and collective approach used by Putnam followers. The new paradigm implies a return to the “original” social capital debate initiated from Coleman for whom social structures facilitate the information flow and access to social networks (Grix, 2001a). For this strand is necessary to study the quality of relations between individuals and between institutions. Thus, with qualitative methods it is possible to capture these process or flows of information across networks and to understand how they facilitate the access to resources.

The qualitative methods should be complementary to quantitative surveys. More scholars find in qualitative research the best way to solve many of the measurement pitfalls or challenges discussed at the beginning of this section: to approximate the measure of indicators to their equivalent theoretical underpinnings; to separate systematically the analysis of sources of social capital from its often attractive consequences; or the complex relation between cognitive and structural aspects of social capital. According to these dilemmas Devine and Roberts (2003) find on qualitative methods the perfect and complementary tool for assessing holistically social capital. According to the last pitfall, they state that surveys and polling methods are appropriate for establishing correlations between variables. However, they cannot account for the relation of internal and underlying process that relates things together, specially the unresolved relation between networks and norms. Additionally these authors defend that informal relations shape people participation in groups’ activity and associational membership. This process is only possible to seize through the simple technique of “talking to people”. The qualitative research can also avoid to the quite spread spuriousness of social capital effects attributed in quantitative research. For instance, Devine and Roberts (2003) prove through in-depth interview that people involved in associational activity can hold a very negative evaluation of governments performance. This conclusion, if does not contradict, it introduces nuances to the general assumptions

that civic engagement or associational activity are signs or outcomes of a healthy democracy. Thus one of their conclusions is that the qualitative methods are those capable to reveal the complexity of social capital in day to day life (Devine & Roberts, 2003: 97).

CHAPTER 2: SOCIAL NETWORKS AND SOCIAL CAPITAL: AN ANALYTICAL APPROACH FOR THE STUDY OF CROSS-BORDER COOPERATION

2.1. The structural analysis of social capital.

In previous empirical attempts (see Chapter 1), the measurement of social capital was a difficult task as the purpose was to create the most integrative measure of all the recognized and agreed aspects of social capital (Stone, 2001; Spellerberg, 2001; Harper, 2002; Grootaert & Van Bastelaer, 2002; Bullen & Onyx, 2005; Cote & Healy, 2001; Van Deth, 2008). All these researches for measuring social capital assume that the concept is compounded invariantly of norms and networks. Thus, these original analytical frames of the survey-matrix of Cote and Healy, (2001), Stone (2001), Spellberg (2001), Harper, (2002), or Roche (2004) achieve to be at the most holistic measures of the both cognitive and structural dimensions of social capital. At the same time, conscious of the quantitative limitations, it is assumed that qualitative methods likely contribute to understand how norms and networks relate one to each other, that is, how social capital really works, though few studies really materialize this ideal (Van Deth, 2008). The difficulty at studying social capital arises when social capital is conceived as norms, and trust related to networks when the empirical discussion has not refined yet how this relation operates. The conception of social capital as cultural and structural it is also provoking as it reproduces the chicken-egg problem, in whether networks shape trust, or whether social relations in order to emerge and be maintained need for previous shared norms of trust and reciprocity.

The study of social capital as a network structure is parallel to those empirical efforts for which social capital is conceived as both cultural and structural. Social capital has received attention from structural oriented scholars who have placed the study of networks as the fundamental empirical approach to social capital. In the structural approach social capital is fundamentally a relational asset that can be clearly separated from the confusing cognitive attributes like trust and reciprocity. Social capital is a relational process that takes place in a given context or structure of networks. Thus, it cannot be studied through the observation of individual attributes, but through the measurement of procedural relations by which actors (individuals or institutions) get

access to resources. Granovetter (1973) and Burt (1992) have made precedent contributions for other scholars' insights in the causal relation between networks and certain outcomes like the access to market profits, labour-organizational mobility, professional promotion, or entrepreneurial brokerage (Burt, 1997; 2000; Erikson, 2008; Flap & Boxman, 2008; Lin & Dumin, 1986; Lin & Erikson, 2010; Marsden, 2008; Mizruchi & Stems, 2000; Podolny & Baron, 1997). They all emphasized the network content of social capital and the advantage of structural holes and weak ties in network structures. Through the study of the actors' interactions with others is possible understand how people get access to certain resources like personal promotion at work, access to labour market, access information flows, etc. If for Coleman (1988) social capital seems to be the most controversial kind of capital in empirical terms, social network analysis is an exercise to make tangible the empirical apprehension of what is a part of social capital.

Whether if we understand social capital as resources embedded in loose relations or support from redundant relations, social capital has become in a relevant research area for social network analysis. More recently the work of Burt (2000; 2004) and Lin (2008) have positioned the social capital paradigm as a viable theory of network structure using network analysis as the potential mean for placing social capital as a social science. Both authors avoid the analysis of distal indicators. They conceived social capital not like norms and networks, but as *“social ties that occupy strategic networks location and or significant organizational positions”* and that facilitate access to resources (Lin, 2003: 24; Lin & Erikson, 2010). Social capital is above all an advantage or a relational activity that produce “brokerage opportunities” (Burt, 1997; 2000). They operationalize the study of social capital through the network analysis, and underline different kind of returns that networks might involve. In this sense the double component of social capital (relations and resources) was anticipated by Bourdieu who is recurrent reference of these authors. Their research is focused in the study of the brokerage function of loose ties, structural holes or open networks previously studied by Granovetter (1973; 1983), rather than the effect of dense networks and closures. However, they contemplated that whether closures or brokerages entail distinctive functions of social capital that need to be valued considering the context or contingent factors. Weak ties, open networks or structural holes imply the change. They serve for accessing to new opportunities (resources or positions); they imply brokerage between

cohesive groups. For this “hole” argument, these kind of networks will be valuable for those individuals searching for new jobs, or obtaining resources not available in the cohesive group where they belong. On the contrary, for the closure argument dense networks imply cohesion and stasis within cohesive groups. Accordingly, strong relations will be very valuable between like-minded people that try to preserve and maintain the resources or positions possessed by the group (Burt, 2000; Lin, 2008).

Although this Chapter is more focused in the network analysis, as part of the analytical frame for the study of social capital, it is important to add the value that returns gain for the study of social capital as well. In this approach the structural social capital can be measured through networks and resources as both forms of social capital. The investment in networks facilitates the access to embedded resources that can operate as measures of social capital. To measure the returns attained through networks makes to avoid the tautological circle in which is based the principal pitfalls of social capital. In this sense, Burt and Lin immersed in those empirical accounts on resources, benefits or gains that the investment in bridging networks imply. There is sufficient empirical evidence at proving that the greater cost of brokerage is offset by the outcomes, though the benefits from bridging structural holes tend to disappear as more people use the same structural holes (Burt, 2000: 12). Lin (2008) considers the debate on whether networks are measures of social capital or precursors of social capital but refuses any debate on the resources as valid measures for social capital. Resources embedded in networks are then a core element in the study of social capital. Thus, he proposes a very detailed map of benefits from contact’s resources and from network’s resources (see Figure 1 in Chapter1). This model is applied by the author for the occupational attainment, and it explains the process of social mobility within the social organization.

We synthesize briefly the general advantages or benefits that the bridging relations might drive for. In Lin (2008) networks facilitate first the flow of information. To have access to certain information through one’s own contacts can imply the difference in the access to opportunities or choices not available for all people. Behind this benefit is one of the main motivations for investment in networks, as the access to the valuable information implies reduction in costs of transactions, whether at individual’s level when they are searching for a job or at institutional level when they are searching better market or institutional opportunities. Second, through actors’ network it is possible to

participate or influence in decision making processes that affect the actor. In the same way, an institution might exert stronger influence in important decision processes through its networks. Lin underlines that a third type of gain is the actors' social credential in terms of actors' resources and actors acknowledged relationships. This might reflect the accessibility to others that the actor possesses beyond his personal capital. By last, the forth type of benefit takes place when social relations reinforce identity and recognition. Social ties assure actors worthiness as individual and as member within the social groups which are fundamental for the maintenance of actors' position and resources (Lin, 2008: 7).

Burt (2000) identifies three different types or general gains that emerge from the brokerage of structural holes. Though they are much related. They are considered as competitive advantages that might better positionate actors within the community or the social group where they are located. Those actors and institutions that bridge through those structural holes to other social groups enter in a terrain that enhances the possibilities to increase their creativity and learning. With different empirical evidences Burt (2000) emphasized how people with significant different contacts from other distant social groups showed stronger performance in their work. Creativity and learning refer to greater possibilities for new ideas at work or at solving an institutional problem, being more productive and having greater knowledge of the context where they are located. Those immersed in dense networks have less knowledge of the social structure where they are embedded, while those people exposed to structural hole tend to learn faster the network structure. They get the whole picture of the net. This advantage is directly related to the information flow benefits, as for being more creative and getting better knowledge is necessarily to get access to information's flows or to create information flows across structural holes. A second gain closely related to creativity and learning is the process of brokering. People create value, in terms of productivity and creativity, also when they bridge structural holes. Burts refers to different empirical evidences that show when different and distant sectors, professionals, headquarters are integrated. Industries productivity, broker's success, efficient interdisciplinary teams, or brainstorming groups are examples of the diverse advantages from bridging separate units or groups. Third, entrepreneurship is a competitive advantage present in actors accessing structural holes. Actors create value as they bridge structural holes. In this sense, entrepreneurship is considered as the

capacity to bring together the potentialities of distant actors, and those who are entrepreneurs have likely a diverse personal network. This potential value is also very related to the creativity and learning capacity as those with better knowledge of the complete structure of networks are capable for creating the perfect matches.

The other core element in structural social capital is formed by networks. For this network structure of social capital the measurement of social capital is the measurement of networks (Lin, 2003; 2008). Network analysis become in the technology of social capital theory (Burt, 2000). Indeed in the Australian approach, Stone (2001) points also to social network analysis as the most appropriate method in social capital for the research of networks role and associational activity. But she rescues it succinctly and does not go in depth. Within this structural approach the measurement becomes a systematic procedure focused on networks. Network indicators - like density, cohesion, closeness of networks or the size of certain structure of networks like could be individuals within a corporate organizations - whether as open or dense networks, will be part of the empirical research in this work, and in the next section we will tackle the main indicators for measuring social capital in the context of cross-border cooperation. Network analysis emerges as the most feasible method for the study of relations between individuals, groups, organizations, etc. Despite all, structural oriented authors like Foley and Edwards (1999) alert about the “over-networked concept of social capital”.

The study of social capital through networks takes its roots on the work of structuralist authors. And those scholars centered in the study of social capital through networks have been located simultaneously in the development of social networks analysis. For them the structural approach is based on the study of social actors' interactions, which have certain patterns observable through specific measures. If social capital was first presented as a complex term with diffuse conceptual and analytical delimitations, social network analysis reduces the study of social capital to its most irreducible unit of analysis, the relation. The social network analysis has demonstrated, so far, the capacity to explain the causal relation between the sources and resources of social capital, solving the tautological controversy of social capital.

The empirical approach to social relations has progressively evolved into an organized paradigm of research defined as social networks analysis. It is based on the structural intuition that ties link actors; it is grounded in systematic empirical data; it relies heavily in graphic imagery and in the use of mathematical and/or computational models (Freeman, 2004:3). Since the development of systematic networks methods, social capital research has found consistent empirical basis to consolidate itself in social sciences. Thus, the use of network analysis for social capital research deserves specific treatment in this Chapter as it will be a significant part of this work.

2.2. The social networks analysis.

Classical authors of sociology brought out how traditional societies based on simple and support social relations tended to change into more complex social relations. Comte's (1789) concerns were to demonstrate that society was moved by "laws of social interconnection". Tönnies (1887) distinguished between the *Gemeinschaft* as the community with direct and informal ties and *Gesellschaft*, as the society with formal and indirect ties. Durkheim's (1893) emphasized the change of the mechanical solidarity to the organic solidarity, and anomie as a symptom of less cohesive relations in society. The idea of the individual immersed in continuous interaction was taken by the sociology as its own empirical and theoretical terrain. The historical and principal concerns of sociology were the interaction among individuals, and how they created social structures in which actors' thoughts and behaviors are embedded. The contributions of these authors demonstrated and deployed the first intuitive notions for network analysis (Freeman, 2004).

One of the first conceptual ideas that any neophyte student of sociology learns is that social structure is composed by different parts related one to another and the change on one of them it has certain impact on the rest of them. At the same time, it is told that the social system is not the sum of its parts but much more. Paradoxically, the study beyond the individual and his attributes has been targeted to the study of social groups as a set of individuals knitted by certain variables, certain interests during a certain period of time. And the metaphor of connectedness or interaction between individuals or social actors in general used to be reduced methodologically to the empirical concomitance of specific variables.

The original object of study has been replaced methodologically by the study of social groups and collectives. Traditionally social sciences try to explain collective behaviour of groups and societies independently on the role of possible relations and type of connection between members of the groups. Its empirical research has been influenced by the atomist and attributive approach (Lozares, 1996). Individuals are considered as independent and as recipient of different ranges of inherent and observable variables like sex, age, level of study, job positions, etc. The individual is considered independent in his/her opinion or subjective interpretation about any given aspect or as autonomous people moved by personal rational and purposive action. The concomitance of these variables or attributes among individuals is the key for establishing the intended interaction among those individuals or the criteria for placing individual in one social group or community. In this perspective, the individual is taken out from the social context where he belongs or where his actions are completely meaningful. Additionally, this atomist and non-contextualized approach implies that the individual as a differential access to resources of society according to the presumably inherent attributes he/she has (Lozares, 1996). For some authors the social sciences have been dominated by a meat-grinder approach in which individuals are separated from their social context and intrinsically interactive existence (Burton, in Freeman, 2004). Accordingly, this analysis is based on the popularity of surveys and questionnaires. The population is taken at local, regional or national levels or data collection and are considered members of collectives by the coexistence among them of the variables at interest. An important line of social research continues to be based on statistic data as the most suitable analysis for studying macro-phenomenon in societies and comparative research. This paradigm of research is necessary and has demonstrated to be crucial for the comparative studies across nations, for the design and development of public policies and for market strategies.

Looking back to previous Chapter 1, the atomist and attributive paradigm of research has been an important approach in the research of social capital. Putnam's research of social capital in different regions of Italy or in USA is exemplary. Precisely, the vast criticism received lies on the non-contextualized analysis and the methodological individualism of the survey method. Most of the research within the Putnam's school and the Australian-New Cealand approach is based on the cognitive dimension of social capital and on collected data from individual's attributes related to social capital or

distal indicators. This approach has put social capital as key stone for development policies and has permitted comparisons at macro level of the possible stocks of social capital across societies. But individuals are immersed in their interactive and contextualized existence. To understand the way people access to resources; why they are positioned in certain places of the social organization; how individual and society influence one to another in the unresolved relation of micro-macro analysis have been core concerns in social sciences. Indeed the origins of sociology are the interaction or relationships, rather than groups and associations of actors according to unifying criteria. The sociology finds its epistemology or knowledge terrain in social relations. This relational nature of actors is the elemental unit of analysis in sociology (Lozares, 1996) that the attributive and atomist approach has proven to be inefficient to catch up the complexity of the social reality.

By contrast, with the relational and structural paradigm is possible to represent the whole social structure where actors appear to be related in a way or another. In social network analysis the unit of analysis are not social groups or individuals but relations among them. However, it does not mean that attributes are not relevant, as the relations have attributes and are influenced by the attributes of the social actors. The structural paradigm is based in the intuition of many founders of social network analysis (SNA), for whom the patterning of social ties has relevant and inevitable consequences. Social network analysis is the discipline that explores the patterning of relations among social actors (Breiger, 2004) that relies on the idea that the whole society is a big network (Requena, 2008) composed by social actors at many different layers: states, companies, institutions, social groups or individuals. The query in SNA is how are the relations that different social actors maintain in terms of quantity and quality. For instance, the case of several institutions working together through projects which are the links between them; the attributes of those projects are the attributes of the relations. Equally, the attributes on each institution might influence on the structure of relations. But social network analysis does not only describe the social structure, but also interprets the influence of the relations and position within the social structure in actors' behaviour (Marsden, 1990).

The basic idea for social network analysis is that from the relations of pairs is possible to represent and to analyze a complete network that is the social structure built among

those multiple pairs of actors. The simplest unit analysis starts from the dyadic relation among two actors. From the data of those relations is possible to analyse the existence of groups, the positions or certain actors in this social structure, those actors better positioned, etc. According to the picture represented in this social structure is possible to understand that actors' opinions or behaviour are depending on their relations and their position within this social structure. This social structure is methodologically constructed whether from objective information like documents, statistical or archive data, or from subjective data like the personal interpretation that an individual makes about his relations with others (Molina, 2001).

Trying to systematize the social networks analysis into a paradigm of social theory and research, different classical authors has defended the criteria or central principles. For Wellman (1988) the networks analysis is an integrative and systematic way of taking the social structure. It concentrates in studying directly the patterns of links among different agents. This analytical paradigm is based in five principles. First, the structural conditions explained the behaviour of actors rather than the inner characteristics of actors. This postulate banishes the explaining force of the rational choice theory. Individuals act more according to their relational activity in a certain social context than moved by calculative personal choices. Second, the interest is in the ties between units and not in the attributes of the units. Third, the interest is not only to identify how many possible ties exist but also how these ties are patterned. This principle implies that actors are not linked only through dyads, but immersed into multiple patterns of ties. Fourth, and as consequence of previous statement, the social structure is a network made of networks. Finally, this social structure and the patterns of networks are analysed through systematic methods that might supplement or even supplant the statistical methods of methodological individualism. Some of these principles are also shared by others.

For Wasserman and Faust (1994), the social network analysis is based in the following principles: Actors and their actions are not exactly autonomous units but interdependent with the context where they are embedded; the interest on the analysis of social networks is not only in the patterns of those ties but also in the content; through those links occur constant flow of resources, both material and not material; the structure of relations acts whether as constrain or facilitator of actors' activity. This structural

conductivity may acts at individual, organizational or even at national level (Mizruchi and Marquis, 2006).

Following Requena (2008) social network analysis implies various advantages. They offer a more complete perception of the society. In the attributive approach society is organized through social groups, social classes, and there is a compartmentalized social stratification and social organization. Although through social network analysis is possible to seize the relational nature upon which any formal structure is based. SNA shows the fluidity of social relations across all types of formal and informal social divisions. There are institutions that are built upon established formal membership criteria, rigid formal structure or organizational structure (organigram). But all of them are based on flexible and informal relations and their analysis can offer a totally different view. For Requena (2008), social networks happen to be like the DNA (deoxyribonucleic acid). To acknowledge its running will bring out a more complete vision of the reality. The network analysis is supported in mathematical and graph analysis what makes possible to measure those ties in number and nature. It uses statistical analysis to measure social relations and it shows how they are arranged, paradoxically against the traditional difficulty of the measurement in social capital. The social structure is a social network with different actors positioned differently. How they act is influenced by their position within the structure. At the same time, the actor may influence in the patterns of the networks and consequently, in others actors' behaviour. This principle shows a constant interdependent flow from macro-micro-macro level of the network structure. In this sense, social network analysis has solved the historically troubled relation of micro and macro analysis of society. Thus, one the advantages of social network analysis is its integrative approach that combine social theories at macro level like conflict theory and micro-level theories like the exchange theory (Ritzer, 1996).

It's important to say that the development of social network analysis would not occur without the contribution of different disciplines. On one hand social sciences like psychology, sociology, anthropology, economy, geography, etc. have lay out the structural intuitions and theoretical background. On the other hand, the graph theory has allowed the systematic approach to the patterning of social relations. Without the

work of mathematics, physicians, programmers, etc., social network analysis would have remain in abstract conceptions of society as a system of relations.

What follows in the coming paragraphs is an introduction to the SNA that aims to familiarise those readers who take a first approximation to SNA. Looking backwards, network analysis is based on the structural approach of Radcliffe-Brown (Scott, 1987). He valued the social science (anthropology and sociology) as a natural science. The aim of social science is similar to other natural sciences like physics, where the concern is to understand the structure of atoms, or quimics, concentrated at the structure of the molecules. All these natural sciences applied a structural perspective to understand and discover the patterns of relations among units (atoms, celules, etc). In the same way it is possible to apply this perspective to humans or social actors and to discover the patterns of human relations. Influenced by Durkheim's structural perspective and treatment of social phenomenon as things, RadcliffeBrown sustained that the society could be understood through an empirical query on those social relations arranged in certain order. The strucutral conception of society and future vision on the need of empirical methods has placed Radcliffe-Brown as the major source of estructural perspective (Freeman, 2004). However, this perspective remained in a metaphorical level, and scholars of social network analysis has been concentrated more in pragmatic and empirical developments than in a abstract or theoretical approximations to society (Lozares, 1996). In the roots of social network analysis are the methaphoric ideas of social structure of the classic authors of sociology, like those mentioned above. Although George Simmel appears to be as the most influential classical author (Freeman, 2004). Closest to the micro analysis of society, Simmel focused in the social interaction and types of interactors. And the idea of dyads and triads appeared in *The philosohpy of money* (Simmel, 2003). These theoretical approximations were the essence of modern social network analysis. However, the analysis of this overwhelming amount of relations found serious empirical limitations.

Freeman (2004) tries to dust off some other contributions in the development of social network analysis previous to the wellknown contributions of sociometry there have been first systematic empirical data in the heart of consanguinity family relations and schools - the characteristic graphs images of network analysis are based on traditional family tree-based images and Hobson's hypergraphs -. Boths contexts were ideal at

gathering data from direct observation on human relations. In a complete biographical revision Freeman (2004) shows the development of social network analysis as a swarm of academic relations progressively created. From the first thrust with sociometry and Harvard community studies to those “dark ages” in the forties, fifties and sixties decades. This shadowed period refers to more isolated parallel contributions from different universities to social network analysis. They are metaphorically presented as scholars nodes without ties. On the contrary renaissance and consolidation of the paradigm takes place from the seventies with the increasingly connection and organization among scholars’ work.

In general, the development of social network analysis is clearly stated through four main branches: the sociometry and graph theory; the Harvard and Chicago group; the Manchester school; and the renewed interest at Harvard school in the seventies. Scott’s work (1987) is exemplary at presenting the contribution of each school to the development of the paradigm. The sociometry and graph theories developed during the twenties and thirties from psychologist scholars influenced by the Gestalt tradition in Germany who migrated to United States. Among them the most representatives were Moreno (1972), Lewin (1936), and Heider (1946). This theory emphasizes that human thoughts and behaviours are structured according to organized patterns located in group organization. Moreno’s studies implied a systematic data collection. His aim was focused on how the psychological development of individual was influenced by his direct group relations. His approach of “psychological geography” later renamed “sociometry” was defined as the analysis of groups’ formation and the position of individuals within it using quantitative methods (Freeman, 2004). Moreno (1972) developed the first sociograms representing those social relations among small groups of individuals. These sociograms implied a jump into first systematic approach to the structure of those relations, their properties and the identification of specific actors’ role like leaders or “stars” (Scott, 1987). In Moreno’s work appears for the first time the term of network. He founded the journal “sociometry” and his contribution is considered as the first refined structural approximation to modern social network analysis.

Lewin (1936), other of the migrated from Germany and follower of the Gestalt psychology, developed the “field theory” or “topological psychology”. This theory is based on the idea of “social space”, the field where individuals interact in a certain

environment. In this social space is possible to identify through mathematical techniques those points connected by ties that group individual into regions. The interaction happened within the regions separated from other regions. So the constraints or opportunities are determined by the connectedness among different regions. Lewin's contribution lies also in the creation of a research center for group dynamics through different universities in USA (Iowa University, MIT and Michigan). This academic mobility produced the attraction and recruitment of future talented researchers like Cartwright, Festinger, and Harary that later on have contributed in the development of mathematical models for network analysis. Among Lewin's disciples came out different fruitful contributions to network analysis like Bavelas (Freeman, 2004) .

Simultaneously, but disconnected from sociometry approach, at Harvard and Chicago universities took place different researches centred in social structure. Among these Warner's and Elton Mayo's work (1933) stand out. In the study of workers productivity in an electric company of Chicago, Mayo led the Hawthorne study. Surprisingly, he detected the relevance of non-rational elements and informal relations among workers like group solidarity for the productivity. These alliances were depicted through sociograms. At the same time, Warner, who was directly influenced by his mentor Radcliffe-Brown (1974), used ethnographic methods for studying industrial communities, in two well-known empirical projects, "Yanque City" and "Deep South". In both he centred in the understanding of those informal interactions among individuals and represented them through graphic images. Warner depicted an informal network structure parallel to the formal organization of workers and detected the existence of subgroups of people besides those such as family or associations, coined "cliques". The clique referred to an informal association of people among whom there is a degree of group feeling and intimacy and in which certain group norms of behaviour have been established (Warner & Lunt, 1941: 32, in Scot, 1987: 21). Through these cliques was possible to represent not only the relations among individuals but also among groups. With the cliques and interrelations was possible to apprehend a whole community.

Through successive academic influences Homans (1950) is also one of the outstanding figures from Harvard research in network analysis. Homans carried out a synthesis of those previous Chicago and Harvard studies and improved the study of the informal networks. He proposed that interactions might change according to a "threefold

classification” of frequency, duration/intensity and direction (Freeman, 2004; Scott, 1987). One of the most interesting contributions is that he based his statements in conclusive and detailed matrixes. In the Old City project of 18 women’ attendance to 14 events, he re-arranged them into a certain order, grouping those women who attended to the same events. With this re-arrangement he demonstrated the division of individual interactions through different cliques, that later have developed in the block-modelling. Like his predecessors Mayo and Warner, Homans did not accomplished a mathematical or computation model of analysis. That was the purpose of others young fellows at Harvard. Chapple and Arensberg worried by the lack of rigor of data processing in those studies and tried to develop more operative approaches to variables like interaction. And with the help of the mathematician Quine they developed a first algebraic model for measuring relations (Freeman, 2004: 61).

These first advancements over future network analysis were developed in the Manchester School. In the second half of the XX century, a range of different scholars were going to build the systematic framework of future network analysis. Some of them partly echo the advancements of Harvard but more directly influenced by the structuralism of Radcliffe-Brown. The origin of this new verve has its roots in the Rhodes-Livingstone Institute of Zambia University in Africa. The institution was lead by Gluckman whose later migration to Manchester allowed a fruitful relation between Surafrican-English-formed and Manchester scholars. Gluckman was concerned with the social structural change of former African colonies and the rol of conflict and power in the social structure. This interest confined clearly the interest of Manchester researchers in conflict and power rather than in cohesion and integration taken in Harvard (Molina, 2001; Scott, 1987). With them, SNA took a reinvigorated place in sociology and antropology based on community studies, and a significant part of the conceptual body of Social Network Analysis were outlined. There are some exemplary studies carried out in different excolonies, where researches focused in the patterning of relations of conflict and power. Kapferer demonstrated how the conflict managment at work depended on the manipulation of working relations. He discarded the posible role at forming alliances of other atributes like age. He also studied the degre of overlap between relations and the concept of multiplexity. Mayer studied an electoral campaign in the Hindu city of Dewas. He detected that the type of social movilization was determinant for the success of the winning party, and failure of the opponent. The

former concentrated at mobilizing those close relations and people directly related to the party. On the contrary, the winner concentrated at mobilising those weak and indirect relations (Molina, 2001).

Most notable contributions of this school according to Scott (1987) are Barnes, Bott and Mitchel. Barnes studied a small fishing village of Norway, concluding that the whole society could be seen as a total network formed by a set of points, some of them joined by lines. At the same time, this whole net was formed by distinctive partial nets which can be better studied. Barnes also centered in the notions of clusters and cliques (Scott, 1987). Bott, like in Capferer's work, pointed that the behaviour is determined by the structure of the network, where individual are embedded not by having in common any sort of attribute. This work was given a boost with Nadel, who settled down the theoretical ground to the paradigm. Later Mitchel, inspired in Nadel's theoretical compilation, continued in the developement of social network analysis. Mitchel's work represents a synthesis of his predecesors from Manchester school and a renewed systematic insight on the basis of traditional sociograms and graph theory.

For Mitchel (1969) there were two patterns of actions in the interaction between individuals: communication, which happens when the interaction is based on the exchange or transfer of information, or the establishment of norms or consensus; and instrumental or purposive action, taking place when individual exchange material good or services. From the total network idea of Barnes, he precises that is necessarily to delimit it into partial networks for making operative empirical research. This can be done on the basis of individual's egocentred network or on the basis of particular aspects or areas of the whole and global network. This last referred to complete networks of clearly demarcated set of networks, like organizational relations, relations from membership to certain institutions, etc. However, most of attention of Manchester scholars centred to the egocentric networks. Mitchel built up a significant part of the conceptual body of contemporanean social network analysis. The threefold principle of Homans (1950) was developed into the reciprocity, intensity, and durability of the social relations. The graph theory allowed studying the texture of the social relations, through new concepts like density and reachability. For Mitchel, the terrain of social network analysis was in the study of those interpersonal relations, leaving aside the structure of institutional relations. This fixing approach to personal informal relations of

communities rested importance to the structural properties of other social systems. However, it allowed the future development of social network analysis and it had great impact in Britain.

The subsequent advance in social network analysis came from the renew inputs from Harvard in the seventies (Freeman, 2004). Much of this second Harvard thrust is due to the contribution of H.C. White. His PhD in physics permitted him to insight in the refinement of mathematical tools applied to social networks analysis in his second PhD in sociology. He doctinated a whole generation of students like Granovetter, Breiguer, Erikson or Welleman. They together made of Harvard the center of structural research (Freeman, 2004: 127) and enabled social network analysis as a method of structural analysis. And though many continue the British line of research, some others started to broad up the social network analysis from the fenced community studies of interpersonal relations to other fields of interest (Scott, 1987). Two crucial contributions thanks to mathematical applications were done by Harvard fellows. The first one was the application of algebraic models that developed the blockmodelling. This technique introduces significant innovations in the structural analysis like the inclusion of individual or nodes that were not related to the networks. Accordingly, not only cohesion but exclusion could be studied. The second one was the multidimensional scaling that rescued the original idea of Lewin “field theory”. With this technique relations could be studied in social distances and mapped in a social space (Scott, 1987).

Some other remarkable and well-known studies were presented by Granoveter and Lee. Their works show how individual movilized their social relations for accesing to information flows. In Granovetter’s study for getting a job, and in Lee’s investigation for getting contact with an abortionist. More specifically the results of Granovetter has had significant impact on the study of social capital through the structural perspective and the empirical analysis of social networks by which individual get access to resources. In this decade, social network analysis developed into a very integrative net of scholars with a very productive literature backing their empirical studies with theoretical basis. This paradigm has been spured also with the integration of multidisciplinary academics, especially with those formed also in mathematics and physics. This background permitted the development of computational programs and the treatment of data with rigurous and precise techniques. Without this mathematical

approach the social network paradigm would have feel down into the same troubles of scientific precision of other traditional concepts of sociology (Freeman, 2004). Simultanouly, SNA has consolidated progresively in this decade its conceptual body. It has been considered as theoretical synthesis where the micro and macro analysis can be integrated and it has implied the bridging frame for the exchange theory and the rational choice theory (Freeman 2004; Lozares, 1996).

The special interest at gathering together all those isolated structural scholars, lead Wellman to fund the INSNA (1977), the International Network for Social network Analysis and the newsletter Connection. Later Freeman founded the well-known journal *Social Networks* (1978) for integrating all the literature with social network analysis in common. This enthusiastic organizing and integrating scholars and studies into a whole scientific community led to the arrangment of the “Annual Sunbelt Social Networks Conference” as the official INSNA meeting. From one of these annual meetings in 1998 in Sitges (Spain) began the unifying effort of scholars from Latin America, Spain and Portugal for the journal *Revista Hispana para el Analisis de Redes Social*, founded in 2002. After all these advancements it is matter of thumb for many scholars that social network analysis has come of age. Although still in the coming years social network analysis have been improved with numerous studies applying more advanced network methods and systemathic data collection (Lozares, 1996).

Despite this maturity in methodology and theoretical frame the paradigm seems to be not placed solidly in the sociological tradition. For social network defenders these concerns are paradoxical as the study of social relations is in the origin of social sciences and even the core unit of social analysis (Lozares, 1996: 110). Social network analysis is all about social structures which are built upon relations between individuals, institutions, groups, communities, etc. From these actors and associations are taken the traditional data on the basis of variables collectively shared, while the relational data remains in a marginal place for the general investigation. The integration of SNA in sociological theory seems very promising, however needs to cover certain flaws. For Scott (1987) SNA has created certain reluctance in sociologist and needs to bring closer and make more accessible the mathematical methods to the traditional research. For others it is necessary to overcome the excesive descriptive methodological approach to social relations and to work more towards a deductive and coherent theory (Lozares,

1996: 123). In general, this claim shows an unbalance concern in SNA between the forms systematically captured through mathematical techniques, and the substance. However, for others social network analysis at the end of XX century has reached its own status in social sciences (Freeman, 2004). For Hummon and Carley (1993) the evolution of citation pattern, the concentration of publications in a specific journal, and the high density of citations among scholars, are indicators of a consistent convergence towards the pattern of scientific development labeled 'normal science'. Future advances in the research of social networks, the application to increasing number of fields of research and the relevance of networks in current societies of the XXI century are contributing in this line. The increasing social and spatial mobility and the impact of the information and communication technologies in social life is profoundly re-structuring the social organization. We are bear witness of the change of perspective at analysing societies, from neighbourhoods and communities clearly defined by social attributes and spatially coordinated towards the emergence of networked individuals, networked markets or networked states and policies. Other contemporanean sociologists' questionings of advance and post-industrial societies will enhance the notion of community as networks and the person to person relations at the interest of research. In this networked individualism a person gets involved in a more variable and flexible way into different communities, in contrast to the more static memberships of individual into different types of groups like family, organizations, clubs, etc (Wellman, 2001).

2.3. The structural analysis of social networks.

In this section different relevant concepts and analytical considerations are explained in order to facilitate the understanding of social network analysis later on. Social networks analysis is also a set of concepts and analytical and methodological procedures (Lozares, 1996). This operative conception of the discipline seems more appropriate for the introduction of the main concepts of measures that will be used in this research. Network concept rests in the theory of graphs that defines it as set of points linked through lines (relations) that follow specific properties (Requena, 1989). Those points might be a different range of actors, like individuals, organizations, institutions, cities, etc. Both, points and lines can be measured, analyzed and represented in a matrix.

As method, network analysis implies both quantitative-qualitative techniques. The analysis of networks has been developed through statistical and quantitative measures. The use of mathematic and graph theory is the fundamental basis for the development of social network analysis from the simple metaphor to an analytical model. But data collection of social network counts with quantitative and qualitative techniques like observation and interviews. More recently, qualitative approach to network analysis is getting support and tries to compensate the quantitative analysis of networks (Grosseti, Barthe & Chauvac, 2011; Mckether, Gluesing & Riopelle, 2009; Hollstein, 2011). The ideal of combining different methods like interviews and questionnaires in data collections as well as using statistical and mathematical analysis with grand theory or other interpretative methods has been applied in this research.

Networks can be as existing social relations or as perceptions or interpretations of actors' relations. The last ones are called cognitive networks, which are rather appropriate for the study of attitudes and opinions (Marsden, 1990). For the study of these kinds of networks qualitative techniques like the content analysis seem rather appropriate, while the collection of relational behavior usually is based more in quantitative techniques. This distinction is relevant in this work as the study of networks at individual and institutional level counts with objective observation from questionnaires and with the perception of social relations collected from interviews. Networks can be analysed fundamentally from three level of analysis (Marsden, 1990). A macro level in which closed communities or collectives might be studied. They are called complete or socio-centric networks as it is possible to account all the existing relations among the members of the community. At this level, network analysis can explain also the network and actor's location, within the whole social structure. One of the mayor uses of network analysis in sociology and antropology has been to discover social structures of a total or complete system, where is also fundamental to observe the significant positions of certain actors, and the specific pattern of relations between certain actors (Requena, 1989). In the micro level network, the analysis focuses in the relations of individual actors in order to explain for instance the effect of actor's relations at accessing specific resources. They are known as egocentric networks or personal networks. An intermediate level of analysis is centered in the relation between different individual actors taken from either a complete or egocentric network. At this level can be studied dyads and triad relations but also other types like conglomerates or

subgroups of relations. Others consider instead four levels of analysis clearly identified where the dyad and triad are treated as separated intermediate levels (Requena, 1989). The multiple level of analysis makes the social network to represent the solution to the disconnected macro perspective and micro analysis in Putnam approach to social capital for instance (1994, 1995a). This intermediate level has permitted social network analysis to be as the bridge discipline between macro and micro analysis, and has conferred to social network analysis an appreciated integrative value among social sciences (Ritcher, 1996). In this research both types of network and analysis are carried out.

2.3.1. Glossary of network analysis.

The network structure has different properties for understanding its dynamics and the position and role of those actors at interest. The most basic properties of the networks have important consequences whether for the whole structure and for the individuals whose behaviour is influenced by the whole network structure. The links are both opportunities and obstacles for collective action. How are articulated the ties within networks affects to the flow of information or power. At the same time, actors' relationships show specific dynamics for the study of opportunities or limitations for the individual's action like for instance the opportunity to learn from others.

What follows in the next pages, to understand these properties and dynamics, is a glossary of terms used in SNA. Concretely, we will describe those measures that will be used in the analysis of networks of individuals and institutions working in crossborder cooperation. First, we have centered in the representation of a measure of cohesion and centrality of the egocentric and complete networks. Second we have considered centrality indicators by actors within the networks, and subgroups measures in order to describe and represent the specific position of certain actors in the networks.

Measures of cohesion: They permit to describe general structural features of the network of both the individual egonetworks and the complete networks. Through measures like distance, reachability and density we can analyse the interconnectedness between actors. Density is one of the most common and basic measures in SNA. Density is the proportion that represents the total number of relational ties divided by

the total number of possible or potential ties that could have the network. Expressed in percentage that if it is high means that the network is very cohesive, and the actors tend to have many ties to the rest of actors. Those networks with a low density can be interpreted as a poor cohesion between the actors, who are barely connected among them. However, networks with low density can have simultaneously dense sub-groups with some actors who are completely isolated from the rest of the network. The density in a whole network can be assessed as the extent to which the actors express willingness to assume responsibility of compromise in the network (Fürst et al., 2001: 51).

Centrality measures: One of the most important properties in social structure is the power and its distribution among actors. This property is studied in SNA through the concept of centrality (Hanneman and Riddle, 2005). The power or capacity to influence in others is inherent to any given group of actors, that is, centrality is social power because one exercises the power upon other people. The notion of centrality is related whether to power distribution in the network and the power of certain actors within the network. But centrality is also related to the study of efficiency of the group for solving problems, to the study of leaderships, or the concentration of communication and other resources in certain actors (Freeman, 2000).

Network Centralization: It indicates the degree to which the connections in a network are concentrated around a small group of actors. In other words, it represents the extent to which there are actors of a complete network with central positions (they received and send many relations to other actors). It is a macro measure of the whole network that expresses the degree (in percentage) of variability in the centrality of actors. If the network centralization is high it can be assumed that the certain actors are rather central and other actors are very peripheral. A high percentage tends to represent the form of a network structure like a star network. This is the hypothetical case of highest centralization, with one or several actors in the center of the network linked to the rest of actors are very peripherally positioned.

One of the most important aspects to understand the dynamics in a network is the position that every actor has in the network. The position of every actor will indicate how better positioned is or how peripheral is, that is the status that the actor might have in the network. This idea of position refers also to the measure of centrality

(Freeman, 2000). Regarding the structural position of individuals in a network, the centrality measures can indicate if the individuals are very limited or favored in term of access to information flow, or other resources and opportunities. In relation to the centrality measures of individual actors, we examined in this research the degree centrality, betweenness centrality, and Bonacich indicator. These measures refer generally to popularity, efficiency, and power of the actors in the whole network (Hawe, Webster & Shiell, 2004). They indicate if the structural position of a certain actor is a position of power. At the same time, and by contrast, they indicate the level of horizontal cooperativeness among actors. A network with high centrality is negatively related to cooperation in the network. High level of centrality will allow fewer possibilities of cooperative dynamics between actors members, and decisions will be concentrated in few actors (Hoffman, Stearns & Schrader, 1990; in Requena, 2008).

Degree centrality: This measure represents the degree of power that a certain individual has within a complete network. The degree is the sum of all the relations (indegree and outdegree) connected to an actor, or the number of points to which a point is adjacent (Scott, 1991). These relations can be those that the actor receives from others (indegree or in-centrality) and those relations that the actor sends to other (outdegree or out-centrality). Although this distinction is not considered in this research, is very relevant for the interpretation of the data. If an actor has a high indegree it means that he is very popular, valuable person within the whole network. And if an actor has a high number of outdegree in the network, he is capable to influence in others (Hanneman & Riddle, 2005). The degree centrality can be considered as the amount of the total social capital embedded in the whole network that can be directed to individual actors (Fürst et al, 2001). The degree centrality is based on direct ties from actor to actor. Those actors with higher degree are those with local centrality (Scott, 1991). But the degree centrality can be extended beyond the direct ties of the point. Thus, other measures of centrality, like closeness and betweenness are complementary and accurate the analysis of centrality.

Closeness centrality: It refers to the notion of distance (number of steps or ties that actors have to make in order to reach to other actor) between actors connected. An actor might be connected through direct ties (one distance) to many actors, or through indirect ties (more than one distance or ties) to those actors who are more socially distant.

Accordingly, closeness centrality measures dependency or efficiency. The more indirect relations to reach to far actors, the more dependent and the more efforts take to reach them. Logically, those actors with high closeness centrality are those with a global centrality (Scott, 1991), because they are less dependent on the other actors.

Betweenness Centrality: In the same way degree centrality does take into account only the direct ties of the actor's neighbours. One actor might be tied to many other actors, but the centrality is not the same if those other actors (alters) are disconnected or if those alters are much interconnected with others. That is, it is important to see if one has many friends who are not very connected with other people, or if one has many friends who have themselves many relations with others. This idea refers to Betweenness centrality. This measure indicates the extent to which an actor connects pairs of other actors. The percentage of betweenness centrality indicates the degree of connection that an actor has between other actors. The betweenness is related to the capacity of control in the flow of communication and resources between other alters who need to pass through the actor if they want to contact with others. The actor with highest betweenness in a complete network is said that he is a gatekeeper or broker, that is, he has an intermediary role (Fürst et al., 2001; Hawe, Webster & Shiell, 2004). He is the one who most control the communication between others, or who could interrupt it or facilitate it at the most.

Bonacich measure: This indicator is an extension of the degree centrality that distinguishes the notions of being important and power in the idea of centrality. Two actors might have the same degree centrality, though may they do not have the same power capacity. This distinction depends on how well interconnected are those alters with who the actors relate. Accordingly, one actor is central in a network when he is related to many other actors (alters) who are themselves connected to others. But one actor is not only central but powerful when the alters with who he relates are not well connected to others. This means that the alters depend more in the actor. Thus, the actor with ties to alters very well connected to others in the network, might be central but not powerful because the alters are not so dependent on him. Bonacich measure takes into account this dependency of alters upon the actor. So it might happen in the same network that those most central actors are not those more powerful actors. Once again we underline that both centrality and power are social properties. Therefore, the more

ties the actor has in the network, the more central he is, and the more relations are between actors in a network, the less powerful an actor is (Hannemand & Riddle, 2005).

Subgroups: Besides the interest in the position of every actor, other important aspect to analyse in the network is the existence of subgroups. By analysing the existence of dyads or triads between actors of a network we approach the analysis from a bottom-up perspective. In this level of analysis different subgroups measures make understandable while in a complete network certain actors tend to related among them forming more dense groups different to other groups in the same network. The main network theory used in the study of subgroups is Granovetter (1973) with “the strenght of weak ties”. According to Granovetter, the information flows through subgroups with dense ties among its members, but the access to other and new information takes place when those dense and cohesive subgroups have access to a weak tie that connects to other subgroups. The other part of SNA in this research is centered in the analysis of the substructures within the networks through two specific types of subgroup measures, the cliques and the clans.

Clique: The clique is the most common technique used to identify dense groups within a network. It can be defined as a maximal complete subgraph, that is, a group of individuals where all of them have mutual relations within the group, and where there is not any individual without having mutual relation with all the individuals in the group (Ingegerd, 1997). The smallest "cliques" are composed of two actors: the dyad, though usually are considered triads and cliques of more individuals. Through the different cliques present in a network we can observe also if there are some cliques overlapping. This refers to the comembership property of certain actors when they are part of different cliques at the same time. The comembership or intersection of certain actors of different cliques raises the notion of social circles. The social circle is formed by those cliques who are overlapping through certain actors that connect them. In terms of cohesion can be understood as structures or subgroups with loose boundaries without clear defined goals (Fürst et al., 2001). Accordingly, the intermediary rol of brokers (betweeness) is central for the connection of social circles and for the whole network (Scott, 1991: 89).

But this definition of clique is a very restricted idea of groups and being a member of the group. For that purpose in SNA there are other measures that relax the strict and theoretical idea of cliques. Those that we will use in this research are the N-cliques and N-clans, where N means the number of ties or steps by which actors are connected. In the **N-clique**, actors are member of a group if they are connected with all the member of the group at a distance greater than one (Hanneman & Riddle, 2005). A distance of N=2 is the most commonly used for considering an actor member of a clique. This means to be member of a clique when an actor is friend of a friend (Quiroga, 2003). Nonetheless, to be friend of an actor who is member of a clique does not imply automatically that the friend is also member of the clique. In the measure N-cliques it might happen that some actors are not clearly members of the group. For that reasons, it is necessary to use a measure more adapted to the idea of a group. **N-Clan** measure takes into account the distance N=2 at which actors are connected but include a new condition. All the ties among the members of a n-clique must occur by way of other members of the n-clique (Hanneman & Riddle, 2005).

The structure of network can be analysed also from a **top-down perspective**. The interest is not at the identification and analysis of subgroups but at the study of the whole network. From this perspective the analysis interest is not to identify sub-structures but those holes or weak spots that influence at the most in the entire network. The structural holes of Burt and weak ties of Granovetter offer the vision of a network which dynamic might be influenced by the presence of certain actors who are relevant and key actors. They can play positively as bridging ties between dense substructures or limiting the flow of information. The **component** is the most common notion that considers the network into different sub-graphs that are connected internally but disconnected between them. The component divides the network into separate parts. Though the most common are networks of one component where all the actors are connected in any way. Once again this is a very restrictive notion of the subgraphs. In this research we have used the two main measures that permit to find those weak points in the network.

Blocks and CutPoints: With blocks and cutpoints is possible to identify those actors who could cut the entire network into un-connected subgraphs or blocks. These actors would be the cutpoints. Thus, they would be very important actors as they would have this brokering capacity.

Lambda set and Bridges: Other measure for the identification of relevant actors who could disrupt at the most the network are lambda and bridges. In this case the connections or ties are focus of analysis. Lambda set search for those ties through which flow the greater number of actors. That is, there are certain connections in the network that if removed would discomposed the network at the most. The bridges are those actors whose relations connect more in the network.

2.4. The study of personal and organizational networks.

2.4.1. Personal networks.

In this section we center in network attributes more than in the structural characteristic of the networks presented in the previous section. In the personal network analysis the research interest is the person's world, his/her relations and how this relational structure affects to the personal behaviour. That is, what kind of people are related to the ego, the nature of these relations, what kind of resources flow through them, and how they are related one to another (Wellman, 2007). We can say that the study of networks starts principally with the study of ego-centric networks, especially with the Manchester scholars (Molina, 2005). With later developments from the egocentric perspective of social networks different approaches have emerged. Following Molina (2005) here are presented four main traditions in the study of egocentric networks. Indeed, they are four different developmental stages along time, each of them with different research interests, that have come to the questions of ego's network size, the network structure, the network composition, the flow of resources and support within the ego' network, the influence of the networks in the ego's behaviour, or how do the network tend to change over time.

The Manchester scholar encountered in the analysis of networks a new paradigm to explain the social or individual behaviour that other disciplines could not explain. From these studies stands out the vision of the network as a dynamic set of ties with a core-periphery structure (Morgan et al. 1996). In this case, personal networks are not a stable or fixed group of relations along time, but rather a very dynamic and changable structure. According to the contact frequency, networks have a core-periphery structure.

The core network members are those with dense relations and relatively stable, and the periphery are those ties less reported and contacted, and with less dense relations with the ego and among them. The location of a tie in the core or in the periphery indicates the probability of inclusion in the whole network structure. This core-periphery structure is central for the distinction between strong and weak ties in the analysis of social capital as well. The core ties are those strong ties, contacted with more intensity, older in time, stable over time, supplier of emotional and instrumental resources, while in the periphery we find those weak ties like friendships, and workmates with greater turnover in the personal network structure. Nevertheless, this core-periphery nature of network structures needs for longitudinal studies in order to catch up the instability of the personal networks. The longitudinal studies have permitted to appreciate the dynamic of networks structural change over time. The core of ties is persistent over time, while the periphery of ties is more transitory and tends to be replaced (Suitor, Wellman & Morgan, 1997). The individual's network size increases progressively until thematurity and from the sixties on starts to decrease. Along this vital evolution the core of the networks gets relevance in contrast to the periphery and weak ties suppliers of instrumental resources. Because in the core of the network we find family ties that tend to endure over time, while the weak ties are more unstable (Molina, 2005: 92). That is to say for instance, that while a person always has the same family members with who one contacts more regularly, there are other relations like known people, or workmates that tend to change over time and are less contacted, the older the person is.

Other traditional approaches have tried to estimate the size of the personal networks. The size of the ego networks varies significantly on the criteria of what is considered as member of the ego's networks. Those who consider the known people or active contacts encountered with big size of the personal networks that varies according to the methods used. There are studies of the ego network size using telephone guides, personal agendas, or diary contacts. Among these studies the idea of "small world" (Milgran, 1967; Pool & Cochen, 1978) got great audience. It refers to the experience that everyone in the world could reach one another through a small number of ties. The small world idea conceives the world as a big and sparse network highly clustered. But other studies using different methods, like the scalling-up method of reported networks from telephone directories (Killworth, et al. 1990) propose an average of the ego network size aproximately of 291 people with a standard deviation of 250 people in the

United States. By contrast, if we consider those stronger relations or more supportive people for the estimation of the network size, the average tends to be considerably less, 18.5 people- (Molina, 2005). At this respect, a study of Fu (2005) in China, Taiwan and Hong-Kong proposes an average of 29 people with a standard deviation of 9 people. This study used the diary method, and despite its limitation the author encountered both weak ties and those intimate contacts.

Nevertheless, the study of the personal networks is also influenced by cultural differences. Aspects like the size, or support from the networks vary across countries. These cross-cultural differences are evident in the size of network that for instance Lonkila (2010) detects in the larger number of ties reported by Russians in Sant Petersburg compared to Finns in Helsinki. At this respect, the author detects isolated and relatively small comparative studies of personal networks and claims the lack of cross-cultural comparative studies using a clearly notion of personal network due to the complexity and expenses of these types of research. Although there are large survey datas from the World Value Survey, the International Social Survey Programme, or the surveys of the Statistics New Zealand and the Australian Bureau of Statistics. Reporting similarities or differences in the emergence of cross-cultural studies of personal networks is also a promising future research line. There are also differences in the size and composition of the network based on gender differences due to the extent to which the gender roles are segregated. Bastani (2007) detects that both women and men report generally the same number of persons. However, they differ substantially in the composition of their networks. Men networks consist of fewer kin ties and more non-kin, comprising fewer neighbours but more co-workers and friends. On the contrary, women's networks have more kin-relations that vary in intensity of kin and fewer types of non-kin.

The other two main approaches to personal network are the studies of community and social capital. Though they emerged from different research's interests, we find them very related as they are both based in the flow of resources - professional attainment, social support, etc.- within the network structure of a person or a whole community. The community studies demonstrated the traditional query for the type of relations and support networks formed on the modern and urban societies (Molina, 2005). This was coined as the community question (Wellman, 1979; Wellman and Leighton, 1979) in

the empirical study of East Yorkers. Three types of community were represented in the categories of Lost community, Saved community and Liberated Community (Wellman, 1979, Wellman et al., 1997). More recently, the study of Henning (2007), following Wellman's contribution, has applied the Community question to the personal embeddedness of families in three German cities. This author claims a more flexible a fluid notion of the community, and instead of supporting in different community models it is preferable to talk about communities as a mixture of strongly-knit nuclear clusters and of broader, sparsely-knit relations that provide access to different groups and their resources.

The social capital tradition has used the analysis of social networks as the best way to approach the controversial measurement of social capital discussed in Chapter 1. We find social capital traditions that use it timidly for the study of social capital in communities like researches from the Australian scholar (Harper, 2001; Spelleberg, 2001; Stone, 2001; Onyx & Bullen, 2005) and those researchers that have tried to enhance the study of social capital in its structural dimension (Burt, 1997; 2008; Lin, 2001; 2003). The work of Lin situates the analysis of social capital in a meso level as resources possessed by individuals and also by the network. He differs also the notion of access to resources from the use of the resources (Molina, 2005). Recent works of Lozares and colleagues (Lozares & Verd, 2011; Bolivar, 2011; Lozares, et al. 2011) consider the social capital dual nature for the analysis of social integration and cohesion. The social capital has a structure of relations (the formal component) and the content or resources of the relations (the substantive component). From this double dimension, social capital reproduces three different types of networks: bonding, bridging and linking which explain traditional sociological concepts of cohesion, connection and integration. The cohesion is articulated through the bonding relations that tend to be horizontal, dense and homophile. These relations form cohesive groups or closures, and they are also strong ties basis of support and intra-resources. The bridging-linking relations are those external relations between different groups or organizations. They are extra-resource relations, and supply instrumental and competitive resources. They form the reticular structure of the connection when the relations are horizontal, between different groups, for instance, the relations between different immigrant collectives. They form the reticular structure of the integration when the relations are external and vertical, linking different hierarchical groups in terms of power, resources, etc. Like the

immigrants relations with individuals and institutions of the hosting society. Those bridging and linking ties are associated to the structural measures of SNA like cutpoints, bridges and betweenness. These indicators highlight the brokering role of certain actors and relations. In short, these authors try to operationalize the concepts of cohesion, connection and integration by They are relational resources and the way in which bonding, bridging and linking social capital are articulated through the networks.

The place is an important facet in the study of personal and community networks. Recent research in the study of personal works takes into account the attractiveness of the spatial dispersion of the personal networks (Molina, Ruiz & Teves, 2005). This combination has a great potential to understand from where relations emerge, to approach the spatial dynamic of networks and the influence of the context where they are located. We can detect also the different types of networks associated to the geographical location (Maya, 2004) or the type of support received on the basis of geographical dispersion (Molina, Bolivar & Cruz, 2011; Molina, Lubbers & Lozares, 2012; Viry, 2012). The combination of personal networks and geographical location represents a very potential field not only among scholars but also for the direct political and socioeconomic planning impact. Accordingly, we can find communities based in “the place to place relations” that could be represented as cloud of points located geographically.

In the study of personal networks we can analyse the alters attributes. Among them, the most traditional asset is the homophily of the ego's relations (Blau, 1964). That is, people who are similar in certain sociodemographic aspects are more likely to relate, or the prominence of alters with similar attributes to the ego. The contrary is the heterophily consisting the presence of alters more different to the ego's attributes. An ego can have homophilic relations on the basis of sex, social class, profession, ethnic group, nationality, etc. These dimensions shape one individual social interaction. The distinction between homophily and heterophily relations tend to coincide with the distinction between strong ties more present in the core of the network structure and the weak ties dispersed in the periphery. One of the most important findings at this respect is the homophily of the ego's relations based in the geographical proximity. For instance, this spatial dispersion is a relevant factor at explaining the homophily of adolescent relations (Preciado et al. 2012). The geographical proximity is one of the

most important causes of homophily because people tend to relate with those who are close in their daily life and with whom they interact more. The majority of personal relations come out from the family, work, the suburbs, and other organizations like school, universities, etc. (Grossetti, 2009). Thus, one's relations emerge likely from these clearly socio-spatial bounded relational places. Consequently, we can discern different types of relations according to these social-spatial frames. The relations of family, best friends, or just friends, workmates, neighbours and other known people tend to be the most common studied categories.

To understand the dynamic of network change Grossetti (2009) coins the concepts of embedding and decoupling. These concepts explain the origin of personal relations or how they are formed in the organizations or communities. The embedding is the increase of dependences of the relations in the context where they emerge, like families, work-organizations, other collectives or group associations, etc. While decoupling is the process by which these dependences decrease and relations become more autonomous from the context of origin. Equally, he explains how the relations become independent from the context where they emerged. There are different models of the emerging context of interpersonal relations. In the first model relations emerge from collectives through a process of decoupling. Relations become independent and continue beyond the frame of the context where they emerged. This can be the case of the working relations that over time decouple from the organization context. That is, two individuals that start a relation due to their link to the organization, and throughout time they become friends. Their relations autonomize from the labour context and even if one of them leaves the organization for working in other place, this relation might continue. The second model is the relation from the relations, when for instance two persons with a common friend, through the process of embedding create a network. The third context of emerging interpersonal relations takes place in people from different collectives but with common interest or very close to common resources or intermediary resources that put them together and prompt them to interact. For Grossetti, (2009), the example is the creation of scientific relations through a research interest. The scientific belong to different collectives that in this case play as simple frames. Those simple frames can be even social events that put people together around a common objective, like traders in a fair, students in University exchanges, or neighbours joint for there resolution of public issues.

Suitor, Wellman and Morgan (1997) explain that why some ties persists more than other is a question of frequency and kin. Accordingly, that is why the core ties are more presistent that the peripheral ties. To know the strength of those ties we can consider the time, emotional intensity, the intimacy, or the reciprocity of resources (Granovetter, 1973). These contributions help to understand the stability of homophile relations. In contrast, the theory proposed by McPherson, Popielarz and Drobnic (1992) try to explain the change or stability in the network structure according to the following criterias: the frequency of contacts between the ego and alters, the density of connection between the alters and the social distance between ego and alters. The authors found that: “the more contacts the ego has inside a group, the longer the duration off that membership; the more contacts outside a group, the shorter the duration of the membership; tie strength makes little difference inside groups; the weaker the ties to alters outside the group the strongerthe negative effect on duration of membership; the greater the number of network ties to alters, the greater the rate of joining new groups; the greater the number of ties between those alters, lower the rate of joining new groups; and the greater the social distance between ego and alter, the greater the rate of joining new groups” (McPherson, Popielarz & Drobnic,1992: 168).

At the same time, the homophily is a structural feature of societies and interpersonal relations. One does not chose primarily with whom to interact. Since social groups are homogenous on the basis of sociodemographic variables, the context for emerging interpersonal relations drive people to relate with people like them. By contrast, those different people to us are more social distanced from these socio-spatial communities. For Popierlarz (1999) the basic understanding of the heterophily is that people meets different people through organizational participation and the major source of turnover in the organizational networks are the weak ties. Thus, an organization with diversity of people or collectives enhances the opportunities of the individuals to interact with social distanced people. The heterophile relations are structurally embedded in the more distance civic and organizational environments. Among them, organizations like enterprises are those experiencing higher turnover in networks. The author argues that the network heterophily relates also to the organization heterogeneity and the more individual's membership to different organizations the higher level of heterophility he has in his personal network.

2.4.2. Organizational and institutional networks.

Drawn from the study on interpersonal networks, institutions and organizations like people can benefit also from their formal and informal relations with other counterparts. Equally the organizational network structure, the organizations' networks and location within it are determinant to understand the form of the collective institutional action and the limitations and capacities of the institutions to operate. Thus, the concept of social capital seems constant in the research, management and performance of organizational networks. Indeed, the dynamic of interorganizational relations catch up the social capital metaphor as a social advantage generally exposed by classical authors (Coleman, 1988; 1990; Putnam, 1994; Burt, 2000). Society relational activity resembles to a market in which people and organizations might search for the best partners and associate to achieve their individual interest and the community will by norms of trust and reciprocity. In this market of profit saking there might be some actors who lead more projects, there might be some actors who pursue better their interests than others, and there might be some actors who are more prominent, attractive, better articulated, etc. (Burt, 2000; 2008). In this sense, Burt (2000) enumerates different studies related to the brokerage role in interorganizational networks. Researches in public interorganizational relations, like Agranoof and McGuire (2001), underline that in the groupware, the network form of organization by which public institutions encounter for a mutual understanding, social capital is the ingredient necessary that leads to synergistic products. By last, Provan and Lemaire (2012) consider social capital as a fundamental aspect in the study of organizational networks.

The use of social networks analysis to organizational environments seemed a plausible methodological step forward in the advancement of interorganizational theory. Social networks emerged as a distinctive and alternative approach with more efficient interpretation to the obsolete explanatory capacity of atomist approaches and hierarchical perspectives in the study of organizations (Cook, 1977; Borgatti & Foster, 2003; Podolny & Page, 1998). Based in the exchange theory and the use of social network analysis (Cook, 1977; Cook & Whitmeyer, 1992), the interorganizational networks might be defined as groups of autonomous organizations that maintain exchange linkages with other organizations in order to pursue common and complementary goals (Ramos, 2012). The immersion of social network analysis to the

study of interorganization relations have also revived the study of governance in the private and public management of organizations.

One of the direct applications of the network analysis was to dig out in the governance structure form of organizations. The traditional organizational research conceived firms as governance structures that function on the basis of markets or hierarchical forms. But the introduction of network forms of organization introduced an innovative insight to clear out the “black box” of the firms that offered more analytical advantages for the analysis of interorganizational relations (Powell, 1990). Indeed we can assume that every type of organizational structure is a network and consequently the market and hierarchy forms of governance can be considered as two different models of network. Accordingly, the nature of the organizational relations would change significantly depending on the type of network. In the market network organizations are isolated points and in the hierarchy model, there is an organization with the highest centrality from whom the majority of ties flow downwards to the rest of organizations. In the market, the relations are rather episodic, limited to the exchange of resources and disappearing after on. In the hierarchy the relations might be longer along time but exist legitimated authorities that control the exchange of resources and the rest of relations.

However, the network form of organizations is a distinctive model defined as “any collection of actors that pursue repeated, enduring exchange relations with one another and, at the same time, lack a legitimate organizational authority to arbitrate and resolve disputes that may arise during the exchange” (Podolny & Page, 1998: 59). Under this definition it is possible to consider different types of network forms like joint ventures, strategic alliances, business groups, outsourcing agreements, etc. To distinguish clearly the network form of organization from the market and hierarchy model Podolny and Page proposed the contributions of different authors that fill the nature content of the organizational relations. For which we can appreciate that all include a distinctive asset of social capital, like trust and norms of reciprocity. Network forms of organizations generally are characterised by a sort of ethic guiding that might be name as the “spirit of goodwill” (Dore, 1983, in Podolny & Page, 1998) that refers to a moral orientation of the organizations by which the organization use common resolving strategies rather than their own advantage. Others propose the norm of reciprocity (Powell, 1990) which is

similar to the high level of trust and obligations, and Uzzi (1997) refers to “embedded ties” as strong ensuring relations based in trustworthiness.

By last, Podolny and Page (1998) clarify that though this ethic and values guiding are not a conditional need for the emergence of networks form of organizations, however in the setting of unexpected changes or conflicts, the network form of organization will have more flexibility of adaptation. However, the authors alert that networks should not be considered as the form of interorganizational relation that could resolve or fund solutions that the market and hierarchy models could not produce (Podolny & Page, 1998; Agranoff & McGuire, 2001).

The evolution of interorganizational network analysis has developed into different major conceptual frameworks. The study of interorganizational relations (IOR) was initially dominated by the management perspective. The exchange perspective assume that organization moves freely in the market setting and organizations perceive their interactions as an exchange or transaction of resources (Cook, 1977). From the exchange perspective Paulson (1985) proposes two major conceptual models that might be roted in the exchange perspective. First, the “natural selection model” or named the “population ecology model” explains the interorganizational relations as a natural selective process by which there are organizations that better fit in the survival conditions of the environment. Second, the “resource dependence model”, similar to the exchange approach (Cook, 1977; Oliver, 1990), explains that organizations moves as they are dependent on the availability of resources embedded in the organizational environment or structure, whether through strategic interorganizational relations or by acting in the nature of the enviroment. Any strategy used results in the creation of a network of relations that constrains or facilitates and explain the subsequent organizations’ behaviour. In their bibliography revision, Mizruchi and Galaskiewicz (1993) articulate two other different theoretical traditions. On the one hand, the “social class model”, by which the linkages among actors and organizations are not based only in the economic roots but also in social resources. The origin of interorganizational relations can be explained also by the need to ensure privileges or resources already possessed by the organizational actors. Organizational actors might behave according to their belonging to certain social class or dominant status in the organizational environment. This perspective was already foreseen in Bourdieu (1986), who theorised

the notion of social capital as a collective resource embedded in social groups like the social elites that uses their relations for the maintenance of their collective resources (see Chapter 1). On the other hand, the authors identify the “institutional framework”, by which the interorganizational and interinstitutional relations are not only rooted in free-market environment of economic and social determinants, but also in the legislative and institutional frames and traditions that influence in the relations shaping even when these institutional criterias would confront the actors’s free alliances.

The study of interorganizational relations has followed a trajectory from the 1970s since the traditional organizational analysis proved to be insufficient for the inclusion of the organizational environment in the organizational analysis (Mizruchi & Galaskiewicz, 1993). For more than forty years up to now the network analysis has been applied to organizational analysis. This has translated into an exponential increase in recent years of interorganizational relations research in many disciplines, in a broad field of organizational activity. Some recent revisionist efforts aim to frame the interorganizational network research and foresee the future research advances for the paradigm (Borgatti & Foster, 2003; Brass et al. 2004; Isett et al, 2011; Provan, Fish & Sydow, 2007). However, most of the research and literature on interorganizational networks was focused in private organizations networks or in corporate sectors (Isett & Provan, 2005). A step forward in the field led to a research strand that paid attention over the collaborative arrangements between public organizations and in the policy making field. Among the initial works Mokken and Stokman, (1978) analysed the interlocking directorate within corporate-government networks in Netherlands. The authors shook off the traditional disciplinary distinction between the private and public sector, and underlined the interdependence and constant interaction between corporate organizations and the state’s agency. But the work of O’Toole (1997) implied a significant impact as it made the public administration scholarly to turn attention to networks (Sungsoo & Il-Chu, 2009).

The research of networks in public administration setting obeys to the increasing policy arrangements of networked public institutions. For instance, the administrative challenges of multiple agency like the European Union (Börzel & Heard-Lauréote, 2009) or the government reinvention as a form of governance through networks (Isett et al. 2012) have urged to the necessity of enquiring the network approach in the public

setting and it is not absent of challenges and questions (O'Toole, 1997; Agranoff & McGuire, 2001). Over the last three decades the research on public organizational networks and in the public policy has tried to catch up the new displayment of the administrations and policies through networks. Along this period the network approach have developed substantially into integrative body of concepts, models and processes that could be interpreted as a normal research paradigm (Isett et al., 2011; Knoke, 2011; Provan, Fish & Sydow, 2007; Provan & Lemaire, 2012; Sungsoo & Il-Chul, 2009). Despite this recent scholar development, there are many open research lines what make networks in the public setting lacking research. Principally, the use of network analysis in public administration and public policy needs to overcome the metaphorical use of network approach, to advance in the measures of networks in the field, and a body of network collection instruments (Sungsoo & Il-Chu, 2009).

The immersion of network analysis to public networks followed the same process that motivated the use of networks analysis to the organizational field. The intraorganizational management perspectives used traditionally for the public management stayed obsolete and rigid for the increasing multiorganizational, multigovernmental and multisectoral forms that governmental policies adquired (Agranoff & McGuire, 2001). Although a direct extrapolation of the research and findings from the networks in the private sector could be applied to the public sector, there is a lack of understanding on how they could be applied (Isett & Provan, 2005). The interorganizational relations in the public sector present a distinctive nature and issues like the networks efficiency, and the reasons of public networks formation. Thus, these types of networks deserve specific enquire.

One of the most important characteristic of interorganizational relations in the public sector and public policies compare to the private sector is the set of the reasons that motivate the emergence of these networks. The literature on factors that motivate networks among organization is abundant and there are different typologies (see Ramos, 2012). In an integrative work Oliver (1990) extracts six types of contingences generable and applicable across different types of IORs and settings that aim to explain the causes of network formation and predict six types of interorganizational relations. First, the regulatory and legal norms from higher agency authorities, like governments, supranational institutions or industry regulatory bodies, impel to organizations to

arrange cooperation agreements that otherwise would not occur spontaneously and voluntarily. While the research is abundant in the voluntary linkages, the mandatory coalition has traditionally received less attention. However, the distinction between mandatory and voluntary is relevant as it relates to the consequences of the network formation.

The other five factors for interorganizational relations formation could be considered as voluntary cooperative arrangements. The search of power and autonomy in a context of resource scarcity explains also the motivation of certain organizations to get involved in certain networks in order to control other organizations and the flow of resources. Other factor of interorganizational relations is the search of common goals that might be beneficial to the all set of organizations. Rooted in the exchange perspective, this reason conforms a interorganizational network based in norms of reciprocity and collaboration, rather than in competition. This can be the case of organizations that search for new and common markets or interests. Based in the transaction cost perspective (Oliver, 1990), organizations move by the internal contingency of efficiency. Organizations search for coalition in order to improve their ratio of inputs and outputs. The uncertainty of the organizational context is also a contingency that prompts organizations to interact and cooperate with others to gain stability. These organizational relations are adaptive mechanisms to the uncertainty that resource scarcity or lack of knowledge might produce. By last, organizations might be motivated to interalliances with others in their attempt to gain legitimacy. Based in the institutional theory, the pressure of the institutional environment might impel organization to the need to increase their legitimacy, prestige or alignment with the institutional norms and expectations.

By other hand, Knoke (2011) points five types of IORs each of them with a distinctive network structure: the resource exchange, the information transmission, the power relations, the boundary penetration and the sentimental attachments. The resource exchange relates to the cost transactions causes as organizations moves for the exchange of resources (money, personnel, etc). Though organizations engage freely in collaborative coalition Knoke emphasises that the exchange of resources might be mandatory due to the legislation or administrative regulations that lead to interorganizational arrangements. In this sense, the power relations are also a source of interorganizational relations based in mandatory hierarchical linkages of one authority

over others. The boundary penetration is the common goal contingency proposed by Oliver (1990). A traditional type of boundary penetration is present in the lobbying coalitions between organizations to influence in decision making processes. By last, the sentimental attachments refer to the emotional affiliations that create feelings of reciprocity.

From all these factors, the public interorganizational relations are rooted to a great extent in the legislative, mandatory, advisory and externally induced motivation to establish interlocks and enduring relations. Independently of the dilemma to what extent public organizational relations should be spurred by governmental and legislative mandates, the question is that the logic of the cost transaction and benefits change significantly in this setting (Provan & Leamire, 2012). Nevertheless, there is not proved arguments that lead to assume that externally promoted public networks do not fill criterias of efficiency. In a continuum of top-down to bottom-up pattern of network emergence, Moynihan (2009) proposes a balanced perspective, for achieving an effective network, by which the network envisioned by the regulations or supra institutions should lead to the bottom efforts of both collaboration and trust among the organizations members of the network.

Other of the most important differential aspect of public sector networks is that to great extent they are moved by the collective interest rather than by the self-interest that support the different factors motivating interorganizational relations commented above (Knoke, 2011; Oliver, 1990). This has directly implied that the egocentric analysis dominant in interorganizational relations and the dyadic analysis seems the most appropriate to study organizations behaviour (Paulson, 1985; Mizruchi & Marquis, 2006). With dyadic approach we channel the self-interest pattern in the relationship building between organizations and substructures. However, the collective guiding action in the public interorganizational relations results in the whole network analysis. And most of the research in public networks is based in this macro analysis (Provan, Fish, & Sydow, 2007). This macro approach centers not in one actor's relations within a network, but rather in the whole set of ties among actors in the network and how the organizations are connected in order to achieve a common goal (Provan & Lemaire, 2012). By whole network is understood a group of three or more organizations connected in ways that facilitate achievement of a common goal, often formally

established and governed. The relationships among network members are primarily non-hierarchical and participants often have substantial operating autonomy (Provan, Fish & Sydow; 2007; Provan & Lemaire, 2012). However, both types of analysis are plausible depending on the research interest, at any case the whole network level analysis has received less attention (Isett, et al., 2011).

Isett and coauthors (2011) identify three different research streams in the network approach to public administration and policy. There is a first group of policy networks in which studies focus on actors and networks' structure during the policy making process and outcomes in a specific policy area. Therefore the institutional actors considered as members of the policy networks tend to be actors with political influence like political parties, legislatures, or lobbying organizations (Knoke, 2011). The research line of Provan and colleagues represents the second stream that takes public relations as collaborative networks for the delivery of good and services not affordable from a single organization or agency. The third group of research analyses governance networks, consisting on the coordination of different organizations at pursuing a common goal of decision making (Börzel & Heard-Lauréote, 2009; Isett et al., 2011).

Despite the network concept appears repeatedly in public administration and policy setting; it is used as a metaphor or to less extent as a method. And whatever the research interest is located the common understanding of the network concept appears dominantly as a form of governance. If the main aim of interorganizational relations and networks is the networks participants' goals, in the public and policy networks the main issue is the governance (Provan & Lemaire, 2012). A relevant value attributed to networks in public and policy setting is that networks work for some form of collective action. It can be in presumably forms of coordination or cooperation that networks will deliver some common benefit. But they do not necessarily have to do so. If they do so, we would in a tautological a priori assessment of networks impact. Networks might serve only for social exchange or for reducing transaction costs without any need for cooperation. For instance, Börzel and Hear-Lauréote (2009) pose the dilemma of considering the European Union as an example "governance in networks" which is the dominant pattern of governance in EU and consist in a top-down process of dispersions of competencies throughout different institutional levels, or "governance by networks", less present and defined as a governance in terms of actors inclusiveness and network

structure transparency. For these authors, networks in the traditional institutional theory have emerged as an attractive catching up term for the study of governance. And networks appear as a modern form of governance appealing for the challenges of regional actors (Fürst et al. 2001) of the European Union (Börzel & Hear-Lauréote, 2009), of global public policies (Benner, Reinicke & Witte, 2004).

Therefore, the network studies in public and policy setting need to enquire on systematic approach for the evaluation of the networks function (Isett et al., 2011). In doing so, different efforts point to the analysis of networks effectiveness as the analytical frame closely related to the network governance (Kenis & Provan, 2009; Provan & Milward, 2001; Provan & Lemaire, 2012). In the study of interorganizational relations networks tend to be effective when organizations are capable to meet more adaptive and flexible response to their needs in order to satisfy appropriately the clients' needs. In this case, the effectiveness represents the concept of satisfying the organization's stakeholders (Provan & Milward, 2001). These conditions tend to appear in "wicked problems" where the solutions and resources are disperse and required the necessary coordination. However, in the public and policy setting the customer-client axis is not the only relevant factor for assessing the network effectiveness. Public administration networks are composed of different stakeholders whose consideration is relevant for assessing if public networks are more effective as better form of governance.

At this respect, the works of Provan and colleagues represent a systematic effort for an analytical frame of network governance effectiveness, despite the complexity of constituents of public sector networks. Provan and Lemaire (2012) identify five characteristics of effective networks. The involvement at different levels, the network design and appropriate governance, the internal and external legitimacy of the network; and the stability of the network are all key factor for assessing the effectiveness of public sector organizational networks. First, the involvement of actors at multiple levels that refers to the multiplexity of relations, meaning the diversity of different types of relationships among the networks members. Multiple types of relations between actors in networks imply stronger and more intensive ties for more effective networks. This multiplexity or network member's level of involvement needs to be assessed not only at the level of top decision makers but also at the level of executive professionals. Second,

by appropriate governance the authors refer to the network management or the network as forms of governance, which is closely related to the network design. The “shared governance” is when actors work together with not distinction of a governance entity. All the organizations are involved, share responsibilities and coordinate. However, this model seems appropriate for small and spatial concentrated networks. When the network members are numerous there are other brokered forms of governance (Kenis & Provan, 2009). The “lead organization” represents a form of vertical relationship between the organizations. This might be the case of public administration networks for the delegation of responsibilities, where there is an actor with a central position. Obviously the dark effect of an appropriate governance is that certain actors tend to dominate other actors. By last, the “networks administrative form” which would be an alternative way to the lead organization, where an administrative entity is created or introduced for exclusively managing the network. That is, like an entity who would act as a broker or network facilitator. This can be case of the network governance studied by White and Christopoulos (2011), where a public administrative entity acts facilitating the interactions between economic actors.

An important axis for the governance of the network is to determine the distinction between formal and informal networks based in the degree of formality of their origin. The existence of informal networks and how they influence in the formal networks is a present topic across interorganizational research, because informal networks tend to become formalized over time (Barnes & Burkett, 2010; Burt, 2000; Garcia, 2002; Gulati, 1995, Gulati & Sych, 2008; Imperial, 2005; Isett et al., 2012; Provan, Harvey & De Zapien, 2005). Formal networks are explicitly and consciously created by managers and policy makers through binding agreement like contract, legislation, etc. The roles, responsibilities, and interactions dynamic tend to be clearly stated. They are stable networks facilitating the cooperation and a high level of trust. By contrast, informal networks are less visible and explicitly recognized. But they are used for information exchange, problems solving, and capacity attainment or for securing contacts for the later formalization into explicit networks (Isett, et al. 2011). When formal and informal linkages are considered, the structure of the network tends to change in density (García, 2002; Provan, Harvey & De Zapien, 2005), or in homophily of the relations and therefore to form an inclusion/exclusion criteria for the network membership (Isett, et al., 2011).

Third, the network design that refers to the network structure and the level of integration among the members in the whole network. At this respect, the major or minor degree of integration among the networks members will affect to the network effectiveness depending on the type of service or problem to solve. In the organizational setting the research on network structure detects different models (Baker, 1990, Morris & Montero, 1999), though in the public and policy setting it has characterised by treating networks structure in broad and qualitative terms (Provan & Lemaire, 2012). Nevertheless, we can consider different works that represent network structure in the continuum of loose and dense ties applicable both to the organizational and public management.

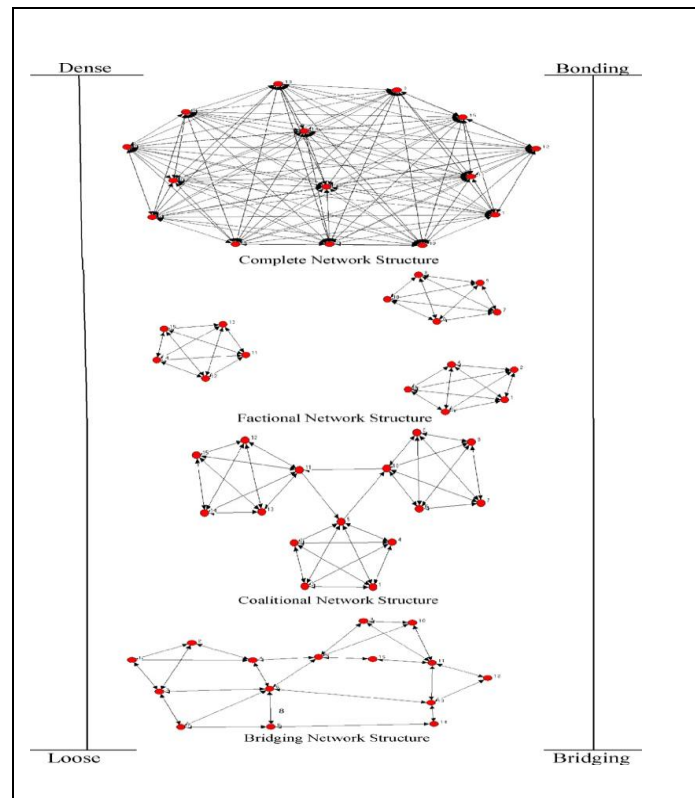
For instance, Burt (2000) argues about the different advantages of whether network closure or network structural holes. Similarly, Crowe (2007) identifies two different levels of cohesiveness or structure of interorganizational networks that imply different economic strategies, whether for self economic development or industrial recruitment, and consequently advantages for the economic development. She proposes that interorganizational relations might adopt four different models of network structure that go along the distinction between bonding and bridging social capital (see Figure 4). For the analytical distinction she uses network indicators of k-core¹ as a measure of bonding structures and cut points as indicators of structural holes and bridging social capital. The “complete network structure” is based in very dense ties among actors, this network structure represent the maximum of cohesiveness possible. This network may be effective for high levels of trust and lower risk for cooperation, both benefits that Crowe (2007) finds necessary for self-development projects. The “factional structure” represents a network with different unlinked subgroups of dense ties. This model does not imply advantages for the economic developments. The isolated factions do not permit the flow of information and resources, making industrial recruitment difficult, and trust remains at low levels jeopardising the self-development projects. In the “coalitional network” there are different factions connected through cut points. This structure permits both industrial recruitment and self-economic development. It is possible the considerable level of trust and at the same time the flow of information and resources among the different subgroups. By last, the “bridging network” structure is a network with loose ties among all the actors members, and there are groups with

¹The k-core is other subgroup measure of SNA and is a maximal group of actors, all of whom are connected to some number (k) of other members of the group (Freeman & Riddle, 2005).

redundant and dense connection. This structure allows higher advantages for industrial recruitment, though it lacks the necessary trust and cohesiveness for self-development strategies. Provan and Lemaire (2012) conclude that those effective public networks should contain two levels of network integration combining the strong and dense ties center around some particular service or policy area with those weaker ties for brokering and accessing to new information.

Following the critical distinction between closure and structural holes, or bonding and bridging social capital, Fürst et al. (2001) distinguish two patterns of social capital according to the networks of regional actors. Indicators of network analysis like the centrality, the existent subgroups like cliques or betweenness will tell about “mobile” or “stationary” social capital. There are regional actors with a majority of space independent relationships, that is, with global orientation. These relations imply a “mobile social capital”, with low level of trust, low inward integration but with very flexible and spatially sparse network structure. Those regional actors with more stable relations regionally oriented, have a “stationary social capital” that implies higher level of interpersonal trust and reciprocity. For these authors the most effective regional actors are those capable of mobile social capital and to make it stationary.

Figure 4: Models of Interorganizational Networks



Source: Crowe (2007).

Additional to this systematic approach we find interesting and traditionally underestimated the developmental stage of the network. The network has been defined before also as a dynamic structure of different constituents that take a process of inception and consolidation. Also the step by which informal networks become over time in formal networks is a developmental stage of the network itself. Kenis and Provan (2009) without pointing a specific number of stages, underline the existent different developmental stages of the network cycle proposed by others and clearly parallel to the organizations evolution cycle. These different stages arise with the emergence of coalitions and through a process of formalization of the networks nature towards federations and might end at critical conditions. Therefore, any analysis of governance effectiveness or the goal attainment needs to consider the developmental stage of the network.

2.5. About social capital and networks in border regions and cross-border cooperation.

In this section we tackle first a brief introduction to the study of the cross-border cooperation and cross-border regions in the context of the European integration process through its regional policy. We will see the cross-border cooperation as a cumulative process with different stages of development and different approaches. And second, we explain how the frame of social capital and network analysis is implicit in the practice and research of cross-border cooperation, what justifies the need to apply this approach.

2.5.1. The European cross-border cooperation and cross-border regions.

The cross-border cooperation (hence CBC) has become in the European Union in a crucial objective of the institutional treaty of Lisbon and in one of the third pillars of territorial cooperation of the Regional Policy. This priority obeys to a double process of regionalization and European convergence. On the one hand, the regions are leading an historic tendency of increasing their role, crossing the national boundaries (Perkmann, 2002; Perkmann & Sum, 2002). During centuries there has been in Europe cross-border spaces between countries, though is recently when these border areas has become into political and ambitious projects and as alternative policies of governance besides the Nation-states and intergovernmental institutions. This occurs in a context of growing emphasis in the European official discourse about the relevance of decentralized processes of policy making. On the other hand, the European Union have witnessed the need to harmonize the socioeconomic standards of the populations from the different regions to pursue the European cohesion. And this process is connected in different ways with the globalization and the acceleration of interdependency between western and more recently with Eastern societies (Anderson et al., 2002).

According to the Madrid Convention (1980) in the article 2.1 cross-border cooperation is “any concerted action designed to reinforce and foster neighbourly relations between territorial communities or authorities within the jurisdiction of two or more Contracting Parties and the conclusion of any agreement and arrangement necessary for this purpose”. For the AEBR (1997, 2008) the CBC refers to the overcoming of the barriers and differences between European countries members and consists in direct cooperation

between regional and local institutions in all the possible life spheres and including all possible actors. For the CBC to be a long-term priority it needs sooner or later binding cross-border organization structures. But we encounter with other more operational definitions. The cross-border cooperation refers to the collaboration of sub-national authorities across national borders with a vertical and horizontal coordination of policies to achieve common objectives in specific areas. The collaboration must be more or less institutionalised and stable over time (Perkmann, 2003; González, Guimerá & Perkmann, 2010). In a more broad idea on the basis of commonalities and different types of institutions Sousa (2012: 5) defines CBC as “any type of concerted action between public and/or private institutions of the border regions of two (o more) states, driven by geographical, economic, cultural/identity, political/leadership factors, with the objective of reinforcing the (good) neighbourhood relations, solving common problems or managing jointly resources between communities through any cooperation mechanisms”.

Thus, cross-border regions have become in the starring ground for the European Union institutional and procedural innovative arrangements. The border regions have changed progressively their meaning, from territories more sensitive to the national sovereignty and control, to territories under new cross-national forms of governance. They have passed from being communities characterised by the separation, dispute or controversial relations with the neighbours to communities characterized by the incipient or continuous flux of resources and relations. For that reason Sousa defines border regions as “special area of fluxes and exchanges of a social, cultural, economic and political nature, a space where the development of multiple activities takes place and where the type and intensity of transactions have evolved in time” (2012:3). Besides other definitions that take for granted the commonalities or a certain degree of historical, or socio-economic unity, Perkmann defines cross-border regions as a bounded territorial unit composed of the territories of authorities participating in cross-border cooperation initiative” (2003: 157). The distinction is important as not necessarily all the cross-border regions represent a continuum of cultural or socio-economic processes. If we would use this conceptual notion of cross-border regions, we would be assuming the expected function of cross-border regions for the European Integration. A functional concept of the cross-border regions in Europe envisions these territories as a working area and a space for opportunities for the exchange a common interdependence. What

has attributed to cross-border regions to be plural ground for European integration experiments, being in many cases considered as laboratories of the European integration (Knippenberg, 2004).

The potentiality or a-priory function of cross-border regions as territorial, cultural, socio-economic or political regions, where presumably take place processes of integration, has awakened the research interest on the myriad of cross-border regions existent in the old and new Europe. The European Union, with its institutional and legislative arrangements, have promoted the study of cross-border regions and the evaluation or impact of its regional policy. Usually the CBC does not reflect the national priorities but the EU and that is why the CBC represents one of the three priorities of is cohesion and regional policy (Gabbe, 2005). Specially local and regional authorities have encountered in the cross-border cooperation a reinvigorated role in transnational politics. But also the study of cross-border regions and cross-border cooperation has taken a prominent place in the scholarly. At this respect, there is a spread consistency at certifying that the reasons why CBC has been so relevant international research issue are for going further in studying the economic development and the security or political stability in the European Union. In the academic field the cross-border cooperation has been subject of study since the eighties, though with greater bibliographic results in the 90's decade, mainly in Europe, but also in North America, Asia and Africa. These years have been also a flourished time of cross-border research centres across Europe (Anderson et al. 2002).

The CBC has emerged in recent decades as one of the major processes of European integration (Rojo & Varela, 2010) and has become in one of the main topics currently in Europe (Rojo, 2011). The European CBC is a cumulative process that crosses different stages and border regions with the increase of the so-called Euroregions, or Working Communities (Morata, 2010; Terlouw, 2012; Gabbe & Ramirez, 2013). This longevity has made of CBC to be targeted from different approaches: as an historical process of progressive convergence between regions with different developmental stages; as European Territorial policy with an expected impact over the socioeconomic characteristics of the border regions and the population; the study of drivers and obstacles of the CBC in the case-studies of cross-border regions; the study of transnational institutions leading cross-border cooperation; and more recently the study

of social and cultural aspects and dynamics of the citizenship living in cross-border regions.

Regarding the CBC as an historical process there have been different phases. Perkmann and colleagues detail three or four developmental stages notable in the evolution of the CBC in the European Union (González, Guimerá & Perkmann, 2010; Perkmann, 2003). The first historical milestone was a bottom-up CBC of local governments as the main boosters aiming to improve their socio-economic conditions (Rojo and Varela, 2010). In this first period since the 1960's the Council of Europe have been the main promoter of the CBC with the promotion of local neighbouring relations (Sousa, 2012). The first experiences were leaded by the Nordic countries that took the initiative with the Scandinavian groupings and signing in 1952 the Nordic Council (Rojo, 2011), and the first Euregio in 1958 between municipal associations from Enschede (Holand) and Gronau (Germany).

A second stage was characterised by the emergence of the first legal instruments for cooperation at the European level, such as the Madrid Convention, which was celebrated in 1980 (González, Guimerá & Perkmann, 2010). In 1971 arises the Association of European Border Regions (AEBR) a transnational European institution for the benefit of all the European border and cross-border regions. The Madrid Convention and other documents provided by the Committee of the Regions and the AEBR provided the guide for the first structures of cross-border cooperation. Lately through successive protocols in 1995 and 2001 the CBC is concreted and broadened to other institutions and outside of the European borders (Rojo, 2011).

The third period involved an injection of European structural funds to the well-known community programme Interregs. The EU created a range of financial instruments to promote one of its more characteristic policy and priority: the multi-annual programmes of INTERREG created in 1990 and the PHARE and TACIS programmes targeted especially for the cross-border cooperation with at that time European candidate members from the Eastern block. The Interreg programmes were targeted to boost the development of Europe, to implement the European principles of subsidiarity a partnership, to increase the economic and social cohesion and cooperation, to open the labour market across border and the preparation of the new members (AEBR, 1997).

Practically in all the different type of European region the Interreg have the priorities of promoting cross-border networks, not exclusively in terms of infrastructures but also socio economic networks between different authorities and organizations (AEBR, 2000).

The European Commission launched the Interreg I programme for the period 1990-1993 that contemplated the cooperation between contiguous border region within the internal border of the EU and the Euroregions. The Interreg II 1994-1999 did not required the geographical continuity between regions and expanded the funds to transnational cooperation. The Interreg III 2000-2006 included the transnational, the cross-border and the interregional cooperation. Focusing in the Interreg programmes of cross-border cooperation the number of target areas increased. In Interreg I these areas were the cross-border and terrestrial NUTS 3, belonging to the NUTS 2. Thirty one operative programmes where developed across fourteen cross-border pilot regions. In the Interreg II the areas are extended to the rest of terrestrial NUTS 3 and those maritime. The principle of 20% is setup, by which the Interreg programme can reach to non-cross-border NUTS 3. In this programme the number of operative programmes increase significantly to fifty nine. And in Interreg III the rule of 20% is extended also to the non cross-border areas (García-Durán, Millet and Casanova, 2009).

In the 1990s, these financial programmes provided an inflection point and an expansion period for the cross-border regions and cross-border structures of cooperation, especially in Eastern Europe. By means of accession to the EU the eastern countries implied an impulse to the proliferation of cross-border regions and structures. This third period is characterised by the quantitative extension of cross-border cooperation and cross-border regions. The coverage has been such that practically all the local and regional entities in border areas participate in certain way in CBC, from the Iberian cross-border regions to the Baltic cross-border cooperation.

However, in different cases the attempts from local and regional authorities encountered with the national logic and had little possibilities to mature along time (Rojo, 2011, Sousa, 2012). Once it was recognized the complexity of the CBC and the insufficiency of the existent instruments for cross-border cooperation (Barca Report, 2009), the incipient fourth period brought revisionist and qualitative changes in the

implementation of CBC The famous Interreg programme become in the period 2007-2013 in the European Territorial Cooperation objective of the Regional Policy together with the Convergence and Regional Competitiveness and Employment objectives. For the first time, the European Territorial Cooperation becomes in the priority objective in the period 2007-2013. In the Interreg IV 2007-2013 are delimited those maritime cross-border areas and is newly extended the rule of 20%. In this programme period practically all the terrestrial and maritime NUTS 2 are eligible areas. The budget allocation of the Interreg I programme have been increased progressively in the further programmes. However, in the Interreg IV this allocation has followed different criteria. The budget distribution based on the relative rent of the cross-border areas changed to the criteria of the relative population. Thus, this criteria excluded the socioeconomic level of cross-border regions (García, Millet & Casanova, 2009). Nevertheless, Interreg programme is still far from completing a process of economic integration of the EU, and postevaluations point that besides the previous history of cross-border cooperation in the cross-border regions, there are other important factor outside of the Interreg that hinder the economic and social cohesion (Bergs, 2012).

By other hand, the malleable entity that Euroregions adopted in different cross-border regions and the difficult implementation of CBC initiatives led to the European Parliament and the Council of Ministers to launch a set of standard and unified arrangement of territorial cooperation with the creation of a new figure in 2006, the European Grouping for Territorial Cooperation (EGTC). This new territorial cooperation tool confers to public entities greater discretion to institutionalise long-term cross-border cooperation, and it makes them more efficient and accountable in the use of EU funds. These structures are considered as bottom-up and are likely to overcome the Euroregion as models of cross-border cooperation (Sousa, 2012: 11). Although is still soon to ascertain the evolution of these groupings. On the contrary, the Euroregions have longer time for the research and evaluations on them.

2.5.2. The Euroregions.

In the last decades the European Union with its institutional, legislative and financial agency has promoted the creation cross-border regions with a certain level of institutionalization called Euroregions. These Euroregions have emerged as a relevant

type of cross-border cooperation within the European Union (AEBR 2008). This phenomenon explains the recent academic interest in Euroregions as a concept (Medeiros, 2011) or as an institution (Lepik, 2009; Perkmann, 2002; Wolf et al., 2006). By the beginning of 2000, more than 70 regions were labelled Euroregions, or Working Communities (Perkmann, 2002; Parlamento Europeo, 2005). A decade later, there are an estimated number of 133 cross-cross border regions (González, Guimerá & Perkmann, 2010), and 136 by 2013, according to the list of cross-border region members of the Association of European Border Regions, AEBR (2013). This high number has not taken a progressive evolution but a two- speed development, from the first Euroregion founded in 1958 between the Dutch-German border followed by a slow flourishing period of new Euroregions, to the relevant input in the 90's boosted by the Interreg programmes addressed to frontier initiatives in occidental Europe and eastern Europe.

Although in some cross-border regions, these administrative bodies have been created only recently, their founding members (such as regional and local governments) bring experience in leading the implementation of CBC projects before the creation of the Euroregion. The previous areas involved in more stable collaboration have officially been renamed Euroregions based on a loose set of criteria. Many of these Euroregions are small-scale cross-border regions that are entitled to conduct CBC projects depending on the interest of local and regional authorities. The goal is for these regions to become integral actors in cross-border activity and to provide a bottom-up structure for addressing cross-border issues under the auspices of the EU. The majority of cross-border regions tend to be micro regions at the NUTS II that are integrated by local and regional actors, though in some cases comprehend entire countries (Perkmann, 2002; González, Guimerá & Perkmann, 2010). Through this new administrative border machinery, both local and regional governments have gained reinvigorated roles in line with the trend towards regionalism and the goal of the decentralisation of European Integration (Downs, 2002; Perkmann, 2002). Thus, the implementation of Euroregions and CBC has been associated with a bottom-up approach of the European Integration and Cohesion Policy.

According to the Association of European Border Regions, AEBR (2000) the Euroregions can adopt different organizational structures, from working communities to

non governmental organizations. In any of these possible forms the Euroregion aims to form a multilevel network with local, regional or national authorities. For Lepik (2009) the Euroregions are structures that promote the cooperation between neighbouring local and regional authorities. Within this extent diversity, the Euroregion are defined as entities created under flexible criteria, capable to carry out projects of cross-border cooperation from the interest of sub-national authorities across national borders (Perkmann, 2003: 7). The main goal is to become an important actor in the activity of the cross-border region hoarding a great diversity of fields like infrastructure, education, commerce, etc. They do not constitute a new type of administration and the capacity of Euroregions is limited to the competences of those institutions members. However, they are envisioned as new form of cross-border governance based in the networked authorities who are members, and in their capacity to encourage new cross-border networks between different actors.

These conceptual descriptions make Euroregions to be considered as democratic structures of network and bottom-up governance of the European cohesion policy. The AEBR (2000: 7; 2006: 34; 2000:8) attributes to the CBC “the strengthening of the democracy and the development of local/regional administrative structures”. In this sense, the Euroregion are ascribed to an institutional repertoire that describes them as democratic agencies facing the local and regional cross-border relations. In the institutional discourse, they appear as decentralized agencies with first hand knowledge of the cross-border regions. Rooted in an institutional European discourse, Euroregions are designated as informal, bottom-up structures or agencies that not only have a pseudo-institutional frame but also have sufficient authority to address local and regional issues that affect the border areas. Euroregions involve both local and regional governments in undertaking border issues due to the distance from central-state and European institutions. In other words, Euroregions reflect the EU in miniature or at close range (Association of European Border Regions, 2008: 7).

As we pointed above, there CBC in the European Union has been a cumulative process in which is possible to established different models based on the functionality of the CBC and the degree of common strategies. Among them, Euroregions can be defined also as a model of CBC. Sousa (2012) establishes four different types of CBC depending on the level of commitment of the parties. The less intense type of CBC is

the “awareness raising cooperation” this model requires the lowest level of political commitment. In the “mutual and cooperation” model we encounter the cross-border cooperation arrange from the common emergencies that required the mutual collaboration. The “functional cooperation” reflects a greater political commitment not only for solving urgent problems occasional bilateral agreements but for the search of common opportunities, In this model Sousa outlines the cooperation raised from Interreg programmes. By last, the ideal type of cooperation is the “common management of public resources/services”. This is the cooperation that seeks for joint strategies that benefits at both sides of the border and require the highest level of political commitment and continuous multilevel networked institutions. The Euroregions and the recent EGTC appear associated to the last two models of CBC described.

For Medeiros (2011), the Euroregion is also an ideal type of CBC or the genuine model of CBC. On the basis of certain criteria the author establishes a typology of possible models of CBC. In the pseudo CBC sub-model the cooperation is very weak as well as the political commitment of local and regional institutions, though any European cross-border region obeys currently to this type. In the surging CBC sub-model we encounter the incipient CBC, boosted by the Interreg programmes though still there is little effect in the borders and the regional institutions outweigh the local ones. The structural CBC sub-model reflects permeable regions in terms of economic and social flows. Permanent CBC structures emerge though there are administrative and institutional obstacles, and the development of common services is not yet a reality. By last, the genuine CBC sub-model or Euroregion implies that the decision making process is taken with a multilevel approach. The cross-border flows are strong and imply positive socioeconomic effects at both sides of the border and there are public services shared by the population of the cross-border region. There is also a consolidated cooperation in the economic and academic fields between companies and universities. On the other hand, the civil society and local actors have an important and continuous participation in the different and multiple process of cross-border cooperation. This model takes place also when there is a strong cultural identity. This ideal type obeys to the functionality expected from the CBC in cross-border regions.

The study of the Euroregions stresses in the role that they can play as key players in cross-border cooperation, as well as to the actual scope of what they are called to represent following this theoretical model described above (González & Gualda, 2012). However, many of the so-called Euroregions or cross-border regions do not correspond to this ideal model of CBC. They are still in the making process or generally considered as exploratory experiments of the European integration (Knippenberg (2004). They face the difficulties of achieving a real bottom-up process in the incorporation of multilevel governance structure and well coordinated institutional network (Lepik, 2009; Pikner, 2008; Terlouw, 2012).

Different studies along the European map reflect a wide variety of factors that hinder cross-border cooperation. Knippenberg (2004) emphasizes that the factors that most hinder a true integration in the Maas-Rhine Euroregion are the national legal systems, the media and information focused on domestic issues, and especially the influence of the national cultures and identities. The Spanish-Portuguese cross-border border region has a structural problem of great institutional asymmetry between Portuguese and Spanish institutions (Fernandez, 2008). Others find conflicting historical relations and cultural identities as the key to greater cooperation and integration (Leibenath, 2007). In this line the AEBR, aware of certain modes of governance in cross-border cooperation projects in these cross-border structures, questions the proper way to cooperate. In an effort to improve the governance of these new institutional forms of cooperation, AEBR provides a series of recommendations and best practices to guide beneficiaries and institutions in general in the design and implementation of cross-border cooperation projects which are directly linked to decentralized processes of political decision and the inclusion of all institutional actors from the border regions (AEBR, 2008).

We can see that after more than twenty years of European cross-border cooperation with the Interreg programmes and the upsurge of cross-border structures there has begun a revisionist work in institutional and academic settings in the last decade. Parallel to the institutional evaluation and reports of the Interreg programmes (Bachtler and Wren, 2006; Barca Report, 2009; Directorate General for Regional Policy Report, 2009; 1010a; 2010b, 2010c), different scholarly appraisals pay attention to the objectives of cross-border cooperation (CBC) from different perspectives. In the study of border regions Van Houtum (2000) distinguishes three theoretical approaches. The flow

approach lies in the classic economic studies applied to the flow of economic activities between borders and analyse the impact the economic capital across border on the integration process. More recent is the second approach of cross-border cooperation that raised in the 90s at the shadow of the Interreg programmes. Many of these studies are policy analysis or policy oriented. The cross-border regions are considered not as barriers but as the multiple micro spaces of flows that should represent the European integration process. In this strand appear the economic, political, social and cultural dissimilarities that hinder the cross-border integration, or the fund dependency of many cross-border initiatives. By last, a third approach has been named as people approach, which centers the study of cross-border regions from a humanist perspective. This strand focuses on the human and social constructions of cross-border regions and their alignment with the projected European integration process (González & Gualda, 2013). The institutional CBC needs to be supported in a social background and in line with the border context to ensure the sustainability of CBC projects and future European integration (Kratke, 1998; Knippenberg, 2004; Leibenath, 2007).

The interest of the cross-border cooperation and people approaches is in the disparity of a political construction and the reality of border areas. Generally, the contributions from the human perspective remark on the division or gap between the projected scenario for cross-border regions at the political level and the daily reality of the people living in the border region, their relations with the border and border behaviour (Paasi, 2001; Löfgren, 2008). This people-oriented framework entails a set of different and relevant aspects. On the one hand, the studies stressed in the cultural or cognitive assets like the people identity and the constructions of identities attached to the cross-border regions, the influence of the national and local cultures, people's attitudes, and the people's perceptions and narratives related to their border living (Berg, 2000; Ehlers & Buursink, 2000; Hospers, 2006; Löfgren, 2008; Paasi, 2001). But other types of research could be discerned. A research more oriented to a behavioural and structural approach focus on people's border behaviour, their border relations and trends in crossing the border like those based on border commerce or shopping, tourism, or daily commuting (Gonzalez & Gualda, 2013).

2.5.3. Why social capital and networks for the study of cross-border cooperation?

Briefly in the section 2.5.1 we described different approaches to the study of cross-border cooperation and cross-border regions making in the European Union. In this section we explain how in different theoretical and empirical contributions to the study of cross-border cooperation and cross-border regions arise the notions of social capital and networks. We support that social capital and networks offers a complementary perspective to the fields that have been traditionally approached from institutional, and policy analysis, and economic perspectives. Revisiting the different definitions and models of cross-border cooperation in terms of networks we can understand that the cross-border cooperation is much about networks, flow of resources like information, or access to resources between people, organizations and institutions. Following Lin's conception of social capital (2008), then we have both networks and resources to talk about social capital in cross-border regions.

On the one hand, the European Union has evolved into a space of places, where the cross-border flows and interrelationships are constructing or deconstructing the traditional boundaries (Anderson, O'Dowd & Wilson, 2002). Networks then appear as the new form of European Union cohesion process. The emergence of collaborative networks in the European Union is an adaptative response to the flexible conditions of capitalism and the re-territorialization challenges exposed by the globalization. Thus, trans-national, trans-regional, trans-local or trans-boundary networks in the European Union and even more through the cross-border cooperation instruments are of great interest in the scholarly debate and of great relevance for the policy practice (Church & Reid, 1996; Enokido, 2007). In this terrain of flexible governance the cross-border cooperation arises as the exemplary multilevel policy where local and regional institutions use networks as form of governance. The cross-border cooperation is also considered as an experiment for the European Union democracy making (Hall, 2008), and consequently a laboratory for top-level governance through networks between different governmental levels and between the citizenship and the institutions. In this last sense different studies have applied a more top-down use of social capital, where governments might have also the potential capacity for the development of social capital and therefore the enhancement of democracy (Koopmans, 1999; Kleinhans, Priemus &

Engbersen, 2007; Knack, 2002; Lowndes & Wilson, 2001; Maloney, Smith & Stoker, 2000; Newton, 2006).

On the other hand, the new regionalization process taking place across European borders is a matter of progressive social and economic integration through the diminishing effect of the borders and national barriers. This integration emerged from the flow of people, associations, and organizations that foresee at the other side of the border a motivation or advantage to cross it. In this cross-road, multiple interactions converge into cross-border networks which dynamism might offer a distinctive perspective on how the European integration is taking place. Under the label of the bottom-up approaches we find other types of studies, that scape from the more traditional institutional and economic theories. This is what has come to be named as the people's oriented analysis that integrates the human dimension in the study of borders and cross-border cooperation (Van Houtum, 2000). This human approach claims the mismatch between elite process of cross-border regions making and the daily reality of informal actors (Brym, 2011; González & Gualda, 2013; Hall, 2008; Hospers, 2006; Löfgren, 2008; Shen, 2003; Scott, 2002; Van Houtum & Strüver, 2002). This bottom up perspective centers the attention in cognitive aspects like identity constructions, perspectives and attitudes towards neighbours, towards cross-border policies, etc. The interest in the people or humanist approach has focused on the missing social-cultural dimension in the political construction of border regions and cross-border cooperation. But this can have also a complementary perspective through the study of social networks and social capital across borders. In this respect, it can be interesting to investigate how border relations among people in boundary areas are and how they might be related with institutional cooperation. Are these relationships an effect of progressive institutional border infrastructure and institutional cooperation or an inevitable precondition for a better achievement of the objectives of cross-border projects? We could count an endless number of questions as we are facing a very fresh field of research with a great empirical and explaining potential for the application of cross-border cooperation and of the European integration.

The use of social capital and network notions are not a recent conceptual resource in the study of cross-border regions and cooperation. Looking at some definitions or criterias of the cross-border cooperation and cross-border regions we encounter an

indiscriminated use of terms like networks, cooperation, coordination, capitalization, integration, etc. all present in the conceptual frame of social capital and social networks. However, most of these terms are only implicit or used metaphorically to describe synthetically the complexity of the cross-border cooperation, cross-border governance or cross-border integration. For instance, Sildaway (2001) refers to the imagined European community as a harmonized and networked society associated to governance for an ever closer union. The cross-border cooperation programmes of Interreg might be also considered as a financial mean for boosting institutional and business sectorial networks of cooperation across the borders (Bergs, 2012). In the official documents of Interreg is notably appreciated the extensive use of the term networks, and others like clusters of information, or brokerage (DG, 2009; DG, 2010a; DG, 2010b; DG, 2010c). For the AEBC the cross-border cooperation has converged into networks and partnerships with governing capacity beyond the competences and structures on both sides of the border (Gabbe, et al. 2006). A classical and accepted definition of cross-border cooperation refers to the collaboration more or less institutionalized between public administrations at multiple levels from different states stabilized over time which maximum expression is the creation of structures of cooperation for the horizontal and vertical coordination of policies and actions (González, Guimerá & Perkmann, 2010; Perkmann, 2003;). This definition includes the notion of interorganizational networks, that is, coordinated institutional actors for the achievement of a common goal that could end in the creation of Euroregions.

At the same time, the Euroregions are defined as the maximum representation of institutional coordination. In this context of stabilized cross-border cooperation, Euroregions represents the final stage of a good institutional network that success in the creation of entities whose nature varies across the European borders. In different authors's vision of Euroregions, the social capital and network metaphors lie beneath. They might be policy facilitators, catalysts, network builders, processes' initiators, framers of common agendas or simple venues for promoting exchange meetings and events (Lepik, 2009). In the genuine model of cross-border cooperation proposed by Medeiros (2011), we find the Euroregion defined as an entity that acts as coordinator and has a strong power and centrality due to the binding competences attributed. In this model of cross-border cooperation there is a strong density of relations between different actors who are also bounded by a strong cultural identity. For Pikner (2008)

cross-border governance capacity of Euroregions lies in the communicative interactions which create social networks and mobilize interregional resources. For this author the multilevel and cross-border networks are the appropriate form of governance for the Euroregions to achieve democratic legitimization. Different recommendations exposed by Lepik (2009) for solving problems of Euroregions in the Baltic Sea Region pointed to the triple helix model consisting on the coordinated cooperation of the mix of political representatives, the establishment of contacts with universities and business sector. These suggestions represent the idea of broad networks of structural holes and bridging ties, and between-group or bridging social capital.

In the analysis of the Euroregion in the Dutch–German and Danish–German Border, Klatt and Herrmann (2011) conclude that the Euroregions are cross-border information centers, network organizers, and support organizations, what confers attributes of brokerage and/or betweenness to the Euroregions in cross-border networks. By last, Grix and Knowles (2002) already use the social capital frame for assessing the role of Euroregions and go beyond the metaphorical value of social capital proposing two analytical assets of social capital (bridging and bonding) for evaluating Euroregions. For these authors Euroregions are bridging organizations capable to promote both within group social capital, meaning the Euroregions members, and between group social capital, meaning the institutional relations across the border. The Euroregion might act as a social capital maximizer, acting as a broker that possibilites the access to stocks of social capital. The authors evaluate the German-Polish Euroregion Pro-Europa Viadrina from the key actors' perception, identifying those institutional actors who act whether as limitators, for instance, those that could be cut-points in terms of SNA or as brokers, those with high betweenness.

All these examples encourage for the use of social capital and networks conceptual and methodological frames into the study of cross-border cooperation and cross-border regions. As we appreciate from the conceptual developments presented above in the section 2.5.1., the cross-border cooperation is founded in Putnam's (1993) idea of social capital as the coordination and cooperation for the mutual benefits of the members. Burt (2000) emphasizes that those actors better connected are the ones who get better benefits, which refers directly to the idea of stock of social capital and the access gained by those better positioned actors in networks. Bringing forth the classical definition of

social capital, Bourdieu's and Coleman's definitions encounter certain parallelism with the concept of cross-border cooperation. Cross-border cooperation is all about durable networks of more or less institutionalized relationships of mutual acquaintance (Bourdieu, 1980), and it represents also a variety of entities that forms a social structure of networks to facilitate certain actions (Coleman, 1988).

But, social capital and social networks not only might arise as mere metaphorical discursive elements in the study of cross-border cooperation and cross-border regions building. They imply an innovative perspective and methodology to explain the complexity of cross-border cooperation and socio-economic exchanges across the borders. The main contribution arises in two main research lines. One is to apply social capital and networks to the study of cross-border cooperation as a policy network. This research arises in the top-down and formal level of analysis. The other research strand consists of applying social capital and social network to the study of cross-border flows of interaction between people living in the border, and the socio-economic actors. This research line centers in the informal and bottom-up level of analysis. These two levels of analysis represent the split of research between first the institutional cross-border cooperation, lead by public institutions, based in the analysis of programmes and projects implementations and the institutional cross-border arrangements; and second, the more social or informal cross-border cooperation, lead by informal actors and based in the analysis of their identities, attitudes and perception of the border neighbours,. In this sense, there is a lack of literature that achieves to integrate both formal and informal dimensions of the cross-border cooperation (Grix & Houžvička, 2002). Thus, social capital and social networks approaches could give a boost to the study of cross-border cooperation and cross-border regions. It could permit the analysis of the formal and informal processes by which cross-border cooperation and cross-border regions really take place. From social capital frame is possible to see the cross-border cooperation has top-down and bottom-up processes for the cross-border regions making. The study the cross-border cooperation then would target to the analysis of the network structure, as form of multilevel governance, as interorganizational relations and as interpersonal and community interactions that together with the analysis of general and contextual trust, identities, and attitudes could offer a more holistic approach.

The policy network approach is already proposed by Perkmann (2002: 114) as the most appropriate way for explaining the European cross-border cooperation. As we commented before, the network approach to the public and policy sector expands the capacity to explain, in this case, the complexity of cross-border cooperation. The structure of relations between nodes has more explanatory power than the attributes of the nodes and can complement the attribute perspective (Wellman, in Lozares, 1996). According to this idea, cross-border cooperation should not be studied only through the attributes of projects and institutions, but also through the relations among institutions that engage in projects for common goals. To think in structural terms in the cross-border cooperation means that we have to search for those patterns of relations among institutions, and how they manage through their networks to accomplish the programme goals. For instance, much of the evaluation of the cross-border cooperation programme Interreg (DG. 2009; 2010a; 2010b; 2010c) is based on the achievement of efficiency, that is, in terms of an equation of cost and outcomes. However, considering the Interreg programme as a multi-level cross-border institutional network, the examination of cross-border cooperation and its efficiency should turn also to the analysis of the network structure, the presence and role of leaders, the nature of the networks, and the network performance, the existent opportunities or obstacles for the flow of information and resources. Network approach could offer then an analytical frame of network governance effectiveness (Kenis & Provan, 2001; Provan & Lemaire, 2012) to cross-border cooperation.

By the study of the interactive flows, the existence of economic subgroups that promote economic dynamism in the border regions, the degree of social exchange between people living in the border, and the expression of identities and attitudes supportive for cross-border exchange and support, it is possible to appreciate the extent to which cross-border regions have advanced into the European cohesion process. Thus, the inclusion of the informal side of cross-border cooperation or the bottom-up analysis is believed important in the development and continuity of the institutional projects and cross-border structures like the Euroregions (González & Gualda, 2013; Knippenberg, 2004; Kratke, 1998; Leibenath, 2007). Equally, to include the informal cross-border cooperation is a necessary policy strategy for the legitimacy and democratic character of the institutional cross-border cooperation. Up to now, it is obvious the split between formal and informal European integration (Paasi, 2001; Löfgren, 2008). It is also

accepted that the informal integration taking place through continuous dynamics of border market, communication and social exchange underpins the formal integration lead by policy makers, through projects and normative rules (Grix, 2001; Grix & Houžvička, 2002). However, to inquire how they are related or interconnected is a complex exercise.

The bottom-up approach has entailed a set of different aspects all of them related to a cultural and cognitive analysis based in the study of people identity, and identity construction around the border regions, the still dominant national and local cultures in the cross-border regions, the people attitudes and perceptions towards the new processes of institutional cross-border cooperation and cross-border region making, etc. (Berg, 2000; Ehlers & Buursink, 2000; Hospers, 2006; Löfgren, 2008; Paasi, 2001). These analyses are rooted in a cultural capital approach. Indeed, we can also assume that analytical elements of cultural capital are necessary predecessors of social capital (Durstun, 2002). But a parallel and complementary type of analysis would include a behavioural and structural approach focus on informal actors and people's border behaviour, their border relations and patterns in crossing the border like those based on border commerce, shopping, tourism, daily commuting, or interpersonal relations (González & Gualda, 2013). Thus, social capital and the social network analysis could inquire not only how these two distant but dependent dimensions for European integration are interconnected, but also to help to generate a social capital across border regions that promote enduring integration processes.

2.5.4. The study of social capital and networks in border regions and cross-border cooperation.

The use of social capital and social network analysis in the border areas and/or cross-border cooperation is not yet an extended research line, and there is a significant lack of research in this area. Equally to the social networks analysis both in persons and organizations and parallel to the two main research lines pointed above, there are two streams of research clearly identified. On the one hand the use of social capital and network analysis to study of cross-border policies and administrative units with cross-national legitimacy and governance. This research line is at macro-level of social capital and network in cross-border cooperation. On the other hand, the use of social capital

proxy assets (trust, identity, membership, etc) and networks analysis to the study of cross-border flows of interaction among people living in border regions. There has been abundant literature in a new approach that sought to emphasize the bottom-up perspective of cross-border cooperation making process. This was a human approach from which social capital and network analysis seem an extension.

The application of social capital and network perspective to cross-border cooperation is a research line parallel to the traditional institutional approach to the cross-border cooperation. However, the introduction of social capital and social network analysis seek first for new insights and shadowed dynamics of cross-border policies that other perspectives have underestimated, like the role of language, informal relations, or other national-oriented factors in the development of cross-border policies. Second, it considers the cross-border cooperation as a network process of governance. In this line, the cross-border cooperation emerges as one of the European arms of governance adapted to the flexibility and de-territorialization imposed by the European Cohesion and ever closer union criterias. Accordingly, under social capital and network frame, cross-border projects, initiatives and cross-border institutions might be the target of analysis of policy efficiency, policy impact in cross-border areas, and policy governance. The preliminary stages of applying social capital and network perspectives seems to follow a metaphorical notion, like it happens with the use of networks in public and policy sector in general. Isett et al. (2011) point that much of the European and Asian networks literature uses networks metaphorically. Indeed, much of the institutional-administrative approach to cross-border cooperation use indiscriminately the idea of network without acknowledging network as a metaphor and network as an analytical mean.

Some few studies apply specific conceptual and methodological models of social capital, constructed ad hoc, in cross-border regions and cross-border policies (Grix, 2001; Pérez & Monago (2011). More likely to traditional studies of social capital in communities, these types of studies take their roots in the general frame of social capital both in its cognitive and structural dimension. They combine the relation between certain aspects of social capital like trust and membership, with better policy or economic outcomes. These studies try to reflect the relation or benefits of social capital indicators with better knowledge of the cross-border dynamics or certain cross-border

policy outcomes. Although network analysis is not applied or proposed, indicators like the formal-institutional membership, are used, together with cognitive indicators like trust, identity, language, and associated to personal perception and opinions on cross-border policies, institutional relations, or institutional performance.

For instance, Grix and Knowles (2002) apply the concept of social capital at studying the role of Euroregion in the cross-border region of Pro Europa Viadrina. In this case, the study of actors' perceptions on a specific institution offers a clue for the immersion of social capital conceptual model into cross-border policy. Pérez and Monago (2011) applied a model of social capital *ad hoc* for the analysis of policy programme in rural areas (Garrido & Moyano, 2002) that resembles to Spellerberg's model of social capital applied in communities (2001). The authors apply the analysis of social capital to the border region of Extremadura with Portugal and specific border policies applied in the area. They use four dimensions of social capital that goes from the individual to the institutional level of analysis. First, the intra-community-integration based in indicators of interpersonal trust and level of individual's formal participation; second, the inter-community-connection that is based in the self-identification and the level of institutional trust. Third, the synergy-community cooperation refers to the level of institutional cooperation and institutional communication. And four, the organizational efficiency, that centers in the analysis of personal evaluation of different institutions' efficiency.

Recent works using social network analysis shed more light on the constructions of cross-border regions, whether in a formal context of institutions and cross-border policies or in an informal context of people living in the border regions. Besides the initial step of Soeters (1993) proposing network theory for the study of Euroregion networks in the Maas-Rhine Euroregion, this approach has received attention in some recent case studies that apply the social network analysis in the study of cross-border cooperation policies using the policy network approach (Brunet-Jailly, 2006; Walther & Reitel, 2012). These case studies permit a new perspective where cross-border policies, such as national policies are dynamic processes of multiple actors interacting. What makes possible to represent the network structure of specific policies or programmes, to study the density of the relations between the institutions involved, to identify key actors, flows of information and the capacity of influence among actors, or conducting

an analysis of certain variables in the conformation of cross-border networks in the policy making of cross-border regions.

Understanding network as a form of governance (Knoke, 2011; Provan & Lemaire, 2012), the European Union policy making urges for models forms of governance based on networks as the best mean to deal with EU challenges and lack of democratic deficit (Börzel & Heard-Lauréote, 2009). In the same way, the European cross-border cooperation policy has emerged as a system of governance, that may be the best way of governance in an era of globalization of flexible capitalism and governance that do goes beyond the political and administrative boundaries. In the setting of cross-border cooperation, local and regional actors encounter in multilevel types of governance that overcomes their limits. They form supra-local and supra-regional relations both within national territories and across national borders. For instance, following Fürst and co-authors (2001), regional actors see themselves pressured by the flexibility orientation in the policy making that will be of great importance for the future development of regions that they assume it depends on the social capital of regional actors.

Based on these assumptions, cross-border cooperation policy might be defined in terms of networks which are not organizational networks nor public, but a multiple agency of public institutions, private organizations and civil society actors. We might define cross-border cooperation as the set of multi-sectoral, multi-governance and multi-agency networks more or less coordinated (meaning the degree of networks integrations from more dense to sparse network structure) among public institutions and non-public organizations that, through the development of projects drawn from a transnational collective decision and making process, aims a two-fold goal: to contribute to the socio-economic cohesion between border territories within the European Union; and to contribute to the European Union legitimacy and democratic nature. Like public networks, the European cross-border cooperation networks are largely public funded and exogenously promoted. The membership or inclusion of any organization (public or private) in the network is much formalized through institutional arrangements like bilateral or multi lateral formal agreements. They are the common divisor across the European Union and a regulative body of the institutional relationships. However, these formal and institutional networks might be funded in previous and parallel informal interorganizational and institutional relations.

In the dilemma of the disparity between institutional and social-informal dimensions of cross-border cooperation and cross-border relations, the frame of social capital seems a very promising frame for the making process of cross-border regions, and for the implementation, longevity and success of cross-border cooperation projects. Social capital seems to entail the complexity of cross-border cooperation flows and cross-border relations. We find sporadic but meaningful claims for the use of social capital and networks perspective to the study cross-border cooperation and cross-border regions making. For Da Silva and Palula (2012) people, institutions and organizations involved in cross-border flows and networks of cooperation are always associated to social capital which is the frame that allows to apprehend both the formal-centralized and the informal –spontaneous cooperation. And some initial steps try to offer a coherent theoretical and empirical approach to understand the complexity of cross-border relations and cooperation (Grix, 2001; Grix, & Houžvička, 2002).

The immersion of social networks and social capital into the flow of interpersonal interactions across borders has some historical roots and it is not unknown. However, there is also a significant lack of research in the study of cross-border and interpersonal networks among people in border areas. The nature of these relationships, how these border networks are interconnected to daily life, or how they might be related to the cognitive aspects like identity and perceptions still comprise a broad field of research to cover. Lundén's work (1973) on interaction across the boundaries of Norway and Sweden could be considered as an initial step. This research collected data from contacts and activities outside of inhabitants' own localities using week diaries, a classical method of network research, though soon replaced by other feasible techniques like the name generators (Lin & Erikson, 2010). In later research, Lundén (2004) has analysed the influence of different factors on people's boundary behaviour, including the patterns of border-crossing among dwellers from different border cities and border regions. In this respect, the study concludes that the territorial limitation of people's networks tend to be rather limited including those living in border areas. The homophilic relations tend to be a dominant pattern in border relations, despite the multiple contacts that across the border take place.

Recently, different works have begun to apply the social network analysis both theoretically and methodologically to cross-border relations. The purpose is to

determine whether to study cross-border relations in communities as mechanisms for social integration (Alapuru & Lonkila, 2004, Hyvönen, 2008; Gualda, Fragoso & Lucio, 2013) or to reflect the patterns of border relations in specific cross-border regions and the role of aspects, such as language, in the conformation of cross-border relations (Lundén, 1973; Gualda, 2008). The main conclusions of these studies highlight the strong endogamy of relations in cross-border regions for which the proximity within national territory determine the general patterns of inter-personal relations. By last, a recent study has proposed the need for social capital formation in the Polish-German border for promoting good relations among the citizens of the border (Mirwaldt, 2012).

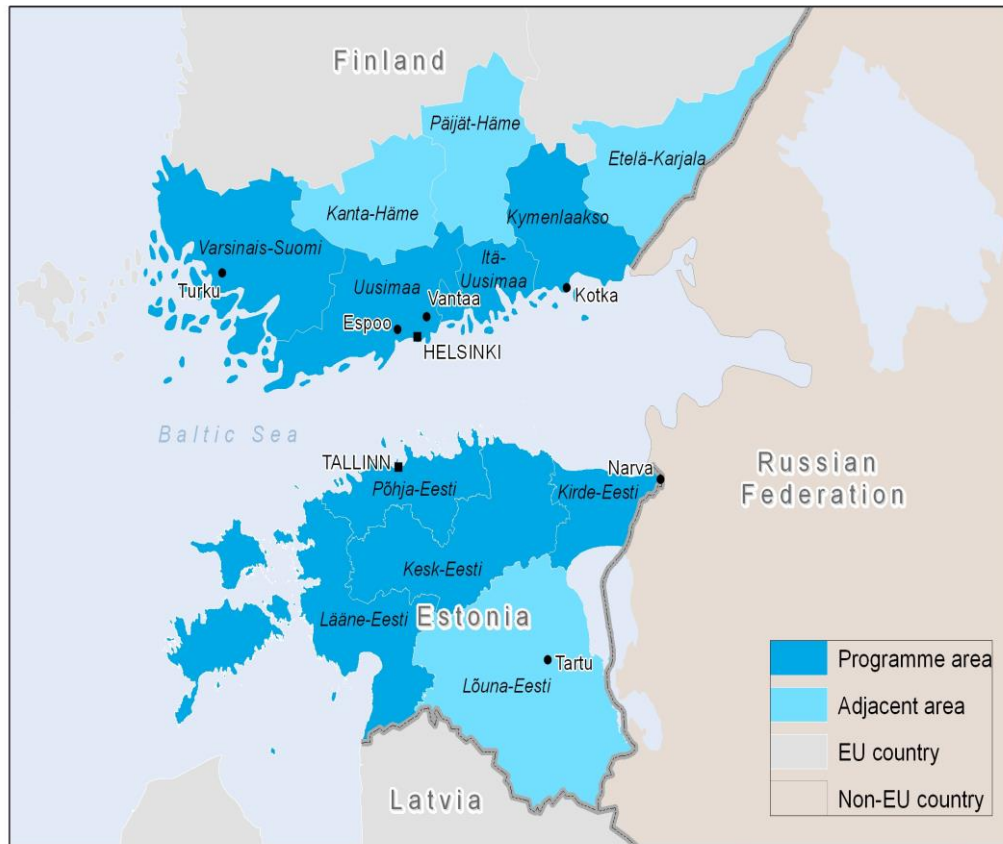
Cross-border regions are currently experiencing a transitional period towards more interaction and integration of their socio-economic structures. In this transitional process the analysis of social networks and other social capital assets like trust and identity of people become in a relevant issue. People's social network structure might experience significant changes in the type and nature of relationships. Following the association between the networks and integration (Lozares et al. 2011) the changes in the relational behaviour of people close to the border might be indicators of the expected progressive social interaction across the border and hence, a rapprochement of communities. In this work, we consider that those informal and personal relationships of people from border areas might imply significant and valuable relational bridges, not only for the informal social integration across the border, but also for a more formal and institutional cooperation. As both informal and formal relations seem to be influenced reciprocally.

CHAPTER 3: CONTEXTUALIZATION AND COMPARATIVE APPROACH OVER TWO CROSS-BORDER REGIONS: ALENTEJO-ALGARVE-ANDALUCÍA AND SOUTHERN FINLAND-ESTONIA

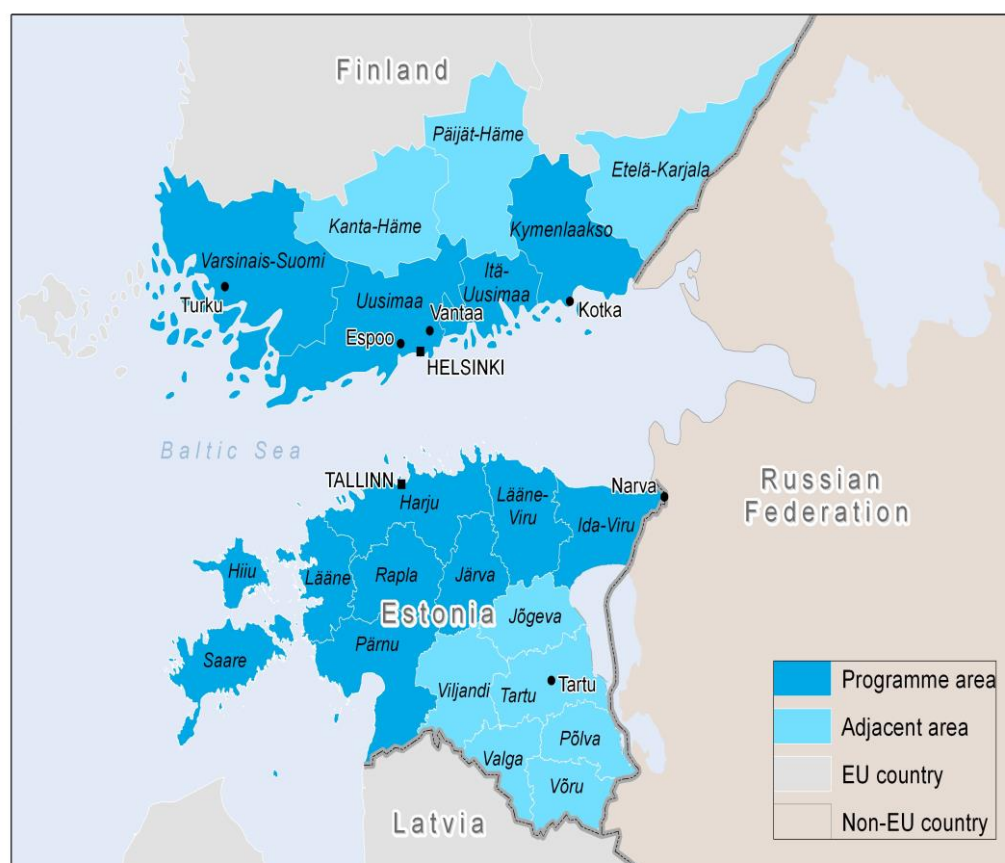
3.1. Two different cross-border regions with common nexus.

In this work the study of cross-border cooperation through the analysis of networks as the main asset of social capital has been carried out in two different cross-border regions within the European Union. Like all the cross-border regions in Europe, the southern border regions between Spain and Portugal and Southern Finland and Estonia have maintained significant historical relations which have been a good background for the implementation of cross-border cooperation programmes of European Regional Policy. They constitute sub-areas of cross-border cooperation within respective INTERREG A programmes (see Map 1 and 3). The border region integrated by Alentejo-Algarve and Andalucía (hence AAA) is one of the five areas of cooperation of the POCTEP (CBC Programme Spain-Portugal 2007-2013). This operative programme has been preceded by subsequent INTERREG Programmes A I, II, and III. These programmes represent the greatest territorial cross-border cooperation between two old European member states and the progressive approximation of historically separated and marginal regions towards a more cohesive and developed cross-border region. The cross-border area of Southern Finland–Estonia (hence SFE) forms one of the two sub-programmes of Central Baltic INTERREG IV Programme 2007-2013. This multi-annual programme has been preceded by the cross-border cooperation with INTERREG III A for the period 2000-2006. This program focused in the special character of the cross-border cooperation between a highly developed EU member state and a candidate member, aiming a more balanced regional development in the cross-border region (INTERREG III A Southern Finland-Estonia 2000-2006, 2008).

Map 1: Southern Finland-Estonia cross-border region by Nuts classification



Map 2: Southern Finland-Estonia cross-border region



Map 3: Alentejo-Algarve-Andalucía cross-border region by Nuts classification



The Table 8 shows the NUTS II and NUTS III classification of 2006 that form part of the cross-border regions, distinguishing the eligible areas (in bold), from the adjacent areas (with *), from the rest of areas. It is important to underline that at the time of analysis of some national statistical data from Finland, Estonia, Spain and Portugal, a comparative analysis encountered with the difficulty of equivalence of data, therefore Eurostat data available at the level of NUT II and NUT III and other international data have been used in the description of both cross-border regions. In the case of Finland and Estonia, the national statistical data is delivered by the administrative organization of each country. In Estonia statistical information is disaggregated in 15 counties (see Map 2), while in Finland the information is delivered at the region level and in a more disaggregated local level of areas. In the case of Estonia these classifications do not correspond with the European classification of NUTS III as these counties constitute a smaller level of administrative delimitation (see Map 1 and Map 2). In the case of Portugal and Spain national statistical information is delivered by provinces and regions equivalent to the NUTS III classification (see Map 3), being possible to get more

disaggregated data at the level of municipalities, and “fregresias”. Although the entire Andalucía region is assumed as part of the cross-border region in the case of the Euroregion Alentejo, Algarve, Andalucía, the most distant Andalusian provinces are not considered within the Programmes of INTERREG III and POCTEP. Thus, the border territory includes Huelva, and Sevilla, Córdoba and Cádiz as adjacent areas. The Alentejo region shares border with the Extremadura and Andalucía regions, but in the Table 8 it is included only the Alentejo NUTS III that share border with the Andalucía region.

Table 8: NUTS II, NUTS III and National Statistical territorial units of analysis

Border Regions	Nuts II	Nuts III Eligible and Adjacent	Other NUTS III belonging to the NUTS II
Alentejo, Algarve, Andalucía	PT18 Alentejo	PT181 Alentejo Litoral * PT184 Baixo Alentejo	PT182 Alto Alentejo PT183 Alentejo Central PT185 Lezíria do Tejo
	ES61 Andalucía	ES612 Cádiz * ES613 Córdoba * ES615 Huelva ES618 Sevilla *	ES611 Almería ES614 Granada ES616 Jaén ES617 Málaga
	PT15 Algarve	PT150 Algarve	
Southern Finland – Estonia	FI18 Etelä-Suomi	FI181 Uusimaa FI182 Itä-Uusimaa FI183 Varsinais-Suomi FI184 Kanta-Häme * FI185 Päijät-Häme * FI186 Kymenlaakso FI187 Etelä-Karjala *	
	EE00 Eesti	EE001 Põhja-Eesti EE004 Lääne-Eesti EE006 Kesk-Eesti EE007 Kirde-Eesti EE008 Lõuna-Eesti *	

Source: Author's compilation based on Eurostat (2011).

Note: (*) Adjacent Nuts III.

3.1.1. The water as natural border.

Both cross-border regions have the water (the Baltic sea and the river Guadiana) as the natural border that determines the cross-border cooperation and the regional development of the areas. The Southern Finland-Estonia cross-border area, like the entire Baltic Sea region, has the particularity of the Baltic sea as the maritime border between a territorial area that comprises a total of 83225 km. Despite this water impediment of 80 km, since Estonia regained independence in 1992, the cooperation

with Finland overweighs the cooperation of Estonia with other neighbours like Russia and Latvia with whom Estonia shares territorial border (Rytilä, 1999). In the cross-border cooperation between both countries the water management and flood control is one of the most important priorities in the regional cooperation of the Central Baltic Programme. The Baltic sea is shallow, a pool of brackish water, and highly eutrophied, especially in the Gulf of Finland. The sea change needs over 30 years to change its waters therefore, the polluting stays in the sea for a longer time compared to other seas (Central Baltic INTERREG IV A Programme 2007-2013, 2011: 31). Furthermore, the human burden, agriculture and industry is very intensive what makes the cross border cooperation of crucial necessity not only between Finland and Estonia, with two approved projects dealing with the waste water and water environment, Minwa and Rings in water (Central Baltic INTERREG IV A Programme 2007-2013, 2011), but also with the rest of countries with shores in the Baltic Sea.

The border between the Andalucía region and the Portuguese regions of Algarve and Alentejo occupies an area of 64131 km. Like in other parts of Spanish and Portuguese territories is articulated along riverine lines (Miño, Duero, Tajo/Erjas and Guadiana). At the south of both countries the portuguese-andalusian frontier has 190 kms of which 115 kms is created naturally by the rivers Guadiana (51 km) and Chanza (64 km) that create a natural border running in parallel with the border between the Andalucía region and the Portuguese side. These riverside lines have implied historically the nexus of union that later political demarcations have eroded (Márquez, 2011). The maritime frontier in the gulf of Cádiz is also relevant in the littoral border area between Algarve and Andalucía. Nevertheless, one of the most important aspects of the cooperation between public administrations is the joint water management of Guadiana and its inclusion as an economic and environmental resource for the future of the cross-border region. The current POCTEP accounts with six projects out of 29 related with the Guadiana river, Andalbagua, Guaditer, Dimeagua, Ecoaqua Guadiana, Guadiana more accesible, and Bonaqua (POCTEP 2007-2013, 2011).

Table 9: Territory included in cross-border cooperation Interreg programmes

REGION SFE	AREA KM ²	REGION AAA	AREA KM ²
Southern Finland Interreg III Programme		POCTEP	
Southern Finland	37997	Alentejo	13812.4
Varsinais-Suomi	10855	Baixo Alentejo	8503
Uusimaa	6767	Alentejo Litoral (a)	5309.4
Itä-Uusimaa	2823	Algarve	4989
Kymenlaakso	5588	Andalucía	87596.97
Päijät-Häme (a)	6257		
Kanta-Häme (a)	5707		
Etelä-Karjala (a)	-	Cádiz (a)	7435
Estonia	45228	Córdoba (a)	13771
Põhja-Eesti	4332	Huelva	10128
Kesk-Eesti	9067	Granada b	12646
Kirde-Eesti	3364	Sevilla (a)	14036
Lääne-Eesti	11135	Jaén)b)	13496
Lõuna-Eesti	15799	Málaga (b)	7308
Total Territory	83225	Almería (b)	8774
		Total Territory	64171.4

Source: Author's compilation based on Interregs Programme Documents and National Statistical databases

- (a) Adjacent NUTS III within the Border region in the Central Baltic Interreg IV A Programme and in the POCTEP (Operative Programme for Cross-Border Cooperation between Spain and Portugal).
- (b) Other NUTS III which are part of the region but not included in the POCTEP.

3.1.2. Historical stability.

Common to both cross-border regions is the historical stability of the borders between neighbours. The border between Spain and Portugal is not only the longest with 1234 km, but also the oldest border within European Union. The riverside lines conformed a natural continuation in the south west area of Iberian peninsula during the Phoenician, Greek, Roman, Arabian and Christian domains. During the Arabian period this area was administratively divided into the Al-Garb and Al-Andalus Taifas kingdoms. The Portuguese-Spanish political and territorial border started to be demarcated progressively since 1128, though with continuous conflictive arrangements from north to south that would last up to the XV century. But the current border is delineated in the XIII century (Treaties of Badajoz, 1267 and Treaty of Alcañices, 1297) with the creation of both states. Despite the historical demarcation, the borders have implied sources of discontent that clearly have influenced in the border relations between Portugal and Spain until the XX century. The last border dispute was between Encinasola (province of Huelva) and Barrancos (Baixo Alentejo) solved in 1926 (Marquez, 2011). The border has remained the same up to now and both countries have

been back to each other. With the integration of Spain and Portugal in the European Union in 1986 it started a rapprochement in different spheres. The European Territorial Cohesion Policy has implied a boost in the promotion of institutional relations at different administrative levels between both countries.

The border between Estonia and Finland has remained the same along history. If we consider only the both countries, the border and their border relations have been characterized historically by the mutual respect and intense collaborations. However both countries have encountered the ups and downs of being small nations between bigger neighbours empires and states of Germany and Russia. Thus, considering the period in which both nations have been independent at the same time, the historical relations have characterised by the mutual political and socio economic rapprochement. The border between both countries was diluted when they were simultaneously parts of bigger empires, under the Sweden rule from 1629 to 1710 and under the Russian empire from 1809 to 1917 (Nurmi & Üksvärav, 1994). During their independence as first republics both countries had close and peaceful border relation across the Gulf of Finland. The freezing of any kind of official and non official cooperation started after the World War II, where their historical and brotherhood union was hampered to a greater extent in their history. Finland and Estonia could have had the same fate according to Molotov-Ribbentrop Pact, by which Finland, Estonia and Latvia were assigned to the Soviet sphere (Raun, 1991). Estonia became a republic of Soviet Union but Finland after hard wars confrontations got to maintain its independence and a friendship relation with the Soviet Union. During the Soviet period the border relations between the Eesti Nõukogude Sotsialistlik Vabariik, ENSV (Estonian Soviet Socialist Republic, ESSR) and Finland were stagnated, and both countries became object of strong vigilance. After the collapse of Soviet Union, the border remained the same as well as both countries reconstructed old links and enhanced intensive and good relations in all fields. This pattern of good cooperation between Estonia and Finland stands out from the cross-border relation between Estonia and Russia which since Estonia independence in 1992 was characterised as on the worst in Europe and was subject of difficult negotiations between states (Rytilä, 1999).

3.1.3. Language affinity.

Many of the European Union cross-border regions have in common the language affinity between neighbours. Language competence is one of the most important factors to set up cross-border cooperation as it is the main flow through which interaction takes place. In cross-border regions the similarity between neighbours' languages obeys to the common historical and ethnic roots that along time have taken separated but parallel evolutions. This is the case of both cross-border regions here compared. The cross-border cooperation across these countries is both grounded in the past common linguistic unity of their speakers.

The Portuguese and Spanish languages.

The Portuguese and Spanish languages form part of the Latin sub-group of Indo-European languages together with Catalan, French, Italian, and Rumanian. More specifically the similarity between Portuguese and Spanish language is so high that neighbours from the closest border areas can practically understand each other. Professionals related to cross-border cooperation highlighted the high similarity between both languages as one the strengths for cross-border cooperation in the border area of Alentejo, Algarve and Andalucía (Gualda et al. 2008: 245). Nevertheless, there is an historical asymmetric unilateral understanding on neighbour's language or better Portuguese understanding of Spanish language than vice versa. This is supported by the traditional greater social rapprochement of Portuguese people towards its bigger Spanish neighbour than vice versa. The Spanish-Portuguese barometer of opinion has published results in annual reports in last years covering different opinions at both sides of the border. According to this barometer results like those of the Table 10 indicate that the Spanish people have a remarkable negative attitude and acceptance of Portuguese language as a compulsory language in the primary and secondary school levels. The majority of respondents (80.8% in 2011) are more prone to have Portuguese language as optional subject. However, the percentage of people favourable to Portuguese language as obligatory subject has increased slightly. Contrary to the approximately 75% of Spanish rejection, the Portuguese people show a better opinion. Around half of Portuguese respondents are favourable to include Spanish as compulsory subject in primary and secondary schools. The percentage of Portuguese favourable to include it

as optional is also higher than the Spanish percentages. This corresponds with the increasing demand in Portugal of Spanish language teachers in recent years both in public and private institutions. At the same time, the linguistic competence of Portuguese people with Spanish language is superior to the Spanish people capacity to understand Portuguese. Portuguese people understand better Spanish and manage successfully when visiting Spain. Their linguistic competences facilitate the communication skills of Spanish visitors, and a mixed vernacular named “portuñol” or “portugñol” has emerged among those crossing more intensively the border.) It is pseudo-language that many people from Spanish and Portuguese side use in order to understand each other and which basically consist of speaking one’s own language adapting many words to the neighbour’s language.

Table 10: Spanish and Portuguese opinion on language inclusion in compulsory education

		Favorable			Against			N/A		
		2009	2010	2011	2009	2010	2011	2009	2010	2011
Spanish	Obligatory	15.9	16.3	19.7	76.2	79.3	76.4	7.7	4.5	3.9
	Optional	67.7	79.7	80.8	23.8	16.9	16.5	8.4	3.4	2.7
Portuguese	Obligatory	50.0	44.6	51.8	43.8	52.6	45.4	6.2	2.8	3.2
	Optional	85.1	86.7	89.9	10.7	10.8	7.5	4.2	2.5	2.6

Source: Author’s compilation based on Barómetro de Opinión Hispano-Luso (2009, 2010, 2011).

This tendency is usually explained by the greater social proximity that Portuguese population feel towards Spain, and by the simple fact that Portuguese TV is broadcasted without subtitles. In general, Portuguese people have better knowledge of foreign languages due to the influence of the original versions forecasted in Portuguese TV. Additionally, those living in the proximal areas close to the border can have access to Spanish channels what improve their learning conditions. There is not national data about the knowledge of language between respective neighbours. At regional level the study of the social reality between Alentejo, Algarve and Andalucía supports this tendency. The knowledge of Portuguese language by Andalusian respondents is worst, though their degree of understanding is better at the oral and writing comprehension than at writing or speaking. The Portuguese population shows better knowledge of neighbour’s language, although there is a significant difference between those from Algarve and Alentejo. While 75% of the Algarvian respondents in this study declare to

understand well Spanish language, only 25% of the Alentejo respondents do (Gualda, et al., 2008).

Language teaching in Portugal and Spain has started also asymmetrically. In Portugal there is an increasing interest at offering Spanish courses in secondary and university levels, and the demand of Spanish teachers represent a current professional opportunity for Hispanic philologists. On the Spanish side, the implantation of Portuguese courses takes place in the closest regions to Portugal. Different intensive courses are offered at Universities for Erasmus mobility and in different public administrations for those professionals dealing with cross-border cooperation. In the Andalucía region the Portuguese language is offered in the official public schools of languages only in Huelva and Málaga. The number of students of Portuguese (both attending and virtual students) has increased progressively in recent years from 152 in 2006/2007 to 174 in 2010/2001. Still English or/and French are the dominant languages in these schools. In 2010/2011 the number of people attending courses of Portuguese in Huelva is 54 and in Malaga 84. The total of 138 represents only 0.3% of students compared to the 63.8 % of students of English (Junta de Andalucía, 2010/2011). And the teaching of Portuguese is not yet integrated in primary and secondary schools in the region.

The Finnish and Estonian languages:

The degree of similarity between the Finnish and the Estonian language might be lower than between Portuguese and Spanish, but they are their closest intelligible kins. Finnish and Estonian languages are respectively their closest linguistic and ethnic neighbours in the European Union. They belong to the ethnic and linguistic Finno-Ugric group which is not a member of the Indo-European language family tree. From the Finno-Ugric people only Hungarians, Finnish and Estonians have their own nation-state and belong to the European Union. Hungarians are the biggest subgroup of the Ugric people, but the similarity between Finish and Estonians is stronger as they are subgroups of the Balto-Finnic people together with the Karelians and other ethnic groups living in Russia. Their linguistic union is supported by the historical references indicating that it is most like that Estonians and Finns moved together to where they live from more than 5000 years. However, due to the greater external domination over Estonian people, Estonian language have more foreign loan-words being more eclectic than Finnish

language which uses longer words and tend to sound more archaic and closer to the Balto-Finnic language source (Nurmi & Üksväre, 1994: 135).

In this cross-border region occurs the same asymmetrical linguistic relation and Estonians tend to understand better the Finnish language than Finns understand the Estonian language. During the Soviet Union the Estonians living in the north of the country, the closest area to Finland, had the possibility to watch the Finnish TV. This was a very influential factor not only for their better knowledge of language but also as the window towards their Finnish neighbours and the western world, where they felt they belonged. Finland was the closest kin and the closest non soviet country, this double value made Finnish matters at the highest level of relevance for Estonians who traditionally have been more skilful and interested at understanding the Finnish language. In 1995 around the 30% of Estonians understood Finnish Language, almost the same percentage of those who understood English. In the first years of Estonian second independence, the number of publications of Finnish literature dominated over other Nordic and German literature, though nowadays the domination of Finnish translations has been replaced by other languages like English (Vihalemm, 1995). Finnish and Estonian languages can be studied in their respective neighbours' educative system thanks to the coordination of different institutions and organizations. In both countries there are primary schools offering courses mainly for the immigrant population. The Estonian-Language Education Society has promoted in Finland Estonian-language kindergardens, and the Estonian language can be studied in different Finnish universities (Helsinki, Turku, Tampere, Oulu, and the University of Eastern Finland in Joensuu). In secondary schools and universities both languages are extensively offered, although more significantly in Estonia. Finnish is taught as the third or extra language in Estonia in approximately 30 schools and is also on the curriculum in about 30 vocational schools, particularly those dealing with the service industry. The Finnish language can be studied as a major at the main Estonian universities and short courses in Finnish are offered by language centers in a number of high schools (Estonian Embassy in Helsinki, 2012). Due to the relevant number of Finnish students who come to Estonia to study certain degrees difficultly accessible in Finland, like medicine, Estonian universities offer intensive courses of Estonian language. In Finland there have been over 20 Finnish translations of Estonian books what implies a relevant increase in 2011. This peak seems to be provoked by the impact of the multiple awarded

writer Sofie Oksanen, whose narrative story and topics about Estonia in her internationally awarded novel “Puhastus” (2008) (“Purge” in English versions) have awoken Finnish’s interest on Estonian matters (Finland Embassy in Estonia, 2012).

3.1.4. The Iberism and the Balto-Finnic vision.

Their linguistic relationship is originated in the ethnic common roots and is the gen of their cultural and social similarities. Both cross-border regions are witnesses of a common legacy with historical, political and socio-cultural reasons that talk about common civilization or ethnic unity. In these reasons ferment the best arguments to justify the cross-border cooperation and the process of regionalization that goes along with. The genetic similarities, the related mythology or religiosity, the similar cultural and social traditions, the affinity in social values, the political elite constructions of communities, the people’s perception of neighbours and their behaviour of proximity towards the border; they are all a great amalgam of reasons that drink from the Iberism and the Balto-Finnic and Nordic ideas of civilizations or union. Both Iberism and Balto-Finnic have made a good basis for the emergence of a border commitment between neighbours that enhance any initiative of cross-border cooperation. Iberism and Balto-Finnic, as anthropological and political ideas, as official discourses with timeless hopes or as spontaneous narratives from people, create a feeling of brotherhood and social and emotional proximity between those who appreciate reciprocally and consider each other as relevant for one’s own sake.

Like in the POCTEP 2007-2013 programme is underlined, the history and political demarcation has divided along time the population and territories genetically identical, originating different social and cultural identities (2011:.23). However, different reasons, nuances, social practices and symbols narrate an Iberism dimension that has been historically shadowed by national interests and sovereignty. The Iberism has encountered in the frame of European Regional Policy its best shelter. Authors like Cabero (2002) tries to reinvigorate and to bring forth all the different forms in which Iberism takes shape (culture, economy, politics, religion, population, language, etc). In this respect, the “History of Iberian Civilization” (Historia de la Civilización Ibérica) of Oliveira Martins (2009) represents also the perfect historical recapitulation and an ideal conception of Iberian cultures and civilizations. There is an Iberian way of thinking and

acting in the world, an Iberian vision or cosmovision that Oliveira exemplifies with the Spanish and Portuguese discoveries overseas and colonial entrepreneurship. This intellectual Iberian exercise was very lauded by others Spanish and Portuguese intellectuals from late XIX and early XX centuries like Menéndez Pelayo, Miguel de Unamuno or Juan Valera and has extended in the cultural activity where different prose and poems refer to an Iberia soul (Cabero, 2002: 30). The XX century started similarly in both countries; they lost their international position as empires and ended reduced to different dictatorships that have been characterized by a formal relationship of peace and neutrality, and of isolation and mutual suspicion in reality between both countries. During the first half of XX century people at each side of the border maintained an illegal and smuggling relationship that is still alive in the spontaneous people rhetoric about Spanish and Portuguese historical relations (see in Marquez, 2011). But the relaxation of the border, the political transitions and the joint integration to the European Union in 1986 initiated a new period of rapprochement with the auspice of European Union Cohesion Policy. In this sense, the former prime minister of Andalucía autonomous community sustained that the European Union has offered to the border regions the instruments for their rapprochement and development (Griñán, 2010: 2). The cross-border cooperation encounters again with a joint process of construction on the basis of plural cultural practices that denote the Iberism continuation across the border despite the sovereignty of each nation state. The socio-economic articulation and demographic similarities in the frontier territories of both countries shows also an Iberian verge susceptible to be treated as an common geographical and social space. More specifically in the border area of Alentejo, Algarve and Andalucía, the Iberism is rescued as a solid socio-economic and cultural body of data that characterizes a border area with significant similarities in the horizontal geography of the richer littoral and coastal areas between Algarve and south of Huelva province, and between the Baixo Alentejo and interior and north of Huelva, less developed and demographically depressed.

Recently, the late socio-economic changes in a context of global crisis are placing both countries in a weak context grounded with similar social and economic problems. The shame of the long term frustrating consequences of international crisis and the lack of opportunities for the future expectations of the younger generations, named popularly as “geração rasca” in Portugal and the “generación perdida” in Spain, reminds that both

countries are also similar in their forced readjustment within the European Union. In this context of crisis is reasonable the interesting data of the last Spanish-Portuguese Barometer (2011) about the Iberian union. The Table 11 reflects how the idea of a political integration between both countries has got support in the late years. A Spanish and Portuguese Iberian Alliance or confederation option as a political axis within European Union or for Latin American relations has gained more followers every year, though more in Portugal than in Spain. It is notable the stronger support that the idea encounters in Portugal than in Spain, what brings forth that the Iberism is not symmetrically expressed at both sides of the border. At this respect, there is a long standing stronger interest in Portuguese people to relate to Spain than vice versa which is perceived in different interrelated aspects like linguistic competences, social relations with neighbours, knowledge about the neighbour reality, news, etc. They all reflect the Portuguese stronger rapprochement toward the Spanish neighbours and an asymmetrical Iberism (see Barómetro de Opinión Hispano-Luso, 2009, 2010, 2011). For instance, the Table 12 shows the cultural and social proximity of Portuguese and Spanish people when they visit the neighbour country. This proximity is stronger in Portuguese people, while almost half of Algarve people find themselves at home when visiting Spain, around one third of Spanish people feels at home when visiting Portugal. Alentejo population also show less proximity than the Algarve Portuguese when visiting Spain.

Table 11: Percentage of people that support the idea of an Iberian Federation

Support (agreed and very agreed)	Portuguese	Spanish
2009	39.9%	30.3%
2010	45.6 %	31 %
2011	46.1 %	39.8 %

Source: Author's compilation based on Barómetro de Opinión Hispano-Luso (2009, 2010, 2013).

Table 12: Percentage of agreement with 'I feel at home in ...'

	Total	Andalucía	Algarve	Alentejo
Andalucía	58.2	98.1	49.0	24.0
Algarve	63.8	35.8	96.0	61.2
Alentejo	57.2	32.1	51.0	90.0

Source: Gualda et al. (2008).

The cooperation between Southern Finland and Estonia is equally based in rich and varied cultural, anthropological and political ideas that back their cooperation as a

natural process that never should have been stopped. Usually the introduction of official documents of cross-border cooperation make reference to the genetic, cultural, linguistic and geography continuity between the Finnish and Estonian shores of Gulf of Finland that serves to the political and social construction of a brotherhood commitment “There are many bridges uniting the two shores of the Finnish Gulf... and most importantly the people, to many of whom the neighbouring shore is as native as their own home” (Maripuu, 2003: 1). According to some studies, Estonians and Finns share genetic background. Others discuss about a “way of being” characteristic of Finns and Estonians as sharing values of sadness, serenity, merriment and negativism more than happiness (Nurmi & Üksvää, 1994). The historical closeness between these two neighbours is reflected also in the similarities of both national epics and national anthems. The national epic opus, the Finnish Kalevala written by Elias Lönnrot in 1835 and the Estonian Kalevipoeg written by Friedrich R. Kreutzwald in 1861, share significant similarities. They both represent a folkloric recompilation of popular songs starred by the national heroes of Kalevala and Kalevipoeg. Both authors knew each other and even met in Estonia. However, the raw material was much scantier for Kreutzwald than the folkloric sources found by Lönnrot. Hence, the direct impact of Kalevala in Kreutzwald’s work that had to invent himself the myth and folklore (Talvet, 2000). Equally, both countries share the same tone or melody of their respective national hymns. The Finnish “Maamme” (our country), and the Estonian “Minu isamaa, mu õnn ja rõõm” (My Fatherland, My Happiness and Joy) share the same composer Finnish Fredrik Pacius. Regarding also that in both countries there is a well spread and consolidated tradition of choirs, the outsider can figure out how the expression of the respective national symbols go hand by hand (Eesti.ee/Gateway to eEstonia, 2013; Embajada de Finlandia en Madrid, 2013).

For the outsider usually Estonia is placed politically, economically, socially and culturally together with the other two Baltic States Latvia and Lithuania as an homogenous group with the common fate of being between two big empires or nations. However, the links of Estonia are much closer to Finland (see in Maciejewski, 2002). In Estonia the process of sovietisation encountered the plinks of Finnish television easily viewed in the northern part, and the weak clandestine contacts (Raun, 1991). Since independence the most dominant country in Estonian political, social and cultural space has been Finland among other Nordics countries or Baltic States (Vihalemm, 1995;

Vihalemm & Lauristin, 1998) which was considered as the example to follow (Kirch, 1999). A process of Finlandisation took off since Estonia regained its second independence on the basis of the neighbour's affinities and through an intensive traffic and communication flow (Berg, 2002). The Finnish interest toward Estonians, though at the beginning was partly influenced by some disproportionate negative images (women and child prostitutions, mafia, smuggling of goods into Finland, etc.), it adopted the interest compared to the big-small brother relationship (Suhonen, 1995). The greater and consolidated westerners of Finnish market and society enabled Finns to help their younger brother's transition to market economy and democracy. Finland became the best partner to meet criterias and to fulfil the process for Estonia integration in European Union, like is reflected in many political and diplomatic speeches. *"Loomulikult on Soome valmis kaasa aitama Eesti arengule Euroopa Liidu Liikmeks saamisel"* (Naturally Finland is ready to help Estonia for getting the accession to the European Union) (Halonen, 1997: 11). Estonians took Finland as the mirror to look themselves. In their constant search for identity they compared constantly themselves with their ethnic kin, the Finns (Vihalemm, 1995). However, Estonian and Finnish relations are asymmetrical as Finland is more important to Estonia than vice versa. This asymmetrical relation tends to occur when the larger partner is more developed and a western country and the smaller partner is less developed and post-communist (Vihalemm, & Lauristin, 1998). This approaching is well supported also by the Estonian political elite discourse, like this of the former president of Estonia *"For the people living in such welfare states like Finland the necessity to guarantee the quality of life is the most natural thing, meaning contentment of the people... To reach this very kind of quality of life is one of our priorities concerning the internal aspirations of Estonia"* (Rüütel, 2002).

At the beginning of the nineties both countries shared the feeling of facing very important challenges though differently, Estonia moving towards a market economy and privatization and Finland in a critical phase in closer union to European Economic Space and European Community (Miettinen, 1991). Current cooperation emerges in this context where both neighbours see each other as small nations whose sake go better hand by hand. But also Finnish and Estonia cooperation is in a context of building process or regionalization that takes place in the Baltic Sea Region since the three Baltic States got their independence. The idea of a former Baltoscandia where the Baltic

States, Finland and Scandinavia are included (Lehti, 2003) has passed from being a political imagined community (Jurkynas, 2004) to a real political actor in the European Union. In this macro region the two small nations create a geopolitical axis crucial in the Baltic Sea region. Their cooperation aims to build an important metropolitan region between the southern part of Finland, and the northern part of Estonia, where most of the population and economy of both countries lie.

3.2. Demographic and socio-economic introduction of the cross-border areas. Main indicators.

This subsection offers an introductory description of both cross-border areas in demographic and socio-economic terms with current data. Thus, the reader who is not familiarised with some or no one of the two cross-border regions will get a brief picture of the main characteristics. Nevertheless, there are more exhaustive socio-economic analysis which can be considered in order to get a detailed information on these border areas available in different sources like the respective Programme Documents of INTERREG A.

3.2.1. Demographic analysis.

The Table 13 and Table 14 show the evolution of population distribution and density in the NUTS II and NUTS III of each cross-border region. The cross-border area Alentejo-Algarve-Andalucía has more than five million people in 2010. These regions have different demographic value in their countries. While Algarve and Alentejo do not represent together more than 15% of Portuguese population, Andalucía region is one the most populated representing the almost 18% of Spanish population. However, the demographic analysis in the border region is influenced by the numerical account of the adjacent areas of Andalucía. If the population of Sevilla, Córdoba and Cádiz were not considered, the account would be much less as these adjacent NUTS III are among the most populated of Andalucía, compared to Huelva which is practically the smallest province representing only the 6% of Andalucía population. Thus, it is very remarkable the unbalance population density across the border region. Andalucía and Algarve are very populated regions with progressive increasing, though more significant in

Andalucía. By contrast, Alentejo is significantly less populated which is progressively decreasing towards a serious desertization of the region.

The XXI century starts in both countries with a demographic boost due to the immigration rates, especially in Spanish regions. However, the border areas of both countries experience a lose of demographic weight. Furthermore the whole territorial border space shows very different and even divergent demographic dynamics. As it is commented before, there is a double border present also in demographic terms. First, the longitudinal border delineated by the national limits. The second border crosses the longitudinal and it is a horizontal border caused by the different patterns of socio-economic development in the littoral, and in the interior and mountain area. The southern area between Algarve and littoral municipalities of Huelva province are witnessing a constant demographic increase. The economy of this area is based in tourism, intensive agriculture and some industrial nucleus that has favored first an internal migration from the interior areas and an international immigration in the last years. The capitals of Huelva and Faro are the densest populated localities, followed by the cities of Ayamonte (Huelva) and the Vila Real do Santo António (Algarve). On the contrary, the region of Alentejo and interior of Huelva (Andévalo and Sierra areas) formed a homogenous corridor immersed in a progressive regression of their population. The lack of opportunities for economic development has boosted an historical and increasing rural exodus of younger population that has accentuated the population ageing. The municipalities in this area hardly go over two thousand of habitants, being the Portuguese side more disperse with very small localities (Gualda, et al. 2008).

The cross-border region SFE accounts around four million of population. The Table 14 shows the different dynamic of population at both sides of the border. While Finland is experiencing a progressive population increase, Estonia encounters with the decrease of its population that started since 1991 due mainly to the emigration of non-ethnic Estonians and a negative birth rates. By 2030 Estonia is expected to have lower population (Eurostat Regional Year Book Population, 2011). However, if the data is considered at the NUTS III level, a more accurate picture of the population distribution by regions indicates that the north of Estonia has experienced an increase in absolute numbers compared to the rest of NUTS III in the country (Lääne-Eesti, Kesk-Eesti,

Kirde-Eesti and Lõuna-Eesti compared to the eastern part of Estonia (Kirde-Eesti) that has suffered from the migration of Russian-speaking population. Similarly in Finland Uusimaa was one of the regions that grew most in 2011 due to a positive natural growth and a positive net migration (Eurostat Regional Book Population, 2011), in contrast to the eastern regions in the country like Kainuu and Etelä Savo. The Table 13 shows that the most important demographic aspect of this cross-border region is the high concentration of population in the metropolitan, urban and coastal areas at both sides of the border forming an important cross-border region in the whole Baltic Sea Region. The Etelä-Suomi (Southern Finland) region is the densest area of the country and doubles the population density in Estonia. The concentration of the majority of the economic activities in the south of Finland attracts half of the population that is located in this southern region, Etelä-Suomi, in the biggest cities of Helsinki, Espoo, Vantaa and Turku. In Estonia the same attraction occurs with a big part of the population (39.4%) concentrated in the northern part (Pohja Eesti or Harjumaa county). But the 25% (in 2010) of population is in the south of Estonia (Lõuna-Eesti), where is the second largest city and the most important university and niche of research centres.

Table 13: Population Density by NUTS II and NUTS III of the border regions in 2010

NUTS II and NUTS III			
Portugal	115.4	Finland	17.6
Algarve	87.2	Etelä-Suomi	65.6
Alentejo	23.8	Uusimaa	224.3
Alentejo Litoral	17.8	Itä-Uusimaa	35.3
Baixo Alentejo	14.6	Varsinais-Suomi	43.5
Spain	91.8	Kanta-Häme	33.5
Andalucía	95.1	Päijät-Häme	39.3
Cádiz	169.9	Kymenlaakso	35.5
Córdoba	57.6	Etelä-Karjala	23.8
Huelva	51.7	Estonia	30.9
Sevilla	135.1	Põhja-Eesti	121.7
		Lääne-Eesti	14.4
		Kesk-Eesti	15.4
		Kirde-Eesti	50.0
		Lõuna-Eesti	22.2

Source: Author's compilation based on Eurostat Statistics (2012a).

Table 14: Population by Country NUTS II and NUTS III of the border Regions

NUTS II and III	2005	% Pop	2006	% Pop.	2007	% Pop	2008	% Pop	2009	% Pop	2010	% Pop
Portugal	10549.4	100%	10584.3	100%	10608.3	100%	10622.4	100%	10632.5	100%	10637.3	100%
Alentejo	766.8	7.27%	765.1	7.23%	762.6	7.19%	759.0	7.15%	755.2	7.10%	751.2	7.06%
Alentejo Litoral	97.4	12.70%	97.0	12.68%	96.5	12.65%	95.8	12.62%	95.2	12.61%	94.6	12.59%
Baixo Alentejo	130.0	16.95%	129.1	16.87%	128.1	16.80%	126.9	16.72%	125.7	16.64%	124.4	16.56%
Algarve	414.2	3.93%	419.2	3.96%	424.0	4.00%	428.2	4.03%	432.1	4.06%	435.8	4.10%
Spain	43398.1	100.00%	44116.4	100.00%	44878.9	100.00%	45555.7	100.00%	45908.6	100.00%	46071.0	100.00%
Andalucía	7732.2	17.82%	7855.8	17.81%	7981.8	17.79%	8098.3	17.78%	8178.3	17.81%	8231.2	17.87%
Cádiz	1161.3	15.02%	1175.4	14.96%	1190.5	14.92%	1205.0	14.88%	1214.8	14.85%	1221.8	14.84%
Córdoba	774.8	10.02%	777.6	9.90%	781.3	9.79%	784.8	9.69%	786.5	9.62%	787.4	9.57%
Huelva	478.4	6.19%	484.6	6.17%	492.1	6.17%	499.5	6.17%	504.3	6.17%	507.5	6.17%
Sevilla	1781.2	23.04%	1798.0	22.89%	1818.3	22.78%	1839.6	22.72%	1857.4	22.71%	1871.0	22.73%
Border Area	4837.3	% Pop	4880.9	% Pop	4930.8	% Pop	4979.8	% Pop	5016.0	% Pop	5042.5	% Pop
Finland	5246.1	100%	5266.3	100%	5288.7	100%	5313.4	100%	5338.9	100%	5363.4	100%
Etelä-Suomi	2588.3	49.34%	2604.9	49.46%	2623.3	49.60%	2643.3	49.75%	2663.0	49.88%	2681.0	49.99%
Uusimaa	1353.1	52.28%	1366.4	52.45%	1381.3	52.66%	1397.5	52.87%	1413.7	53.09%	1428.6	53.29%
Itä-Uusimaa	92.7	3.58%	93.4	3.59%	94.3	3.59%	95.1	3.60%	95.8	3.60%	96.3	3.59%
Varsinais-Suomi	454.7	17.57%	456.7	17.53%	458.5	17.48%	460.2	17.41%	462.0	17.35%	464.0	17.31%
Kanta-Häme	168.0	6.49%	169.2	6.50%	170.7	6.51%	172.2	6.51%	173.4	6.51%	174.2	6.50%
Päijät-Häme	198.8	7.68%	199.1	7.64%	199.6	7.61%	200.5	7.59%	201.1	7.55%	201.5	7.52%
Kymenlaakso)	185.4	7.16%	184.7	7.09%	183.9	7.01%	183.2	6.93%	182.7	6.86%	182.5	6.81%
Etelä-Karjala	135.7	5.24%	135.4	5.20%	135.0	5.15%	134.6	5.09%	134.2	5.04%	133.9	4,99%
Eesti	1346.1	100%	1343.5	100%	1341.7	100%	1340.7	100%	1340.3	100%	1340.2	100%
Põhja-Eesti	521.2	38.72%	521.7	38.83%	522.7	38.96%	524.1	39.09%	525.7	39.22%	527.5	39.36%
Lääne-Eesti	162.5	12.07%	161.9	12.05%	161.3	12.02%	160.9	12.00%	160.6	11.98%	160.3	11.96%
Kesk-Eesti	141.4	10.50%	140.9	10.49%	140.4	10.46%	140.1	10.45%	139.8	10.43%	139.6	10.42%
Kirde-Eesti	173.3	12.87%	172.3	12.82%	171.2	12.76%	170.2	12.69%	169.2	12.62%	168.1	12.54%
Lõuna-Eesti	347.8	25.84%	346.8	25.81%	345.9	25.78%	345.3	25.76%	344.9	25.73%	344.7	25.72%
Border Area	3934.4		3948.4		3965.0		3984.0		4003.3		4021.2	

Source: Author's compilation based on Eurostat Statistics (2012a).

3.2.2. Brief economic picture of the cross-border regions.

The economic description and data included in this section describe two cross-border regions with practically anything in common in respect to their economic structure. More recently the international crisis originated in 2007 has impacted differently in both cross-border areas and the management of the crisis differs significantly to the extent that a north–south division of European Union is at its higher manifestation. In this way the cross-border region SFE is placed with the national economies of Estonia and Finland among the top of countries with economic growth in the European Union in the last two years consecutively (see Table 15). While Portugal and Spain together with others Mediterranean neighbours are placed at the bottom of economic performance according to the GDP growth in 2011 and 2012. According to the evolution of GDP at current market prices is notable the asymmetry in economic terms within both cross-border regions (see Table 16). The disparity in GDP is bigger between Estonia and Finland where all Finnish NUT III double Estonia GDP. Andalucía has higher GDP than Algarve and Alentejo, though the difference is not so remarkable and even Alentejo Litoral has higher GDP than Andalucía in 2009.

Table 15: Real GDP growth by country

Country	2009	2010	2011	2012
Estonia	-14.3	2.3	4,9	4
Finland	-8.2	3.6	3,7	2,6
Spain	-3.7	-0.1	0,8	1,5
Portugal	-2.5	1.4	-2,2	-1,8

Source: Author's compilation based on Eurostat Statistics (2012b).

Table 16: Gross domestic product (GDP) at current market prices by NUTS 3 regions

AAA	2006	2007	2008	2009	SFE	2006	2007	2008	2009
Portugal	15.2	16	16.2	15.8	Eesti	10	12	12.2	10.3
Algarve	16.9	17.8	17.8	16.8	Põhja-Eesti	15.5	18.4	18.6	16.1
Alentejo	14.3	14.8	14.8	14.3	Lääne-Eesti	6.9	8.4	8.3	6.8
Alentejo Litoral	21.9	22.7	23.2	19.4	Kesk-Eesti	6.1	7.6	7.3	5.9
Alto Alentejo	12.3	12.8	12.8	13	Kirde-Eesti	5.8	7.1	7.7	6.2
Alentejo Central	12.9	13.3	13.6	13.1	Lõuna-Eesti	6.6	8.1	8.4	7
Baixo Alentejo	14.4	15	14.1	14.9	Finland	31.5	34	34.9	32.3
Lezíria do Tejo	13.1	13.7	13.8	13.5	Etelä-Suomi	36.3	39	39.8	37.2
Spain	22.4	23.5	23.9	22.8	Uusimaa	42.9	46.2	47.2	44.6
Andalucía	17.3	18.1	18.4	17.5	Itä-Uusimaa	34.4	35.6	38	36.2
Cádiz	17.8	18.6			Varsinais-Suomi	30.8	33.9	33.9	30.5
Córdoba	15.3	16.3			Kanta-Häme	25.1	26.6	29.2	25.8
Huelva	18.5	19.1			Päijät-Häme	25.1	26.1	28	25.7
Sevilla	17.8	18.8			Kymenlaakso	30.3	30.5	29.7	27
					Etelä-Karjala	28.3	31	30.6	28.6

Source: Author's compilation based on Eurostat Statistics (2012b).

The following tables at the level of NUT II indicate some of the remarkable differences between these two cross-border regions. Considering employment (see Table 17) and unemployment rates (Table 18), Finland and Southern Finland register together with other northern regions of EU, high employment rates. Although Estonian employability is lower, it has improved significantly in last year after a big drop during 2008-2009 due to the crisis. An important indicator of social integration is the female employment that correlates with employment rates. The Table 19 depicts that in Southern Finland the female unemployment is the lowest compared to the other regions. Finland together with other Nordic countries has met the Lisbon target of 60% female employments, while Estonia appears meeting the criteria to a lesser extent. In the same way are some regions of Portugal among them the cases of Algarve and Alentejo. On the contrary, the south region of Spain, Andalucía, has quite low female employment rate intensified with the crisis. (Eurostat Regional Book Labour Market, 2011). According to the data of 2009 the unemployment rates by NUTS III in the whole region of Andalucía unemployment rate is higher than 12%. The regions of Algarve and Alentejo, and northern Estonia (Harjumaa and Laanemaa counties) are between 6-9%, while all NUTS III in Southern Finland are among the NUTS III with lowest rate of unemployment in the European Union, compared to other eastern and northern regions in Finland. The rates of unemployment and the percentage of people at risk of poverty (see Table 20) reaffirms that the cross-border region AAA is lagging in terms of social inclusion especially the region of Andalucía, immersed in a fast increasing tendency with more than 30% of its population at

risk of social exclusion in latest years. The historical characterization of this border area as a marginalized border region marked by a generalized sub-development presents, with this data, even more difficult future prospects. On the contrary, the cross-border region of SFE shows better scores, though it has a remarkable interior disparity from the differences between Southern Finland (Etelä-Suomi) and Estonia. Although the process of catching up has been slowed down with the economic recession, Estonia is among the top countries with better recovery according to a GDP growth that doubles the Finnish one (see Table 15).

Table 17: Employment rates of the age group 15-64 by NUTS 2 regions

NUTS 2	2007	2008	2009	2010	2011
Alentejo	67.8	66.1	65.7	65.9	64.9
Algarve	69.5	69.2	67.9	65.2	64.2
Andalucía	58.1	56.0	51.6	50.3	48.8
Etelä-Suomi	73.3	74.0	71.7	70.7	71.4
Eesti	69.4	69.8	63.5	61.0	65.1

Source: Author's compilation based on Eurostat Statistics (2012c).

Table 18: Unemployment rate by NUTS 2 regions %

NUTS 2	2007	2008	2009	2010	2011
Alentejo	8.4	9.0	10.5	11.4	12
Algarve	6.7	7.0	10.3	13.4	15.6
Andalucía	12.8	17.8	25.4	28.0	30.4
Etelä-Suomi	5.7	5.3	7.0	7.4	6.9
Eesti	4.7	5.5	13.8	16.9	12.5

Source: Author's compilation based on Eurostat Statistics (2012c).

Table 19: Female unemployment rate by NUTS 2 regions %

NUTS 2	2007	2008	2009	2010	2011
Alentejo	20.1	19.6	23.6	28.9	32.2
Algarve	-	-	24.6	28.8	37.0
Andalucía	23.3	31.1	45.0	49.9	54.4
Etelä-Suomi	14.3	14.8	20.0	19.7	17.2
Eesti	10.0	12.0	27.5	32.9	22.3

Source: Author's compilation based on Eurostat Statistics (2012c).

Table 20: People at risk of poverty or social exclusion by NUTS 2 regions

Percentage of total population in NUTS 2	2009	2010	2011
Estonia	23.4	21.7	23.1
Spain	23.4	25.5	27.0
Andalucía	33.1	35.9	38.6
Portugal	24.9	25.3	24.4
Finland	16.9	16.9	17.9

Source: Author's compilation based on Eurostat Statistics (2012d).

Regarding education, Estonian and Finland are described as being two small and similar nations where education is highly valued by their societies (Nurmi & Üksväärv, 1994). The cross-border region Southern Finland-Estonia can be considered as the most high qualified in the European Union. Southern Finland together with other regions of the country is within the highest rate of tertiary education with more than 80% of Students, and Estonia students in tertiary education are between 55-80%. On the contrary, the cross-border region of AAA, shows a much lower performance in this indicator (Eurostat Regional Yearbook Education, 2010). In the all three regions Alentejo, Algarve and Andalucía, the number of students in tertiary education does not reach to the 30%. This lower score is also accompanied by the lowest level of education in the closest areas to the border. As it highlights the study of social reality (Gualda et al, 2008) the border territories have a higher rate of illiteracy compared to the rest of the territories of the border regions. The Table 21 also shows that the participation of adults in education and training is also higher in the cross-border region of SFE. This indicator is related to the need of long learning education in high industrialized economies and more specifically in economies where ITC activities have a relevant weight in the economy structure, and specialized and high skilled professionals are demanded. In the cross-border region of SFE there is also an education concentration of different universities and research centres: 11 universities, 3 Technology Centres and 12 polytechnics in Southern Finland (Etelä-Suomi). In Estonia from the 34 higher educational institutions, 16 are R&D based funded, among them Tallinn University of Technology, Tartu University, and Estonian University of Life Science which productivity and capacity are internationally recognized and intimately related with the entrepreneurial activities in the cross-border region (INTERREG III A Southern Finland-Estonia 2000-2006, 2008; Estonia Ministry of Education and Knowledge, 2012).

Table 21: Participation of adults aged 25-64 in education and training by NUTS 2 regions

YEARS	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
Alentejo		3.3	3.2	3.9	4.0	3.5	4.8	5.6	4.3	10.3
Algarve	-	-	5	4.4	4.9	3.6	4.5	5.1	5	10.8
Andalucía	4.2	4.4	4.4	9.	9.6	9.7	9.5	9.5	10.2	10.0
Etelä-Suomi	18.7	23.4	23.6	23.6	24.2	24.9	24.7	23.7	24.4	24.9
Eesti	5.4	6.7	6.4	5.9	6.5	7.0	9.8	10.5	10.9	12.0

Source: Author's compilation based on Eurostat Statistics (2012e).

The analysis of the cross-border region AAA takes into consideration only the eligible and adjacent NUTS III. This is border area formed by the eligible NUTS III is characterized by the lowest performance in different socioeconomic aspects. The border is affected by lower rate of GDP, compared to the national territories. The weight of the third sector in their economy is inferior to the national share, while the weight of agriculture sector has a relevant weight in the economy of the border territories. Nevertheless, the border area presents also a great disparity between the northern and the southern part of the border as it was commented before. There is a logical continuation in the economic structure of the littoral that stops in the interior areas which are endeavoured into a depressive economic and demographic growth. The similarities between the Alentejo and interior of Huelva compared to the similarities that the Algarve and littoral of Huelva induce sometimes to talk about two borders. First, the national border conformed along the Spanish and Portuguese shores of Guadiana, with different administrative and institutional systems that complicate the economic and entrepreneurial activity across the border. Second, the socio-economic border across an imagined horizontal line that divides the territory between a very dynamic Algarve-Huelva belt from the mountain area of Algarve, Baixo Alentejo and Andévalo lagging in economic development and with negative demographic prospects.

In the region of Algarve the tourism is the main economic activity. This tourism starts to take off later in the coastal area of Huelva province, though the economy of this Spanish Nut III seems stronger than the Algarve touristic monopoly due to the diverse economic activity of the littoral of Huelva with the intensive agriculture of berries and citrus, the chemic industry and the fishing sector. The closest municipalities at the border benefit from a border trade more intensive between the cities of Ayamonte (Huelva) and Vila Real Do Santo António.

The small enterprises with few workers dominate especially in the Portuguese side (Gualda et.al, 2008). On the contrary, the interior parts of the border do not share a similar prognostic, more specifically the area known as Andévalo, and Baixo Alentejo. The most mountain area at the north of Huelva is the exception of the interior part that has flourished from the Iberian pork industry and the rural tourism. In general, the orography has conditioned the area towards a cattle farming and mining industry that during decade of 50' and 60's of XX century sustained the population. Nowadays, the mines, the socio-cultural practices and the life style related to the mining have remained as a source for tourism while there are shy attempts to re-launch it.

Another relevant characteristic of this border area is the low level of knowledge and research entrepreneurial activities in the economic structure. This border area is marginalized from the biggest metropolitan cities where concentrate the ICT enterprises. There has been a recent projection of the interior area for using the territories for investing in removable energies. However, the lack of investment in R&D activities is perceived as one of the most important worrings for the strength of entrepreneurial activity and the creation of employment in the border area immersed in a serious regression with the impact of the economic crisis and the public deficit reduction. The Table 22 represents the percentage that Andalucía, Algarve and Alentejo invest in R&D that comparing to the investment of Southern Finland-Estonia, the cross-border region AAA is far away for restructuring its economy with higher weight of ICT industry.

Table 22: R & D intensity, by NUTS 2 regions

NUTS II	Total R & D expenditure as % of GDP			
	2008	2009	2010	2011
Alentejo	0.91	0.79	0.45	-
Algarve	0.37	0.45	0.45	-
Andalucía	1.03	1.1	1.21	-
Etelä-Suomi	3.64	3.83	-	-
Eesti	1.28	1.43	1.63	2.38

Source: Author's compilation based on Eurostat Statistics (2013).

The cross-border region SFE characterizes by the noticeable asymmetry in living standards (see Table 16). Before the II WW the living standard of the two independent countries was similar. But this homogeneous picture changed dramatically along the period Estonia was under the Soviet Union dominance. In 1993, according to the purchasing power quality, Estonia was 4.3 time less developed than Finland. The prospects by that time estimated a

period of 50 years for Estonia to catch up its fellow ethnic in term of GDP, in the case that Estonia GDP grew up to 5% yearly and Finland only 2% (Hansson, 1996, in Vihalemm, 1997). The tendency nowadays is that Estonia GDP though increasing at a fast rate is considerable lower than the Finnish GDP. However, these differences far from being an obstacle for integration boost the cross-border cooperation. Finnish better structural economic conditions provide a potential source for investment that speed the Estonian economic growth. Other remarkable characteristic is the high concentration of economic activity and resources in the main urban and coastal areas, especially the information, communication and electronic engineering activities. The Southern Finland and Northern Estonia form an important metropolitan area and an international high-tech cluster within the Baltic Sea Region. In total, the four eligible regions of INTERREG IV A in Finland form the “South Finland Regional Alliance” that aims to be a high level business centre in the whole Baltic Sea Region (Central Baltic INTERREG IV A Programme 2007-2013, 2011).

The economy of the border regions relies in the tertiary sector based in telecommunications, pharmaceuticals, finance, services, environmental engineering and transport and logistics; and in the manufacturing and processing industrial sector of natural resources. The ICT and telecommunications occupy an important weight of Finnish economy concentrated in the southern area, as well as in Estonia where half of all enterprises are located in Harjumaacounty (Estonia Statistical Year Book, 2011). In Finland enterprises like the giant Nokia and other small-medium enterprise clusters are the main industry of the country. In Estonia the electronic industry has grown significantly its weight in the whole economy, with the Elcotecq enterprise at the front. Around half of the enterprises of electronic engineering are subcontract (Instituto de Comercio Exterior, 2013). The lower income salaries and production cost, the high qualification level of Estonians employees and the geopolitical strategic location of Estonian market towards Russia and other Baltic States, make of Estonia an attractive destiny for Finnish and other foreign enterprises. The economy of both countries concentrated specifically in the border area is very interrelated. Since Estonia independence Finland has become in the most dominant economy in Estonia. The trade relations between both countries, and foreign investment in Estonia from Finland present usually the highest rates, followed by Sweden (see Terk, 2011).

3.2.3. Trust and political confidence.

As it has been argued in the Chapter 2 trust is one of the most important components of social capital, especially in the cognitive approach based in indicators at collective level, like regions, or states. At the same time, it has been one of the most controversial assets. Putnam (1994, 2003) attributes a proximal union between trust and social capital defining social capital as an accumulative facet of political culture through trust, norms, and networks. Networks, through membership in small-medium organizations, promote trust among people that in turn enhance people participation in organizations. From this approach have emerged the interest of different national and international institutions concerned with socio-economic development assuming that the more trust has a social group or society, the more social capital accumulates, which ultimately will influence positively in the well being and the political maturation towards democracy. Thus, the study of trust has been a very important indicator in national and international polling surveys that relate the high levels of trust and memberships in organizations to the well-being of national economies. However, for others researchers (Cote & Healy, 2001, Grix 2001, Stone, 2001, Shneider, Plumper & Bauman, 2000) the study of trust in relation to social capital and socioeconomic outputs has been a matter of hurry and enthusiasm of the analytical and political intentions. Trust is also a very general term that in order to understand better its role in the origin of social capital needs to be more operationalized. The study of social capital collides with the multiple layers of trust. Paxton (1999) distinguishes between generalized trust and trust in specific groups, communities. Grix (2001) systematized the concept into interpersonal trust, trust in institutions, generalized trust or horizontal trust and vertical trust. In the same line, Newton (1999) resolves the dilemma of the causation flow between trust and networks in the study of social capital though the distinction of different kinds of trust; thick trust; thin trust and abstract trust.

Other critics refer to unresolved analytical causal relation between trust and networks in the process of forming social capital. For Newton (1999) the interaction originated from the participation in organizations and membership is not sufficient to generate general trust. Other contexts like family, school, work are the basis for creating trust among people. There is a general trust as cultural value, universal in all societies which emerge in the frequent daily contact and along the socialization process of family, work, school interaction, independently if these societies have more or less number voluntary, political or whatever kind of organizations. General trust is a culturally shaped value and “is more likely to emerge in

response to experiences and institutions outside the small association than as result of membership” (Levi, 1996: 48, in Newton, 1999:16). Causal relation between membership and trust needs then empirical caution. The structural approach of social capital follows this assumption. Trust is not an analytical component of social capital, but rather a cultural value present in all societies not necessarily and systematically conducive to social capital (Lin, 2003; Burt, 2008). Nevertheless, following Uphoff (2000), trust and other norms like reciprocity or confidence are likely to encourage cooperation. These values are a minimum threshold necessary for cooperation. At the same time, the association between these values is not a closed matter, but they are usually considered as interrelated. For instance, like commented before in the Chapter 1, Knack and Keefer (1997), in their experiment of intentional losing of wallets, founded out the high correlation between trust of World Values Survey and the number of wallets returned. By last, for Zmerli, Newton and Montero (2007: 36) the relation between social or general trust, political trust or confidence in institutions, and satisfaction with democracy are not clear, but they have common origins and are related to local community participation. What is presented here is a brief description of these values, on the basis of the World Value Survey national scores of general trust and institutional trust and confidence in certain institutions in the countries of study. This set of data at national level can be considered as threshold for cooperation.

Table 23: World Value Survey national scores on social trust

1990-2000 (*)		Country/region				
		Total	Estonia	Finland	Portugal	Spain
Trust: Other people in country	Trust completely	18.3 %	20.9 %	12.0 %	19.1 %	18.4 %
	Trust a little	47.6 %	60.3 %	61.8 %	58.0 %	39.6 %
	Neither trust or distrust	23.3 %	10.4 %	22.1 %	9.6 %	30.4 %
	Not trust very much	8.8 %	6.4 %	3.5 %	11.5 %	9.3 %
	Not trust at all	2.1 %	2.0 %	0.5 %	1.8 %	2.4 %
	Total	6794 (100%)	960 (100%)	574 (100%)	1171 (100%)	4089 (100%)

Source: Author’s compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

The Table 23 shows the aggregated data by year of general trust inquired in World Value Survey as “would you say that most people can be trusted, or that you can’t be too careful in dealing with people?”. Finland has the higher level of general trust what is something common to Nordic countries. The Finnish national Leisure Survey analyses different aspects of social capital and it is related to World Value score of Finland. Nevertheless, results suggest that the generalised trust in Finland is even greater than in the WVS material, with 81

per cent of people in Finland agreed with the statement that “people can generally be trusted”. But these differences are due to the way the questions are worded (Lisakka, 2006). In Estonia is also remarkable the high level of general trust that relates the country to its fellow ethnic and to the Northern Europe. Spain and Portugal appear as lower level of general trust. What is also something characteristic of Mediterranean and Southern European countries. According to the data, presumably in Spain and Portugal people are less prone to trust others, and less motivated for participation, contrary to Finnish and Estonians.

Regarding different aspects of institutional trust, like the confidence in Government (Table 24), confidence in Parliament (Table 25), and confidence in Political Parties (Table 26), Estonia has greater confidence in Government than any of the other countries. In this line, the Eurobarometer highlights that Estonians citizens characterise as having more trust towards different national and international institutions than the European average. Their trust in Government is higher than in other Baltic countries, close to the Scandinavian group, and higher than in Europe as a whole (Eurobarometer 70, 2008: 2). By contrast, the WVS score of confidence in Parliament shows that Estonia has lower confidence compared to its Finnish neighbour and compared to the higher confidence in Parliament that Spanish and Portuguese citizens have. In Spain and Portugal the Parliament tends to be the better valued among other political institutions like Government or political parties. Also Spain and Portugal are those with highest confidence in European Union, being common to both countries that the international institution is more positively valued comparing to the trust in their national governments. The higher trust in Government in Estonia also contrasts with the lowest satisfaction with democracy. While more than half of the people in Finland, Spain and Portugal are rather satisfied with how democracy develops, in Estonia more than half of people are not very satisfied, and even the percentage of people not at all satisfied is considerable higher than in the other countries.

Table 24: Confidence in Government by country

1990-2000 (*)	Total	Estonia	Finland	Spain	Portugal
A great deal	5.2 %	6.6 %	3.0 %	5.4 %	-
Quite a lot	31.2 %	43.6 %	28.6 %	28.6 %	-
Not very much	45.5 %	36.1 %	53.7 %	45.9 %	-
None at all	18.1 %	13.7 %	14.7 %	20.1 %	-
Total	5704 (100%)	991 (100%)	970 (100%)	3743 (100%)	-

Source: Author's compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

Tale 25: Confidence: Parliament by country

1990-2000 (*)	Total	Estonia	Finland	Portugal	Spain
A great deal	6.1 %	2.9 %	5.4 %	5.1 %	8.2 %
Quite a lot	37.3 %	24.1 %	38.3 %	44.0 %	39.7 %
Not very much	43.6 %	54.1 %	46.9 %	37.5 %	40.1 %
None at all	13.0 %	18.9 %	9.4 %	13.4 %	12.0 %
Total	5107 (100%)	931 (100%)	1022 (100%)	889 (100%)	2264 (100%)

Source: Author's compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

Table 26: Confidence: The political parties by countries

1990-2000 (*)	Total	Estonia	Finland	Spain
A great deal	1.8 %	0.9 %	0.8 %	2.3 %
Quite a lot	28.3 %	22.3 %	12.7 %	34.1 %
Not very much	47.3 %	45.8 %	58.9 %	44.7 %
None at all	22.5 %	31.0 %	27.6 %	18.9 %
Total	5508 (100%)	948 (100%)	964 (100%)	3596 (100%)

Source: Author's compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

Table 27: Confidence: The European Union

Country/region					
1990-2000 (*)	Total	Estonia	Finland	Portugal	Spain
A great deal	5.8 %	3.5 %	1.7 %	7.4 %	8.0 %
Quite a lot	40.5 %	27.9 %	22.9 %	61.1 %	44.9 %
Not very much	40.0 %	47.2 %	54.5 %	23.6 %	37.2 %
None at all	13.7 %	21.4 %	21.0 %	7.8 %	9.9 %
Total	4825 (100%)	792 (100%)	997 (100%)	866 (100%)	2169 (100%)

Source: Author's compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

Table 28: Satisfaction with the way democracy develops

1990-2000 (*)	Total	Estonia	Finland	Portugal	Spain
Very satisfied	6.1 %	2.0 %	3.9 %	10.0 %	7.0 %
Rather satisfied	54.8 %	33.8 %	52.6 %	66.6 %	59.2 %
Not very satisfied	33.0 %	51.9 %	39.2 %	20.3 %	28.2 %
Not at all satisfied	6.1 %	12.3 %	4.3 %	3.2 %	5.6 %
Total	5121 (100%)	898 (100%)	980 (100%)	944 (100%)	2299 (100%)

Source: Author's compilation based on World Values Survey (2012).

(*) Aggregated database on the following surveys: Estonia [1990, 1996, 1999], Finland [1990, 1996, 2000], Portugal [1990, 1999], Spain [1981, 1990, 1995, 1999, 2000].

Another indicator used as an explaining reason of political trust or confidence in different institutions is the perception of corruption. In the Table 29 are depicted the following data from Transparency International. The Corruption Perceptions Index, is a composite index drawing on corruption-related data from expert and business surveys carried out by a variety of independent and reputable institutions. The country score indicates the perceived level of public sector corruption on a scale of 0 – 100, where 0 means that a country is perceived as highly corrupt and 100 means that a country is perceived as very clean (Transparency International. The global coalition agent corruption, 2013). The Table 29 shows that Finland as it occurs among Nordic countries has the lowest perception of corruption in the public sector, while Spain and Portugal resemble, being among a Mediterranean group with a moderated high and perception of corruption. In this case Estonia situates not closer to the Scandinavian or Nordic group, neither to its Baltic neighbours. To sum up, all these data reflect a major willingness for cooperation in the cross-border region SFE.

Table 29: Corruption perception indexes per country

Countries	2011		2012		2013	
	Rank	Score	Rank	Score	Rank	Score
Portugal	32	61	33	63	33	62
Spain	31	62	30	65	40	59
Finland	2	94	1	90	3	89
Estonia	29	64	32	64	28	68

Source: Author's compilation based on Transparency International. The global coalition Agent corruption (2013).

3.2.4. Awareness and perception of regional policy, and cross-border cooperation with the neighbour.

Despite the general data on trust and confidence in institutions it is also relevant to know the opinion of populations in the cross-border regions about the Regional Policy and Cross-Border Cooperation. Bringing the Eurobarometer data on citizens' awareness and perception of EU Regional Policy (see Table 30), it is distinguishable the greater positiveness and awareness of Estonia, as recent eligible recipient of EU Regional Policy, under the Convergence objective against its Finnish neighbour, covered by the Regional Competitiveness and Employment objective or European Territorial Cooperation objective (Eurobarometer, 2010). Portugal and Spain that account as old recipients of EU funds for Convergence objective, are more equal, and around half of population are aware of the projects from Regional Policy. Regarding the perceived benefits all EU members have a very positive perception of the benefit of the Regional Policy (from the 56% of Italy to the 90% of

Poland). Again recent EU members from the Eastern block are among those who perceived highly the benefits, like Estonia with 89% of people who perceived the benefits. But also closed to Estonia are the 86% of people in Finland. This positive impact of Regional Policy in people's perceptions is less in Spain and in Portugal who is one of the countries with lower perception of the benefits of EU Regional Support. The relationship between awareness of EU regional support and benefits for respondents' areas indicates that there is a logical association or proximity in the countries scores. Those respondents with higher awareness of EU funds tend to think more positively about the benefits of the projects (Eurobarometer, 2010). This tendency occurs more in Estonia than in the other three countries.

Table 30: Citizens' awareness and perception of EU Regional Policy in 2010

Countries	Proportion of citizens aware of EU regional support projects	Perceived Benefits of EU Regional Support Projects	Perceptions about personal benefits from EU regional support projects	Awareness that EU regional funding is helping cooperation between regions	Should EU funds be available for cross-border cooperation
Portugal	50%	70%	12%	16%	71%
Spain	43%	79%	22%	27%	71%
Finland	34%	86%	12%	13%	52%
Estonia	57%	89%	29%	22%	84%

Source: Author's compilation based on Eurobarometer (2010).

If the question considers the more direct perception about the benefits over own's personal and daily life, the results are different. In all member states less than half of people perceive the Regional Policy have benefited in their life (from the 44% of Poland to the 4% of Belgium). The Baltic States and Estonia with 29% are the closest to Poland with the better perception of perceived benefits in people's daily life. Concerning the citizens' awareness and perceptions on cross-border cooperation, the Eurobarometer underlines the scarce knowledge of Europeans (19% of citizens) about regions cooperation with the funds from European Territorial Cooperation. The majority (79%) had never heard about such cross-border cooperation. By countries (from the 45% of Malta to the 7% of Italy), Spain is among those with higher awareness of cross-border cooperation contrasted by the Portugal less awareness. The contrast is also between Estonia with higher awareness compared to Finland whose population are among the less aware of cross-border cooperation together with Sweden, and others like Belgium and France. However, when the question implies desirability the percentages change significantly. More than half of the population of all European countries support that the EU fund should be available for the cross-border cooperation (from the 84%

of Estonia to the 51% of Germany). The homogeneity of Portugal and Spain where the 71% of population support that the EU fund should continue being available for cross-border cooperation is contrasted with the opposite perception between Estonian and Finnish neighbours. Estonians are those valuing more positively the relevance of cross-border cooperation against the slightly half of Finnish population, with a 52% that supports the availability of EU funds for cross-border cooperation.

Regarding the study of social reality in Alentejo, Algarve and Andalucía the population were asked also about the degree of cooperation they think that takes place in their region with the neighbours. The majority of interviewed people considered that the cooperation between Spain and Portugal was medium-high, with discrepancies by regions. In Andalucía, people show a more optimistic perception with 48.1% of people considering the cross-border cooperation as high, while 56% of population from Alentejo and Algarve consider it as medium. The most negative perception appeared among Alentejo population with 32% of people that considered the cross-border cooperation as little or inexistent (Gualda et al. 2008: 217). The Estonian Human Development Report shows the opinion of population in the three Baltic States about the relevance that they attribute to maintain ties of collaboration with their neighbours. Results indicated the different interest of the Baltic States for each other and the importance of the Nordic countries. For Estonia the most important country for cooperation was Finland as well as Sweden, and followed by Russia in a third place. It is interesting to note that considering population by ethnic groups, the Russian-speaking population in Estonia attributes more value to the cooperation with Russia and Germany than ethnic Estonians do (Lauristin & Vihalemm, 2011).

3.3. Opportunities for interaction: A basis for social capital creation.

In this section is presented some additional data about the possibilities and potentialities for social interaction between people from each side of the two borders. The future of cross-border cooperation depends on the building of sustainable political and institutional networks structures, on the availability of infrastructures that permeabilize the communication barriers of the border, but also on the socio-cultural background, on the social relations, and on the attitudes and values predisposing the social contacts that at long term create a suitable environment for cross-border business, trade, and for boosting the institutional cross-border cooperation. This socio-cultural background and relations refers to the existence of multiple

networks and platforms for interaction. They mean the informal processes of interaction or just the social flow of people, and the border behaviour that might take place across the border. We can refer also to the different social scenarios where cross-border interaction is more likely to occur creating a cross-border social space. It can be intense pattern of interaction which develop without the intervention of deliberate governmental decisions, following the dynamics of markets, technology, communications networks and social exchange, or the influence of religious, social or political movements (Wallace, 1990; in Grix, 2001). They might be intense, sparse or deficient, though they deliberately contribute to the formal institutional cross-border cooperation. They are opportunities from which people might benefit, might get useful and different information, and might create niches of opportunities for later social and economic development. To report all the myriad of contacts and interactions would be empirically impossible but through a brief overview of different fields of social interaction is possible to account for the nature of cross-border social space existing in both cross-border regions.

3.3.1. Transport and connectivity.

One of the first possibilities for social interaction is the existing infrastructure of communication and transport. This precondition is crucial when the rivers, seas and lakes are the natural borders. In the cross-border region SFE there has been in late decades a significant change in this aspect. During the Soviet era the possibilities for interaction were practically frozen. Trips and contacts between Estonia and Finland, as to the rest of western countries, were under strict control. In 1965 a regular sea traffic started between Tallinn and Helsinki, though mostly was a unilateral flow of Finnish tourists (Lauristin & Vihalemm, 1995: 148). This changed enormously since Estonia independence. Currently Estonia has frequent air, ferry, and boat traffic with Southern Finland. According to the data collected by July 2011, between Helsinki and Tallinn there are approximately 20 trips by ferries or boats in summer, which might be over 12 in winter. There are four different companies operating for this tourism and commuters traffic (Viking Line, Eckerö Line, Tallink Silja Line, and Lindalinn Express which is the fastest). The duration of the trips varies from the three hours and a half on boats and one hour and half in ferry in summer. The companies are all internet accessible in different languages (Estonian, English, Russian and Finnish language) and offer serial ticket. Between Sillamäe, in the Ida-Virumaa county of Estonia (see Map 2) and Kotka (Finland) started a connection line in 2006, but because the Russian Federation did not allow

the ferry to cross its territorial waters, the trip became too long and was obviously not beneficial anymore and the connection was interrupted in the summer of 2010 (Virkunnen, 2010). By plane there are 10 flights per day that takes 30 minutes and by helicopter there is planning to start a line. There are also important transnational roads that communicate the whole Baltic Region like the Via Hanseatica, the Kings Road and E18, and especially between Finland and Estonia the via Rail Baltica (Savander & Alaniit, 2007). However, the transport and communication between Estonia and Southern Finland is affected by the less favored conditions of roads and railways in Estonia. The improvement of the national roads, construction of highways is necessary to be improved and is a transport objective of the Central Baltic Programme.

The cross-border region of Alentejo-Algarve-Andalucía territorially is much more easily passable although it has not translated into an intensive infrastructure of communication and transport. During the dictatorship period in both countries the flow of people was strictly controlled. An economy of subsistence based in informal and even illegal transit of people doing border trade and smuggling emerged in the territories close to the border. In democratic and transition period the relations were normalized and started an intensive border trade of commodities in the closest areas to the border. There were different transit points from south to north: two river transports by small boats between Ayamonte and Vila Real do Santo António, and between Sanlúcar de Gadiana and Alcoutim; two territorial border crossings between Rosal de la Frontera and Valverde do Ficalho, and Encinasola and Barrancos. The elimination of official border after the Spanish and Portuguese European integration blurred these kind of economic relations and implied the extension of the border towards the southern capitals of Huelva and Faro and other bigger municipalities. Later with the constructions of first infrastructures like the international bridge of Gadiana, the border entered in an increasing regionalization process. Currently the border is permeable through the bridge built in 1991, and the highway in Spain (A-49), Portugal (A22). This big infrastructure was one of the first outcomes of INTERREG programmes. The construction of this bridge has brought new opportunities for an important littoral cordon that connects the cities of Huelva and Seville in Spain and Faro and Sagres in Portugal. However, it is questionable the opportunities for developments in the cities of Ayamonte, and Vila Real do Santo Antonio and Castro Marim. Before the first bridge was constructed, these cities were the origin and destiny with the boats crossing the river. There were an intensive transit of people in the ferry between Ayamonte and Vila Real do Santo António, and these localities were central points. After the

bridge, these cities have become in tangent points of the border and people travel now by car without necessity to pass by them.

In order to make the border more permeable in its interior part in the areas of Andévalo and Baixo Alentejo, the construction of three bridges along the natural border created by the rivers Guadiana and Chanza was planed in the project HUBAAL of INTERREG III A. Those bridges are the main and initial steps for greater cross-border cooperation in this area. Between El Granado (Andévalo) and Pomarao (Mértola), between Paymogo and San Marcos-Corte do Pinto (Mértola), and between Sanlúcar de Guadiana (Andévalo) and Alcoutim. The first bridge has been inaugurated and opened in 2009, the second was recently inaugurated in 2012, and the third one remains at the project level, as the population size of these localities are not considered sufficient reasons for such an important infrastructural investment. Other innovative initiatives were considered to increase the mobility between these two small localities, like the chairlift (Guerrero, 2011). Finally a zip line has been settled in 2013 in order to add a different and adventurer value to the touristic cross-border crossing. All in all the bridges have created big expectation for the development of the interior border area. However, considering the experiences from the first bridge between Vila Real do Santo António and Ayamonte, the potentialities that these bridges offer to the interior part of the border (Andévalo and Baixo Alentejo) are still doubtful and questionable whether as by the possible externalization of the opportunities of development towards bigger cities as by the environmental impact that they might cause in a protected conservation area of Red Natura 2000 (Márquez, 2011).

Furthermore, they need to be complemented with the improvement of road infrastructure. The conditions of the national roads, especially in the Portuguese side are matter of future development and indispensable for the dynamism of the cross-border areas. Currently the majority of the border transit of population is done in private cars crossing daily border points, more intensively across the international bridge of Guadiana. More than 90% of transport transit is done by road, and 87% by private cars (Cazallo, 2011). The border is characterized by a deficient public net of international public transport and a deficit of complementary good connectivity to the national public transports nets. More recently, from the initial collaboration of two transport companies, the Portuguese EVA and the Spanish Damas, there are two lines of bus connection that link the capital centers of Andalucía and Portugal through the littoral coast. One is from Seville to Lagos with over six trips per day communicating also the cities

of Huelva, Ayamonte and Faro, and the second between Seville and Lisbon, with approximately four trips per day that also communicates the cities of Huelva, Ayamonte, Vila Real do Santo António, Tavira, Olhao, Faro, Albufeira, Lagos, and Portimão. However the rest of the border in the interior areas remain without a net of public transport that links smaller and disperse municipalities. A less populated area and less favored in economic terms are likely to be the main reasons. At this respect, there is need for supply-demand evaluation as the majority of bus users during the border trajectory tend to be foreign tourist that crosses the littoral coastal area of Spain and Portugal, while the national population of both countries use majority the private light transport. The public transport between Andalucía and Algarve and Alentejo can be viable in the future. It can broaden the social and economic opportunities in the closest territories in the border and increase the regional integration if it is complemented by the train transport and the better coordination of the national transport systems (Cazallo, 2011).

3.3.2. Education exchange.

The Erasmus programme of the European Union has symbolized the idea of the European Integration through the exchange of people at the higher and professional education levels. Mostly students have the opportunity not only to study in other country, but also to get in contact with the country culture and society. From this half year or a year period is expected that a myriad of relations across European countries emerge and crystallize at long-term not only into human capital (intercultural knowledge, linguistic competences, etc) but also into social capital. Thus, the Erasmus programme has been considered often as the best European policy for the strengthening of European Integration. The data presented here, though is not comparable, tries to reflect the extent to which this kind of educational interaction takes place across both cross-border regions.

In the cross-border region AAA, statistics in different academic years for the region of Andalucía proves that the majority of Andalucía students chose countries of close and/or central European countries for studying or practical exchanges, while eastern European countries and Portugal are the fewer favorites. In the academic course 2009/2010 (see Table 31) from the 6651 Erasmus students of Andalucía, 368 chose Portugal, being the fifth country chosen, after Italy, France, Germany and United Kingdom. Though the number is not significant at all, compared with other destiny-countries the number is increasing

progressively considering previous years. Regarding Professors Erasmus mobility, in Andalucía they prefer the close linguistic neighbours to make teaching mobility, like Italy, France and Portugal. Portugal was the third option in the 2007/2008 and the second option in 2009/2010 (OAPEE Organismo Autónomo Programas Educativos Europeos, 2012). In this sense it is visible that both students and professors have started a slow rapprochement in respect to academic exchange.

Portuguese students do not represent a big group of incoming students to Andalucía region, being the 10th country represented in Andalucía as destination for Erasmus study mobility, with 96 Portuguese students in 2009-2010 (see Table 32). The evolution from previous academic years shows also a decreasing tendency that contrast with the increasing number of Andalusian students outgoing to Portugal within Erasmus exchange (see Table 31). However, Spain is one of the dominant countries among students and professors for Erasmus mobility. In the academic year 2007/2008 Spain was the main country chosen by Portuguese students, a total 26.5%, especially the number of students for internships choosing Spain were higher than 50% (PROALV 2007/2008: 127). Regarding Portuguese professors mobility, the tendency is similar in the same academic year. Spain is the first country chosen by professors with 26.7% of professors, followed by the other closest linguistic neighbours of Italy, and France. These three countries form what is called the triad for students and non students of the Portuguese Erasmus mobility. The Spanish data supports this increasing tendency, the incoming Portuguese academic personnel to Andalucía has increased in last years (from 26 in 2007/2008 to 30 in 2009/2010) (OAPEE Organismo Autónomo Programas Educativos Europeos, 2012).

Table 31: Outgoing Andalusian students by country of destination

Countries	2007-2008	2008-2009	2009-2010
Germany	483	610	795
Austria	76	97	119
Belgium	199	227	319
Denmark	81	83	108
Finland	89	94	121
France	748	765	1025
Grece	54	94	116
Hungary	27	39	54
Irland	85	104	112
Italy	1092	1298	1698
Norway	33	41	68
Netherlands	148	146	198
Portugal	217	221	368
United Kingdom	548	599	712
Czech Republic	84	120	149
Sweden	96	84	126
Total	4265	4951	6651

Source: Author's compilation based on OAPEE Organismo Autónomo Programas Educativos Europeos (2012).

The countries with less than 50 students, eastern and small countries) has not been Included. In this table is included only Erasmus Study Mobility and Intership Mobility.

Table 32: Incoming students in Andalusian institutions by country of origin

Countries	2007-2008	2008-2009	2009-2010
Germany	1078	1173	1262
Austria	139	123	167
Belgium	252	281	295
Denmark	47	49	50
Finland	80	90	91
France	1060	1158	1215
Grece	100	112	126
Hungary	47	59	60
Irland	65	52	64
Italy	1222	1333	1398
Netherlands	127	132	164
Poland	206	274	350
Portugal	110	103	92
United Kingdom	453	458	507
Czech Rep.	107	129	117
Rumania	42	51	56
Turkey	66	75	74
TOTAL	5400	5871	6332

Source: Author's compilation based on OAPEE Organismo Autónomo Programas Educativos Europeos (2012).

The countries with less than 50 students, eastern and small countries) has not been Included. In this table is included only Erasmus Study Mobility and Intership Mobility.

Regarding the cross-border region Southern Finland-Estonia, it is possible to compare the weight that each neighbour has in the other country for Erasmus mobility. Finland represents the most chosen country for Student Mobility in Estonia in different academic years and this option is increasing steadily (see Table 33). Finnish students do not represent a big number of foreign students in Estonia, they only represent 6.6% of incoming students in the 2009/2010 academic year (see Table 34). German and French students are the biggest groups, representing 12.1%, and 13.6% of total students. Nevertheless, the data of Erasmus mobility does not represent the whole educational exchange between Estonia and Finland. There is an intensive exchange or student mobility between both countries besides the Erasmus program as it reflects the Table 35 from the national statistics of Estonia. Regarding the number of foreign students by citizenships, Finnish students represent the highest group after Russian Students. The well consolidated bilateral agreements for students and academic exchange, the facilities that Finnish students encounter to enroll in highly valued Estonian faculties of medicine, and bio-sciences, and the difference at the cost of living benefiting Finnish students are among the reasons to choose Estonia as the best option.

Table 33: Outgoing student mobility 2007-2010 from Estonia

Academic Years	Finland	Spain	Germany	France	England	Italy	Total
2007/2008	103	82	93	63	51	54	717
2008/2009	107	104	83	53	57	63	761
2009/2010	118	109	85	70	63	59	939
2009/2010 % from total	12.6	11.6	9.1	7.5	6.7	6.3	-

Source: Data provided by Archimedes Foundation (2012).

Table 34: Incoming student mobility 2007-2010 in Estonia

Academic Years	Finland	Spain	Germany	France	England	Italy	Total
2007/2008	78	64	55	53	62	40	619
2008/2009	99	85	55	55	68	34	708
2009/2010	93	104	75	54	51	49	767
2009/2010 % from total	12,1	13,6	9,8	7,0	6,6	6,4	-

Source: Data provided by Archimedes Foundation (2012).

Table 35: Students in Estonia by country of citizenship and year

Countries	2005	2006	2007	2008	2009	2010
Russia	1129	1095	1190	1254	1313	1261
Finland	398	467	551	548	520	587
Latvia	198	170	187	154	120	125
Lithuania	84	61	57	45	44	47
Germany	15	22	24	27	25	33
EuropeTotal	1865	1861	2070	2108	2101	2147

Source: Author's compilation based on Statistics Estonia (2012a).

Data for Erasmus programme on the teacher mobility reflects also the dominant place that Finland has for Estonian academics. The Tables 36 and 37 show the evolution of incoming and outgoing teachers between both countries. From all European countries Finland is the most chosen country, though this dominance has been decreasing by years. The same tendency occurs with Finnish academics. Though they represent the higher group with 20% from total of European academic personnel mobility in Estonia, they are decreasing in number per year.

Table 36: Estonia outgoing teacher mobility 2007-2010

Academic Years	Finland	Latvia	Italy	Germany	Lithuania	Total all countries
2007/2008	81	17	14	19	12	284
2008/2009	72	13	30	30	18	306
2009/2010	67	28	23	19	18	296
2009/2010 % from total	22,6	9,5	7,8	6,4	6,1	-

Source: Data provided by Archimedes Foundation (2012).

Table 37: Estonia incoming teacher mobility 2007-2010

Academic Years	Finland	Germany	Ponland	Latvia	England	Total all countries
2007/2008	71	29	9	16	18	288
2008/2009	0	28	21	17	17	223
2009/2010	69	25	23	22	19	345
2009/2010 % from total	20,0	7,2	6,7	6,4	5,5	-

Source: Data provided by Archimedes Foundation (2012).

3.3.3. National residents living in the neighbour country and perception of the neighbour.

The resident population living in the neighbour country of each cross-border region represents also an opportunity for social interaction and social integration. In this case they reflect the weight of the informal interaction of people in cross-border regions. Work, study and family reasons move people especially and constantly in these border areas. At the same time, the perception of the people from the other side and the interest at having relations with them can be considered as a negative or positive predisposition to maintain social relations. In both cross-border areas the migrant population from the neighbour country forms a very specific social group of foreigners compared to the other groups of immigrants. The historical migration flow and the cultural and linguistic similarities have favoured a higher social

integration of immigrants in the neighbour country. Portuguese, Spanish, Finnish and Estonians constituted a much consolidated immigrant group in their respective neighbour country that permits greater opportunities for social interaction among the host and the home countries.

Looking at the foreign populations living at each side of the borders the numbers highlights the specificity of the level of residents exchange in both cross-border areas. Between Southern Finland and Estonia is remarkable that Finns are an important ethnic national group in the Estonian population as well as Estonians are in Southern Finland. From the total of foreigners Estonians and Russians are the biggest groups, followed by Swedish (see Table 38). They all are the closest neighbours of Finland. Russians have been an important traditional ethnic group in absolute numbers in Finland. However, in the last years, Estonians have become even the biggest ethnic group living in Finland, at the time that the number of Russians has decreased. It is outstanding also the number of Estonians living in Finland compared to the number of foreigners from other Baltic states like Latvia. Considering their distribution in the Southern Finland is understandable that the majority of Estonians are concentrated in the region of Uusimaa (see Table 38). This region is the closest to Estonia, geographically and in terms of infrastructural connection. It is also the most industrialized and metropolitan region, where most of the big cities of Finland are, what makes Uusimaa the most attractive region for the Estonian labor migration. On the contrary, the southern and most eastern region of Southern Finland in the border with Russia, South Karelia, it has consequently less number of Estonians and bigger number of Russians.

The migration of Estonians to Finland is very much for working reasons due to the great differences on salaries and better living standards. The recent Border Interview Survey (Statistics Finland, 2013) reflects the working pattern of Estonians short-visiting Finland. In 2011 the Russians were the biggest visiting group to Finland with 3246.9 visits, and 70.9% of visits were for leisure reasons. Estonians visitors follow with 697.4 visits. However, 40.7% of Estonians passengers visited Finland for working-business reasons, 16.6% did for visiting friends or relatives and 28.6% for leisure reasons. Regarding the type of accommodation the biggest percentage was formed by the 36.8 of Estonians who stayed at friends or relatives' place, and 21.7% did in the employers' accommodation. This highlights the Estonians' social and close link to Finland, who have or use their more stable relations for accommodation compared to those who stay at hostels when visiting Finland.

A Finnish nation-wide survey done in 1998 (Jaakkola, 1999, in Jasinskaja-Lahti, et al. 2006) revealed that Estonians were at the top positions in an ethnic hierarchy valued by Finns. Two thirds of Finnish people had positive attitudes towards immigration of Estonians, whereas, only one third had positive attitudes towards Russian immigration. The study remarked also that Finns have in general positive attitudes towards people of Finnish descendents from the former URSS. This reveals that the positive attitudes are very much influenced by the ethnic closeness between neighbours. Nevertheless, compared to the Finnish attitudes to other countries, it is interesting to note that Estonians entered in a more negative perceived eastern group of countries compared to the higher valued group of western countries like Norway or Britain (Jasinskaja-Lahti, et al. 2006). Nowadays the attitudes of Finns towards Estonians are more positive. Since a successful transition to market economy and democracy, Estonians have succeeded as a society at the head of ICT and technologies. For Finns, Estonians are not only the closest fellow ethnic but also a competitive country to cooperate with.

Table 38: Population by ethnic nationality and year in Finland and Southern Finland

Finland	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	5326314	5183058	22604	677	8439	26909	143256
2009	5351427	5195722	25510	802	8506	28210	155705
2010	5375276	5207322	29080	969	8510	28426	167954
2011	5401267	5218134	34006	1173	8481	29585	183133
Uusimaa	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	1501511	1427773	14101	282	2659	10635	73738
2009	1517542	1437264	16090	318	2695	11144	80278
2010	1532309	1445624	18499	378	2705	11337	86685
2011	1549058	1454092	21881	455	2689	11775	94966
Varsinais Suomi	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	461177	448429	2036	47	750	1950	12748
2009	462914	449434	2202	57	749	1964	13480
2010	465183	450613	2482	66	739	1916	14570
2011	467217	451664	2867	79	747	1910	15553
Kanta-häme	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	173041	170413	762	15	107	455	2628
2009	173828	171042	782	19	114	447	2786
2010	174555	171510	851	19	124	427	3045
2011	175230	171874	971	32	124	451	3356
Päijät-häme	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	200847	196592	787	16	164	1484	4255
2009	201270	196630	889	16	162	1540	4640
2010	201772	196848	999	13	156	1554	4924
2011	202236	196973	1134	16	154	1633	5263
Kymenlaakso	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	182754	178225	528	25	91	2169	4529
2009	182617	177532	618	31	91	2398	5085
2010	182382	176888	727	32	99	2475	5494
2011	181829	175851	828	32	98	2633	5978
Etelä-Suomi	Total	Finnish	Estonians	Latvians	Swedish	Russians	Foreign total
2008	134448	131338	209	14	64	1821	3110
2009	134019	130646	244	16	66	1928	3373
2010	133703	130090	266	22	64	2026	3613
2011	133311	129387	294	24	63	2208	3924

Source: Author's compilation based on Statistics Finland (2012).

In the Estonian side, Finnish are also a relevant group of foreigners, after Russians who are the biggest group and represent around 25.47% of the total population, a percentage that in the nineties was around the 40% of whole Estonian population and had decreased progressively since Estonian regained independence. Finnish population is distributed more proportionally across Estonians counties, though they concentrated more specifically in the biggest capitals

of Estonia, in the northern part, Pohja Eesti, Tallinn and in the southern part, Lõuna Eesti, Tartu. Finnish people in Estonia do not obey to an economic migration for improving living conditions. The majority of them are highly skilled and have migrated due to working reasons in the northern part, or study reasons more in the southern parts. They tend to move by personal choice, and for two to five years. Though there are among them a group of Finns who chose and stays longer in Estonia after retirement favoured by the big difference yet between both countries in the purchasing power or the cost of living (Hyvönen, 2008).

Regarding attitudes towards Finns, in the Balticom Program research in 1994, Estonia attitudes toward Finns and interest in Finland appear stronger than those to the other Baltic States. To the questions of attitudes and behaviour like “Have you thought of moving to another country”, “If you had to move where would you go?”, ethnic Estonians chose Finland as first option together with Sweden. In general, these data are backed by the difference in the cost of living and the well-known intensity of social relations between Finnish and Estonians, especially in the early nineties, as Vihalemm (1995) well reports in different aspects like tourist visits to the neighbour country, telephone calls and correspondence. By the transition years, it was popularly spread out among Estonian people the saying “Igal perekond peab olema ome kodustatud Soomlased” (Every Estonian family should have its own domestic Finnish), that reflected the interest of Estonians at having any social contact in Finland for his or her own seeking. This intensity has likely decreased and stabilized along time after the greater excitement at having contact with the fellow ethnic. However, in all the different spheres, economic, political, social and cultural, Finnish and Estonians continue to have an intense degree of collaboration as it is reported whether in the most official and institutional documentation or in the most informal and spontaneous information.

There are among Estonians and Finns lots of images created through the media especially in this two-small nations transitional period of rapprochement of the small or big brother respectively. And stereotypes have obviously flowed. In the Estonian media, the image of drunk Finns coming to Viru (Estonia in Finnish Language) Hotel in Tallinn are part of the Estonians memories (Virkunem, 2010). Although the media reflected the positive outcomes of Estonia economic and political transition identically these pejorative stereotypes were present in the Finish media. Negative aspects received a disproportional attention based on data of corruption, crimes, and the sex-tourism between Finland and Estonia (Suhonen, 1995). Estonians appeared as thieves or as prostitutes (Masso, 2010). Nevertheless, these are only

myths, clichés becoming more and more part of past memories that do not usually correspond with the reality of social relations between Estonians and Finns.

Table 39: Population by ethnic nationality and year in NUTS III and in Estonia

Põhja Eesti	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	523277	312042	169325	3361	961	1213	211235	734
2009	524938	313775	169480	3336	959	1217	211163	731
2010	526505	315441	169634	3314	960	1199	211064	741
2011	528468	317625	169656	3289	956	1205	210843	745
Kirde Eesti	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	170719	33668	121486	2331	308	307	137051	500
2009	169688	33347	120947	2296	307	311	136341	505
2010	168656	33062	120413	2262	301	308	135594	502
2011	167542	32838	119774	2222	295	302	134704	506
Kesk Eesti	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	140267	125493	9663	1681	91	166	14774	176
2009	139959	125278	9616	1652	87	160	14681	172
2010	139674	125104	9543	1636	86	157	14570	172
2011	139476	125066	9457	1614	86	155	14410	171
Lääne Eesti	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	161078	145952	11039	772	182	149	15126	190
2009	160763	145720	10987	762	182	150	15043	190
2010	160470	145485	10959	748	184	151	14985	192
2011	160187	145327	10884	728	182	147	14860	192
Lõuna Eesti	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	345594	303730	32055	2745	669	235	41864	310
2009	345067	303364	31936	2721	664	234	41703	307
2010	344822	303306	31830	2679	665	235	41516	305
2011	344521	303244	31679	2641	658	237	41277	304
Estonia	Total	Estonians	Russians	Finns	Latvians	Lithuanians	Foreign	Germans
2008	1340935	920885	343568	10890	2211	2070	420050	1910
2009	1340415	921484	342966	10767	2199	2072	418931	1905
2010	1340127	922398	342379	10639	2196	2050	417729	1912
2011	1340194	924100	341450	10494	2177	2046	416094	1918

Source: Author's compilation based on Statistics Estonia (2012b).

Portuguese population in Spain is likely the oldest and most consolidated group of foreigners (Azcarate & Borderías, 1994). It is from 1965 when Portuguese reach to several miles,

concentrated fundamentally in the biggest capitals and the border provinces of Spain. Portuguese population is also very well integrated in the Spanish society, whose migration was based in economic reasons, with expectations for a long- life project in Spain, what led to family regrouping or mixed marriages, especially in the border areas (López, 1997). However, the Table 40 shows that they have become a symbolic group compared to other nationalities in the last decade. Other economic migration from different non-European countries (Latin America and North Africa) and Eastern European countries like Romania has come to Spain significantly since the beginning of XXI century. And though the number of Portuguese living in Spain has increased in absolute terms, their relative weight compared to other groups of foreigners has significantly diminished. Portuguese people living in the Spanish side of the border area are concentrated in the closest province to the border. Huelva has been traditionally one of the Spanish provinces with higher relative weight of Portuguese people. Portuguese only represent a bigger group than other Europeans like Germans and English in the province of Huelva. In the other adjacent provinces (Sevilla and Cádiz) of the border area Portuguese are much less. Within the province of Huelva Portuguese people concentrate in absolute number in the more economic dynamic area of the littoral (Ayamonte, Cartaya, Lepe, Isla Cristina, etc.) and the capital, though they represent the biggest group of foreigners in relative number in the interior area of the province close to the border known as the Andévalo and Sierra of Huelva (Rosal de la Frontera, Encinasola, El Almendro, Puebla de Guzmán or Paymogo) where they represent half of the foreign population.

Table 40: Population by nationality and year in Spain and Andalucía border area

Spain	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	46157822	5268762	40889060	181174	127199	352957	731806
2009	46745807	5648671	41097136	191002	140870	375703	798892
2010	47021031	5747734	41273297	195824	142520	387677	831235
2011	47190493	5751487	41439006	195987	140824	391194	865707
Andalucía	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	8202220	623279	7578941	24235	10324	100070	79630
2009	8302923	675180	7627743	25765	11576	108282	88134
2010	8370975	704056	7666919	26940	11996	113654	93169
2011	8424102	730155	7693947	27573	12279	117251	99776
Cádiz	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	1220467	42804	1177663	2597	1047	7860	2831
2009	1230594	45687	1184907	2702	1218	8370	3249
2010	1236739	47767	1188972	2802	1294	8745	3493
2011	1243519	50374	1193145	2840	1353	9009	3754
Córdoba	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	798822	21937	776885	179	165	924	6835
2009	803998	24801	779197	194	186	1002	7480
2010	805108	25259	779849	201	184	1063	7733
2011	805857	25894	779963	199	196	1088	8254
Huelva	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	507915	37110	470805	675	3559	1000	10834
2009	513403	39853	473550	692	3918	1128	11483
2010	518081	42753	475328	711	4041	1246	12353
2011	521968	45863	476105	715	4139	1265	14153
Sevilla	Total	Foreigners	Spanish	Germans	Portuguese	English	Romanians
2008	1875462	62319	1813143	1360	1836	1996	9120
2009	1900224	71993	1828231	1549	2014	2160	10320
2010	1917097	77090	1840007	1626	2055	2254	10903
2011	1928962	79658	1849304	1677	2121	2364	11384

Source: Author's compilation based on Instituto Nacional de Estadística (2012).

At a national level Spanish people fundamentally migrate to the biggest cities of Portugal like Lisboa and Porto. They formed a high qualified migration that in the case of men are usually specialized professionals (López, 1997). Other example of this significant migration to Portugal takes place among the nurse collective (Argos, 2012). The higher demand of those professional and the territorial and cultural closeness of Portugal makes this country an interesting option for those professionals who have less job offers in Spain. This collective has already a solid inclusion in the Portuguese labor market and it accounts with specific organizations like the Association of Spanish Health Professionals in Portugal (APSEP, 2013) or the net of Spanish Health workers in Portugal (REDSEP, 2013). There is also an increasing tendency of Spanish language teachers that migrate and live in Portugal in recent years due to the higher demand by Portuguese Education institutions of native Spanish teachers. This demand will imply a future increase of this professional migration in next years (Rodrigo,

2009). In the cross-border region people from Andalucía that moves to Portugal follow this general pattern of high skilled professional mobility. At the same time, like in the case of Portuguese population in Spain, Spanish residents are also a very consolidated and integrated foreign group in the Portuguese society. The Table 41 shows that the Spanish community has increased along the late years in Portugal and in the area of the cross-border region. However, they are also a smaller group of foreigners compared to others like Germans and especially compared to English and Roumanians. This difference is even greater in the region of Algarve where Spanish are very small group compared to the high number of Northern tourist groups formed by English, Germans and the economic migration of the Rumanians. On the contrary, Spanish are a more relevant group in the Alentejo region compared to English and Germans especially in the less touristic and interior subregions of Alentejo like Baixo Alentejo which is the area or NUT III closest to the Andévalo in the Huelva province.

Table 41: Population by nationality and year in Portugal and Alentejo and Algarve border area

Portugal	Total	Foreigners	Portuguese	Germans	Spanish	English	Roumanians
2008	191939	436020	-	8187	7220	15371	26425
2009	-	451742	-	8614	8060	16373	32457
2010	-	443055	-	8967	8918	17196	36830
2011	10281794	434708	-	9054	9310	17675	39312
Alentejo	Total	Foreigners	Portuguese	Germans	Spanish	English	Roumanians
2008	-	-	-	586	436	350	2758
2009	-	-	-	660	490	376	3868
2010	-	-	-	714	543	430	4712
2011	733219	-	-	748	619	482	5540
Alentejo Litoral	Total	Foreigners	Portuguese	Germans	Spanish	English	Roumanians
2008	-	-	-	356	64	86	541
2009	-	-	-	419	76	99	712
2010	-	-	-	475	81	108	905
2011	95346	-	-	54	117	44	722
Baixo Alentexo	Total	Foreigners	Portuguese	Germans	Spanish	English	Roumanians
2008	-	-	-	83	61	77	461
2009	-	-	-	84	63	101	724
2010	-	-	-	85	72	124	979
2011	122524	-	-	81	97	142	1233
Algarve	Total	Foreigners	Portuguese	Germans	Spanish	English	Roumanians
2008	-	-	-	3374	511	10424	7059
2009	-	-	-	3472	564	10795	7926
2010	-	-	-	3526	661	11129	8587
2011	462825	-	-	3514	709	11137	8770

Source: Author's compilation based on Instituto Nacional de Estatística (2012).

The Spanish-Portuguese Barometer reports a well-known asymmetry in the perceptions that Portuguese and Spanish have respectively of each other. Spanish population has had usually

better opinion of Germany and France, while Portugal has occupied a third place among the list of countries better valued. 2011 has placed Portugal in a fourth place after United Kingdom, though is better considered than Greece and Italy. On the contrary, Portuguese population show more stable opinion about Spain and continue as the best valued country by Portuguese people. Like Spanish the value also very positively Germany and France, while the worst valued are Italy and Greece. To the question about the level of interest in neighbour matters only 8.9% of Spanish population show concern, while 18.2% of Portuguese report to have interest in the Spanish matters (Barómetro de Opinión Hispano-Luso, 2011). More accurate information offers the study of social reality in Andalucía, Algarve and Alentejo (Gualda, et al, 2008) that approaches for first time the perception, attitudes and behaviour between people in this cross-border region. Regarding the interest to relate with the neighbour citizens of the three regions, Alentejo, Algarve and Andalucía have in general a positive opinion towards the neighbour. Half of the population of the whole region considered positive to have people from the other country in their cities. In the Barometer section of the predisposition to have relations, the perception that in Portugal there is greater interest at having relations with them predominates. Though it is remarkable also that the people from Alentejo have less interest at relating with Spanish people. While Andalusian and Algarvian valued higher to have relations with Portuguese and Spanish respectively. In the role of media, half of Andalusian, Algarvians and Alentejans valued as positive the image that their respective national media offers about the neighbour. The images forecasted by the media encountered greater optimism in Andalucía people when they were asked about the treatment that they give to Portuguese, while it was more pessimistic in the Portuguese side. Around half of Portuguese considered that the treatment they offer to Spanish neighbours was regular.

3.4. A brief introduction to the institutional cross-border cooperation in Alentejo-Algarve-Andalucía and Southern Finland-Estonia.

Alentejo-Algarve-Andalucía.

The institutional structure of cross-border cooperation between Spain and Portugal starts to take shape since both countries enter jointly in the former European Economic Community (EEC) in 1986. Up to then, as it has been commented before, both countries remained backwards to each other in all political levels. However, it was later in 2002 when a Bilateral Agreement between Spain and Portugal governments was signed, the well-known as Treaty of

Valencia, that enter into force in 2004 (Morales, 2008). Later different meetings in 2006, 2008 and 2009 have taken place for making the recent national institutional frame of cross-border cooperation between Spain and Portugal (Covas, 2009).

In the 1990's decade a progressive enhancement of protocols started at regional level from the most intensely related regions. The first one was between North Portugal and Galicia with a working community created in 1991, followed by the Protocol of Cooperation between Extremadura Autonomous Community and the Regional Commission of Coordination and Development (CCDR) of the Alentejo in 1992, and between the Castilla León Autonomous Community and the Regional Commission of Coordination and Development of the Center in 1994. The last ones were the Protocols of Cooperation that the Andalucía region signed respectively with the regions of Algarve, in 1995, and with Alentejo in 2002. These regional protocols gave place to two parallel Working Communities Andalucía-Algarve and Andalucía-Alentejo. Both with the same objectives, lines of actions and the same institutional structure formed by a Presidency, a Council of Communities, and Coordination Committee, and different Sectorial Committees. In 2003 the three regions joined in a permanent structure common to the three regions, the Cross-Border Initiatives Cabinet, GIT (an INTERREG III A 2000/2006 Project funded) (Junta de Andalucía, 2012; Morales, 2008)

Parallel to the regional cross-border institutional arrangements, the European Regional Policy has implied the economic and police enginery through which the cross-border cooperation between Spain and Portugal has been possible. The European Territorial Cooperation has translated in this cross-border region in a long-term policy of cross-border development throughout the implementation of the INTERREG A programmes. The general purposes are to encourage the cooperation between these countries and to overcome the disparities across their closest regions. The specificity of the border between Spain and Portugal makes crucial to achieve better living standards for the population and to encourage conditions for socioeconomic development in these historical marginalized regions at both sides of the border.

The first INTERREG I A Programme in the cross-border region started with the launch of the Programme at European level in July 1990, what places the Spanish and Portuguese border among the oldest beneficiaries of European Territorial Cooperation Policy. The International bridge of Guadiana was fruit of the first INTERREG I and one of the most important

achievements for cross-border cooperation between the Andalucía and Algarve regions. Nevertheless, the first INTERREG I 1991/1993 and INTERREG II 1994/1999 were principally pilot programmes and a training period for cooperation that encountered with the lack of cooperation culture at all political levels, the differences of the political-administrative structures of the regions of both countries, and the differences of the national legal frames (Rodríguez, 2011). The European instrumental machinery implied indeed an experimental opportunity in an inhospitable border area in terms of political and economic cooperation. Both INTERREG I and II prepared the terrain for farming the land with future INTERREGS. The major achievements were the permeabilization of the border with constructions of important infrastructures and the initial establishment of institutional relations. However, this period of cross-border cooperation did not imply a true cooperation between institutions lacking of a long-term planning (Herederos & Olmedilla, 2010). It failed in the principle of subsidiary and in the development of common cross-border projects (Cabero, 2002). Consequently, the INTERREG 2000-2006 implied a new period of cross border cooperation in the border region not only for the continuation in the improvement of infrastructures, but also for stressing in the investment of common projects with real impact in the society of the border regions. The last period of INTERREG has translated into the Programme POCTEP (Operational Programme for Cross-border Cooperation: Spain – Portugal, 2007-2013). Like the previous INTERREG III, this period is characterized for the improvement of practices, relations and projects for real cross-border cooperation. Both INTERREG 2000/2006 and 2007/2013 have implied the increase of funds toward the less favoured socioeconomic actors in the cross-border region (Rodriguez, 2011). The priorities of the POCTEP are the promotion of competitiveness and employment; environment, patrimony and risk prevention; territory planning and accessibility, institutional and socio-economic integration and assistance to cross-border cooperation process. Under these priorities, in the area AAA the programme makes especial emphasis in the infrastructure and planning of Guadiana basin for tourism development, improvement of cooperation in scientific and technological systems, and consolidation of the new AAA working community. The POCTEP started under the crucial conceptualization of second generation projects. A renew cross-border cooperation based in two big objectives: the cooperation must be concentrated in bigger projects with complementary smaller projects, regarding the previous boom of small projects; and to have a clear and visible impact in the cross-border citizenship. What means a better structured strategy between project partners at both sides of the border (Covas, 2009). The Table 42 shows how the intensity of projects approved by the INTERREG Programmes 2000/2006 has

diminished considerably in the new period 2007/2013, where the projects of POCTEP programme are considerable bigger. More than half of the participants in those projects are regional institutions; only 2% percent are national institutions while the rest of institutions belong to local level followed by institutions that represent a province or a county.

Most of the cross-border cooperation between the regions of Alentejo, Algarve and Andalucía have been channelled through the projects funded with INTERREG III and POCTEP, for instance the Cross-border Initiative Cabinet was funded with INTERREG III and POCTEP consecutively. Finally, under the POCTEP funds the project, the GIT was restructured into a new Euroregion for the cross-border cooperation between the three regions. The two working communities between Andalucía and Alentejo and Algarve respectively implied to a certain extent a parallel strategy for the region of Andalucía. The intensity of institutional relations brought force the need to unify this institutional triad. The Eurorregión AAA was then officially launched in May 2010 (BOE, Boletín Oficial del Estado 2010; DR, Diário da República, 2010). In its constitutional documents the Eurorregión has a standard structure similar to other Euroregions previously created between Portugal and Spain (Euroace and Galicia-Norte de Portugal) and other Euroregions in Europe. It adopts the role of the main dynamizer of the border territories and their socio-economic development. Its formation symbolizes an inflection point as the culmination of a long period of cross-border cooperation between the three regions and as a new period for becoming in the most important institutional actor in the cross-border region.

In the last decade, other institutional cross-border cooperation took place at local level independent from the European Territorial Cooperation funds. In the cross-border region emerged three different initiatives that represented an initial institutional local network though none of them finally succeed into mature local structures of cross-border cooperation. Originally they all were created as inter-municipal cross-border associations. The biggest and oldest was ANAS (Asociación para el Desarrollo del Bajo Guadiana) that takes the name from the old roman name of Guadiana. ANAS congregated the municipalities of the coastal area, all the municipalities of Algarve and 15 municipalities of the littoral of Huelva. A second association was RAYA/HORIZONTE 2006 that started from the agreement of cooperation in 2001 between different municipalities of the regions of Baixo Alentejo (Barrancos, Mértola, Moura and Serpa) and Huelva, in Andalucía (Aroche, Encinasola, Paymogo and Rosal de la Frontera.). Prior to its constitutions there were different agreements where more municipalities

were involved. Its objective was to promote the common sustainable development of the municipalities in consonance with the socioeconomic, cultural, historic, natural and environmental realities (DR, *Diário da República*, 2001). The Association launched an annual periodical journal named “Agenda Riana/Rayana” focusing in the diffusion of information related to all the aspects quoted before. The third association is the smallest but still active. A bilateral inter-municipal association, name ATAS was formed in 2000 (Turivia, 2012) between the closest neighbours across the border, Alcoutim and Sanlúcar de Guadiana. Nevertheless, the activity of these three cross-border associations has not succeeded in the long term. The limited political and economic capacities of local governments, the institutional asymmetries between the Portuguese *Conselhos* and the Spanish *Ayuntamientos*, and the lack of political commitment seem among the main reasons that have hamper what could be a bottom-scale cross-border cooperation, a sort of little Euroregions at local level.

One of the most notable aspects underlined by academics in the cross-border cooperation between Spain and Portugal is the institutional asymmetry between their political administrative regimes (Covas, 2009; Fernández, 2008). The different political administration has implied one of the main obstacles for the day to day relations in cross-border cooperation and subsequent development of projects. On one hand, Portugal has strong central political administrations; while in Spain the regional level have an important historical root and political power.

Portugal territorial administrative organization is composed by the state, municipalities and their associations, the *fregresias* and their associations. The regional administration is not developed and the territorial regions are governed by the Regional Commissions of Coordination and Development (CCDR) that represent the central government. They are decentralized services of the state that execute at the geographical level of region the government policies. At the local level, Portuguese municipalities are the city councils (*Camaras Municipaes*) that comprise all of them different *Fregresias*, which are municipalities, the small administrative division in Portugal. The city councils have competences in important fields like health, education, environment, foreign cooperation, energy, etc. The Spanish territorial and political administration is organized at local, province, regions or autonomous communities and the State. The competences of the regions reflect a high level of autonomy in field of energy, education, health, etc. The executive body are the autonomous communities that can take also other competences that the state delegates and

those not expressly attributed to the state. The executive body of the provinces is the Provincial Government (Diputación), that represents the set of municipalities within the province and carry out the State activities (Montero, 2008). The small demographic weight of the majority of Spanish municipalities makes provinces an important administrative level that compensates the small municipalities' capacities with those of the biggest municipalities.

Table 42: Approved projects in INTERREG PROGRAMMES 2000-2006 and 2007-2013

Southern Finland- Estonia	Nº projects	Spain Portugal Andalucía-Algarve y Alentejo	Nº projects	Total Nº projects
2000-2006 Interreg IIIA Southern Finland-Estonia	64	2000-2006 InterregIIIA Cooperacion Transfronteriza España-Portugal	141	205
2007-2013 Central Baltic Interreg IV programme Southern Finland-Estonia Subprogramme	35	2007-2013POCTEP: Programa Operativo Cooperación transfronteriza España- Portugal	30	65
Total	99	Total	171	270

Source: Author's compilation based on POCTEP (2012). INTERREG III A Southern Finland-Estonia 2000-2006 (2012), Central Baltic INTERREG IV A Programme 2007-2013 (2011).

Southern Finland-Estonia.

This type of structural administrative obstacles is not the case in the cross-border regions between Southern Finland and Estonia. Both countries have similar political administrative organization. The central and local administrations are the main institutional actors, being the regional dimension in a weaker and unclear position in the policy making of both countries. In the case of Estonia, since the reestablishment of independence the provinces or counties have acquired an ambiguous status that has provoked the continuous debate between appropriateness of the counties as the regional administrative sub-national units (Kettunen & Kungla, 2005). The institutional development of the provinces has not corresponded to the socio-economic challenges that they should afford as complementary to the national development and the weak municipalise capacities. However, the role of the counties is considered as the most suitable, considering not only the small and few capacities of the majority of Estonian municipalities, but also their role for the cross-border cooperation (Seep & Veemaa, 2010). In Finland, the subnational structures have been under continuous changes, in the last two decades. The policy capacities of the regional level have been strengthened due

to the EU accession as the main factor. Although, the central government level still exercises control over the implementation of regional policy (Kettunen & Kungla, 2005: 374).

As it has been described before the relations between Finland and Estonia have been very intensive and Finland it is the most dominant country in the Estonia political, economic and social space, since the country regained its independence in 1992. Prior to the stagnation of Finnish and Estonians relations during the Soviet Union period, Estonia and Finland maintained also a diversified net of institutional relations through the activities of the Estonian-Finnish associations and friendships formed in the beginning of XX century like the Soome Eesti Liits or Suomalais-Virolainen Liitto, the Eesti-Soome Üliopilasklubi or Virolais-Suomalainen Ylioppilasklubi, etc. This cross-border activity was later a ground for the flourishing initiatives between Finnish and Estonia during last decade of Soviet Union and the Estonia transition, like the Tuglas Society, the organization of the Estonia-filial Finnish people (Rausmaa, 2008).

The relations between the second Republic of Estonia and Finland have increased considerable since mid 90's. But with the Estonia accession to EU and NATO the bilateral relations went easier to a different level. Both governments and through different ministries have agreed a broad range of agreements of trade, environmental protection, education and social fields. From the initiative of both Prime Ministers, in 2003 a report was compiled with the proposal for cooperation between both governments. In 2008 a new report was launched named "The Cooperation Opportunities of Estonia and Finland 2008" (Blomberg & Okk, 2008) with new ideas and challenges for cooperation and a visionary scenery for Estonian-Finnish relations. All this formal and governmental cooperation is grounded in a myriad of Finno-Estonian relations. To account all the institutions from Estonia placed in Finland, and Finnish institutions in Estonia would be necessary other section, due to the extensive and diversity of transnational organizations and punctual activities that every year take place especially in the field of culture and education.

Restoration of institutional relations for cross-border cooperation where materialized soon through different institutional agreements concentrated in the south-east of Finland and north-east of Estonia. First, in 1995 was signed the Finnish-Estonian cooperation 3+3. The geopolitical position of Estonia and Finland in the Gulf of Finland sharing border with Russia, and the farness from the capital cities was common ground for a progressive agreement

between the Associations of Local Authorities of Ida-Viru (Estonia) with the Regional Councils of Päijät-Häme (Finland) and later Lääne and Jõgeva counties from Estonia, Uusimaa and Kymenlaakso from Finland (Rytilä, 1999). This multilevel network took the roots from the educational cooperation initiated in 1991 by the Lahti Adult Training Centre and Adult Training Centre TEAVE. With the integration of Finland in the European Union, the network started the new joint projects under EU funds. This structure was based in multilevel and flexible networks of institutional cooperation capable to involve citizens and other organizations through contacts, joint events and exchange of experiences (Radvilavicius, 2004). The cooperation was targeted to the creation of a local-regional institutional network operating in education, economy, environmental, administration development, and experience exchange in different areas. However, in the last years this institutional network has decreased its activity.

A second institutional network came up in the western and urban areas of both countries, the Helsinki-Tallinn Euregio. In 1999 was signed the agreement between the City of Helsinki, Uusimaa Regional Council, City of Tallinn, Union of Harjumaa County Municipalities and Harjumaa County Government representing the Estonian Republic. At the beginning it was an institutional network that in 2003 adopted a Non-profit Association structure. The main goal was to make the joint structure, a mediator and facilitator of cross-border cooperation, promoting relations and creating favourable conditions for cooperation (Rytilä, 1999). The new institutions were intended to be the bridge present in the social consciousness of many people and actors that cross the gulf of Finland. The objectives of the Euregio are targeted to the promotion and coordination of the administrative capacities of local authorities, the cohesion among the administrative procedures and to increase cooperation in the educational, research and entrepreneurial spheres (Maripuu, 2003). Under INTERREG III A soon the cooperation got plan in different projects like HUUTA “Prevention of drug usage and sexually transmitted diseases in Helsinki and Tallinn”; and PILET “Cross-border public transport network and ticket system” for providing a common integrated public transport planning (Euregio, 2006). Another relevant and representative goal of the Euregio is the the “Helsinki-Tallinn Science-Twin City Program”, intended to be a cross-border cooperation based in the potentialities of Uusimaa and Harjumaa regions as metropolitan and research technological areas (Radvilavicius, 2004). Fruit of this project was also the envisioning of a twin city named as “TALSINKI/HELLINA”, a synergistic development in administration level originated from the copulation of the two capitals. The Euregio is also ruling the project

of Rail Baltica project, the Tallinn-Helsinki permanent rail connection which has been applied in INTERREG IV A program (Kröger, et al. 2009).

The first INTERREG program applied between the Southern Finland and Estonia run from 2000-2006. It took a progressive process in two stages. In 2000-2003 the cooperation was carried out through the Southern Finland Coastal Zone INTERREG IIIA programme which was pursued to implement jointly with the Estonia Phare CBC programme. The 2004 year, when Estonia joined the EU, implied a transitional period with a complementing call of proposals to support Estonian activities that were parallel to INTERREG activities from the "old" Southern Finland Coastal Zone programme. Interreg Programme evolved to INTERREG IIIA Southern Finland and Estonia for the period 2004-2006. The priorities for this programme were: the promotion of interaction and networks whether at administration and social informal levels; employment and competitiveness; common environment; and special support for regions bordering candidate countries. The programme was finally a call for proposal with joint projects. Nevertheless, it was only an amendment to the implementation structures of the previous one (2000-2003), as the priorities and measures were intended not to change substantially. Most of the applications were handed in by the Finnish side with 101 project proposals out of 124 proposals. A total of 64 projects (see Table 42) were approved (INTERREG III A Southern Finland-Estonia 2000-2006, 2012).

In the next INTERREG program 2007-2013, the cross-border cooperation between Southern Finland and Estonia is one of the two sub-programmes of the Central Baltic Interreg IV Programme, together with Archipelago and Islands Sub-programme (Central Baltic INTERREG IV A Programme 2007-2013, 2007). The development of this second period of INTERREG projects have been also under the concern of achieving more projects of second generation nature. The priorities of this programme are safe and healthy environments, economically competitive and innovative region, and attractive and dynamic societies. The border area in this period has increased with the inclusion of Etelä-Karjala region (Finland) as a new adjacent area. This period characterizes also by the decreasing number of approved projects (see Table 42). Finland dominates also as lead partner in this period though Estonian lead partners have increased compared to the previous period. Regarding the nature of the institutional actors, there is dominance also of regional institutional actors with national scope mainly from the educational field, like Universities and Research institutions. In contrast to the border region AAA, the concentration of nation capitals and other important cities in the

border regions explain that the cross-border projects between Southern Finland and Estonia accounts with local actors as lead partners of the projects.

3.4.1. Twin cities agreements across the border.

By last, we summarise other different type of institutional cross-border cooperation at the margins of the European Territorial Cooperation. At the local level, the twin city agreement has been another extensive way to establish institutional relations in different aspects like cultural, commercial, etc. The Table 43 depicts the number of twin city agreements between the countries of interest, Finland, Estonia, Portugal and Spain, and their twin city agreement with other relevant associates like Sweden, Norway and Latvia in the border regions of SFE, or France, Italy and Germany for Spain and Portugal. Despite of being small nations, the number of twin cities agreement between Finland and Estonia is considerable higher than those between Spain and Portugal. The predominance of these kind of institutional bilateral cooperation at the local level can be explained by the loose political role of regions in Estonia and Finland against the higher political scope of local governments (Vihalemm, 2010).

Table 43: Twinning between countries

	Finland	Estonia	Sweden	Norway	Lativa	Total
Finland		260 22.9	308 27.1	168 14.8	9 0.7	1134
Estonia	241 49.8%		140 28.9	16 3.3	12 2.4	483
	Portugal	Spain	France	Italy	Germany	
Portugal		55 21.9	115 45.8	10 3.9	22 8.7	251
Spain	55 8.8%		387 61.9	87 13.92	30 4.8	625

Source: Author's compilation based on Kohalike Omavalisutste Portaali (2011a, b) and FEMP (2011). Estonia national data offers even a bigger number with a total of 281 twin city and county agreements with Finland.

It is remarkable the great asymmetry between Spain and Portugal. The twin city agreements of Spain with Portugal only represent 8.8% of total twin city agreements, even less than the twin cities agreements that Spain has with Italy. On the contrary, Spain represents the second country with which Portugal has signed twin city agreements after France. For both Portugal and Spain, France has stronger relevance among Spanish and Portuguese municipalities. However, this might not be understood as the preference toward France, but as a local pattern of networking across border influenced by the socio-economic and infrastructure situation.

The twin city agreements usually take place in the closest area between countries. All the cities agreements between Portugal and Spain are concentrated in the border line which is less populated area compared to other regions of Spain. The asymmetry of twin cities agreement between Estonia and Finland is also notable, though not so overwhelming like between Spain and Portugal. While in Finland there are more municipality agreements with Sweden, Finland represents the dominant country with which Estonians cities make twinning agreements.

The role that twin cities agreements have for the local institutional activity might vary greatly across border regions. In the cross-border region SFE these bilateral agreements are quite spread and involved some institutional relation along time. In 1998 for instance a 4% of Finnish-Estonian twin cities have frequent contact every week, 20% of these twin towns have more than 8 contacts in a year, the 38% had contact from 3 to 8 times in a year, a 33% had contacts from 1 to 2 times, and only 5% had less contact (Sillaste, 1998). In the cross-border region AAA, the twin cities agreements are less numerous and tend to remain only in their written friendship formality. However, the twin cities agreement have made a good previous level for institutional contacts in the cross-border cooperation, though the extent to which they work as networkers for cross-border cooperation is not well known.

CHAPTER 4: OBJECT OF STUDY AND RESEARCH OBJECTIVES

4.1. Object of Study.

In this thesis the object of study consists of analyzing how the construction of cross-border social capital takes place in two different cross-border regions of the European Union. There are many possible forms of social capital across border regions. The cross-border relations between citizens, commuters and enterprises are a relevant aspect in the study of how cross-border regions might emerge as a continuum of sociability, identity or entrepreneurial activity. The institutional cross-border cooperation and the agency of its actors (professionals and institutions) is the official form of this cross-border social capital which is relevant for the top-down envision of a continuum in the political and socio-economic policies across the border regions. In this case, we focus on the study of the cross-border relations between those people who have more and specific experience at working in the institutional cross-border cooperation who are named as experts; and in the study of the institutional cross-border relations build up from the institutional participation in the projects of cross-border cooperation programmes within the European Territorial Cooperation objective. As it was explained in the previous Chapter 3, this research takes in two different scenarios for the study of this cross-border social capital: one is the cross-border region formed by the Portuguese regions of Alentejo and Algarve, and their neighbour Spanish region of Andalucía; the other is formed by the Southern region of Finland and Estonia.

The purpose of this research is first to ascertain the possible forms of institutional social capital through the analysis of the institutional relations that are formalized by their participation in projects of Interreg programmes 2007-2013. And second, to ascertain the type of cross-border social capital among those people who by their professional profiles are more related cross-border cooperation, that is, experts in cross-border cooperation. For doing so, two main dimensions of social capital have been explored. On the one hand, the cognitive dimension of social capital have been analyzed through different indicators (like trust and identity feeling) with the experts in both cross-border regions. On the other hand, in the structural dimension of social capital we have analyzed the personal networks of the experts and the institutional relations of those institutions participating in Interreg projects.

This study does not aim to make inferences or to extrapolate the results to general patterns of cross-border relations and cross-border social capital in other cross-border regions. However, the results will be significant to motivate future researches in other cross-border regions in this line, and to relate the study of cross-border social capital to the European integration process.

4.2. Research objectives.

CHAPTER 6:

Objective 1:

To analyse the experts' main socio-demographic characteristics by country in order to offer a general picture of how experts are and the relation or influence between experts' personal competences/facilitators like language and CB living in their identity feelings.

Objective 2:

To characterize and compare by country the experts' level of trust in institutions and identity feeling.

Objective 3:

To identify and analyse the nature of the experts' cross-border networks. Number of cross-border relations and Nature (intensity/ work/ family) of those border relations and to identify the type of networks present among experts.

Objective 4:

To analyse the influence of the experts' personal competences like language and cross-border living in their cross-border networks.

Objective 5:

To analyze the role of the cross-border ties in their personal network structure.

Objective 6:

To analyse and describe the opportunities that the experts perceive from their cross-border contacts and the types of support that they received from their cross-border ties.

CHAPTER 7:

Objective 7:

To analyse the two complete network structures among institutional actors, using social network analysis, and the characteristics of the institutions members of the network.

Objective 8:

To identify those most important actors, and to analyse their role in the network structure of cross-border cooperation in both cross-border regions.

Objective 9:

To analyse from the experts' opinions the institutional relations measured in terms of intensity and quality.

Objective 10:

To analyze the role that plays the Euroregions by their position in the network structures of cross-border cooperation of the subprogramme Southern Finland-Estonia and Alentejo-Algarve-Andalucía, and by the experts' opinion about the role of the Euroregions and their performance in their cross-border region.

CHAPTER 5: METHODOLOGY AND RESEARCH DATA

From its origin the sociology faces the complexity of social reality through a myriad of different methods and techniques (Boudon & Lazarsfeld, 1985). This methodological pluralism or the complementary use of different methods is in many cases a desirable and a pragmatic decision for the design of any research project. This study is an exemplary work of mix-method research. This chapter, on one hand, explains the methodological design of our research, and the selection of techniques. On the other hand, it tackles the description of the whole process developed for the fieldwork, its design and its implementation at the very detail, as well as the final process of data collection and analysis. It is then a descriptive methodological compendium but at the same time explains the reasons that argue in favor of the methods and techniques used.

5.1. Design of the study and methodology.

It is well known in the field of social sciences that the combination of different methods and techniques of research constitutes a guarantee to achieve a better apprehensive knowledge of the object of study. The cognitive pluralism of the social reality has demanded not the use of a method but the combination of different methods or approximation ways which make possible the analysis of the different facets or dimensions of the same social phenomenon (Beltrán, 2000). Furthermore, the complexity of the object of study in social sciences demands a plural rapprochement to its pluralistic nature. In the social reality the relation between what is considered as causes and possible consequences are not unidirectional and isolated from other possible relations. On the contrary, there are multiple, possible and multilateral relations crossing in time and space coordinates which is not other thing but the causal complexity of the social reality and inherent to social research. What practically claims for an inevitable use of different methods. Thus, the multidimensional character of the methodology or the methodological pluralism in this thesis obeys to the complex nature of our object of study which is not an exception in the study of any social phenomenon.

Consequently the triangulation constitutes the most suitable and accepted way (Bryman, 1995). The triangulation is not more than the simple premise that every research method has its own flaws that can hamper or incite a partial character in the analysis in one or another manner (Brewer & Hunter, 1989). It results to be a practical tool applicable along the whole

research process that combines different levels of analysis, theories, methodology, etc. In this research, it implies the use of different and multiple methods in order to get a solid data from which to infer the interpretations and conclusions in the fairest manner. This combination of different methods in the study of whatever phenomenon rests on the premise that the weakness of every single method can be compensated by other method's strengths (Cresswell, 2008), and in the demand of the object of study (Valles, 1997). The use of both qualitative and quantitative methods permits to reach to a more suitable methodological combination, though it will be adjusted to the research objectives in every research study. Thus, what in a beginning is the parallel use of different methods, it becomes in an integrated analysis and conclusion in a final phase where the different results and data are combined.

Accordingly, first the design of this study relies on a comparative analysis of the cross-border cooperation in two different cross-border regions from social capital theoretical and empirical perspectives. In social sciences, practically any kind of research implies a comparative analysis, more explicit or not, more complex or not, with theoretical types or with cases taken from the reality. That what we call as comparative sociology is indeed sociology itself (Beltrán, 2000). The comparative method oscillates between two traditionally strategies, the study of cases and the study of variables. The first one is granted by the comparative method and the second by the statistic method (Caïs, 1997). In this work two distinctive cases are targets of research, what makes clear that the comparative approach is a study of cases. Far away from the statistics like in the study of variables, this research follows the logic of explanation and interpretation of those social phenomenons of interest trying to find possible empirical relations.

The comparative approach seems also the most appropriate method in the context of European studies. The European Union has put at a common stage an immense set of different case studies from the different contexts of its country members. Equally the European Union implies an infinitive arrange of interdependencies, networks and relations. This structural condition of the European Union and its county members influences in any research purpose to be imperatively comparative. This work searches for those similarities and differences on the same phenomenon in two different contexts within the European Union. The comparison is based in two different cross-border regions and how the process of cross-border relations using social capital framework, takes place. We use as well the comparative perspective between the national characteristics of the four countries involved in this research.

Beyond the historical and useless dichotomy between the quanti and quali perspectives in the academic scholarly, it is recognized that the combination of quantitative and qualitative methods provide a more pluralistic approach to the social reality. (Vallejos, Orti & Agusdo, 2007). Both are complementary approaches to the same social reality and in this study both qualitative and quantitative analyses are concomitant. On the one hand, the quantitative analysis pursues the objective measurement of social phenomenon, the principle of causality and the formulation of general trends in the analysis of the social reality (Cea, 1996). The quantitative methods aim the precise measurement and to verify the applicability of hypothesis or the description of social phenomena susceptible to be analyzed through numbers. This approximation permits an extensive analysis of the social reality, though the researcher and the object of study are distant. On the other hand, the qualitative methods offer the best way to get an accurate approach to the particularity of every context, as both the researcher and the object of study share the same context and are proximal. The qualitative analysis aims for the more meaningful content from the non-structured discourses of informants and can provide more substantial information than the quantitative ones, which represent the iceberg effect of the social reality (Gummesson, 2000). The former are endeavoured to the interpretationist and more holistic comprehension of individual's discourse taking into account the context and other presumable data, in contrast with later ones that pursue the statistical proposal of general laws. The qualitative approach allows not only descriptions of actors, institutions and situations, but also to ascertain possible typologies, to establish relations between different phenomena that would not have sense through quantitative cross-tabs, but that could pave the way for later quantitative studies with bigger samples (Beltrán, 2000).

By other hand, in the study of social capital, the qualitative methods provide a more comprehensive perspective to the traditional quantitative analysis of social capital commented in Chapter 1. This is precisely one of the most consistent critics to Putnam's school, based more on quantitative data like the voting turnout, the associational density, etc. than on techniques that can explain the different and complementary assets of social capital.

Nevertheless, the social phenomena have other dimensions which are susceptible for quantitative methods, as the amount, increase or decrease of certain aspects are also of relevance to apprehend the social reality (Beltrán, 2000). The quantitative measures have been

applied and are complementary to qualitative techniques. The scope of this study is from an international level to a more regional and local level, what requires the use of standardized data, basically collected through quantitative surveys from secondary data. This will permit possible comparative analysis between different regions as is the case, cross-national and cross-regional analysis. The use of quantitative data has turned out as the most feasible manner to make comparisons across borders. Thus, in this research different sets of quantitative data is taken from secondary sources and the data analysis will permit cross-border and cross-national comparisons of specific relevant indicators related to this study. Normally, the use of secondary data is necessary for the macro analysis of the social structure of societies (Beltrán, 2000). Equally the primary data collected ad hoc by the researcher is discussed under quantitative analysis, which later on is complemented with qualitative analysis.

By last, the study reflects a transversal and longitudinal analysis through the main techniques, used the semi-structured interviews and secondary data. On the one hand, part of the conclusions extracted obeys to a “sociological picture” taken during interviews from social processes. However, the data collection is more about a punctual empirical work. The content of the data refers to years of cross-border personal relations, and institutional cross-border cooperation that have occurred along time and are manifested in a retrospective way by the informants. The data analysis extracted from the secondary data obeys to different social and institutional processes and dynamics of cross-border cooperation that have occurred along years. Summarizing, with the multimethod methodology, this work aims a descriptive and exploratory approach to different cases that searches for general similarities and/ or differences in the process of building of cross-border social capital in two distant cross-border regions

5.2. Techniques for data collection.

What follows through different sections is the detailed description of the techniques for data collection, the instruments applied in this research to the experts and institutions that constituted the units of analysis, and the analysis applied. The secondary data and semi-structured interviews have been applied for collecting quantitative and qualitative data. The techniques of analysis used are first, content analysis for the qualitative information gathered with semi-structured interviews to experts; second, the quantitative analysis carried out both

with the semi-structure interview to experts and the network analysis applied to the experts and institutions networks. The combination of the qualitative and quantitative analysis of the interviews and the quantitative account of the institutional networks from the secondary data, permit the mapping networks with their meaning content for the study of cross-border personal networks and institutional cross-border networks.

5.2.1. The secondary data.

In this research there are two big groups of secondary data used. The first obeys to different types of secondary sources that have been analysed for descriptive purposes. This group of data is used for the general description of both cross-border regions and the contextualization of the study in the Chapter 3. The second group of data refers to the running or approved projects of cross-border cooperation carried out during the period 2007-2013 in the area Alentejo-Algarve and Andalucía (AAA) of POCTEP, and in area Southern Finland–Estonia (SFE) of Central Baltic Interreg IV Programme 2007-2013.

5.2.1.a. Data collection and analysis for the contextualization and description of the cross-border regions.

For the presentation of the two cross-border regions it has been necessary to gather secondary information from a different range of matters that could permit the comparison of both cross-border regions in their demographic and socio-economic characteristics. This information has been collected in order to offer a brief description in the Chapter 3 of both cross-border regions that contextualizes the later analysis of cross-border social capital. Accordingly, the majority of the secondary data collected pertains to international and European databases, but also to national databases when there is not available international and comparable data concerning the issue analysed.

First, from the database of Eurostat statistic data (2012a, b, c, d, e; 2013) has been collected data at the level of Nuts II and Nuts III on population, and other non demographic indicators, cross-domestic product (GDP), employment and unemployment, poverty, education, and research and development. Second, it has been collected data for the description of both cross-border regions in terms of trust and confidence and other related data to examine the threshold for social capital and cross-border cooperation. From the database of the World

Values Survey (2012) it has been collected at the national level information regarding the people's social trust and satisfaction the way democracy develops, and political confidence in different institutions (government, parliament, political parties, European Union). The Transparency International (2012/2013) displays data of the corruption indexes that have been compared here also. The results from the Eurobarometer (2010) offer the level of awareness and perception of the regional policy in each country.

Third, for the analysis of opportunities for social interactions and social capital construction, we have targeted to national databases like Statistics Estonia (Eesti Statistika), Statistics Finland (Tilastokeskus), Spanish Statistical Office (Instituto Nacional de Estadística), Portuguese Statistical Office (Instituto Nacional de Estatística), and other data that under specific requirements for this research has been ceded by different national institutions like the OAPEE (2012) from Spain (Organismo Autónomo de Programas Educativos Europeos) or the Archimedes Foundation (2012) from Estonia. With the information gathered from these national databases we have described the possibilities for transport and connectivity across both cross-border regions, the educational exchange through Erasmus programme between the neighbour regions, and the national residents living in the neighbour region. By last, with national data from the Kohalike Omavalitsuste Portaali (2011) and FEMP (2011) we presented the existing cooperation between the twin cities in both cross-border regions.

With the data collected we proceed with a quantitative analysis for the merely description of different characteristics of both cross-border regions. Some of the data was collected and presented in tables without any processing work. Other data was processed with quantitative analysis necessary for the intended description.

5.2.1.b. Data collection of projects from Interreg IV programmes of cross-border cooperation.

In this section we describe the data used for the construction and analysis of two complete and objective network structures of institutional cross-border cooperation in both cross-border regions. The data was collected from the secondary data available in the multi-annual programmes of Interreg IV 2007-2013. This secondary data refers to the running or approved projects of cross-border cooperation carried out during the period 2007-2013 in the area Alentejo-Algarve and Andalucía (AAA) of POCTEP and in the area Southern Finland–

Estonia (SFE) of Central Baltic Interreg IV Programme 2007-2013. The first one corresponds to the area Alentejo-Algarve and Andalucía (AAA). This cross-border region is one of the five subareas of the Operational programme for cross-border cooperation Spain-Portugal, 2007-2013, known commonly as POCTEP, besides the cross-border regions of Galicia-North, North-Castilla León, Centro-Castilla León, and Alentejo-Centro-Extremadura. This programme is the successor of the previous Interreg IIIA Programme where the area of Andalucía-Algarve and Alentejo was previously named Sub-region 5. The other sociocentric or complete network corresponds to the institutional network formed in the cross-border region of Southern Finland–Estonia (SFE). This cross-border region is one of the two subareas and subprogrammes of the Central Baltic Interreg IV Programme 2007-2013. The subprogramme Southern Finland-Estonia and the Archipelago and Islands Sub-programme complete the cross-cooperation between the four Baltic countries involved in the general programme (Sweden, Finland, Latvia and Estonia). The sub-programme Southern Finland-Estonia results is the successor of previous Interreg IIIA Southern Finland-Estonia, though in the period 2007-2013 is integrated in the Central Baltic Interreg IV Programme 2007-2013.

For the data collection and later construction of the two complete networks of cross-border cooperation it was not used any instrument of research like the name generators in the analysis of the experts' personal networks. As both complete networks are based in the objective data obtained from the archives of both programmes of cross-border cooperation (Central Baltic Interreg IV A and POCTEP). Contrary to the data obtained by surveys of questionnaires, the archives do not require an expensive cost, and in the analysis of international networks the data of archives are commonly used (Marsden, 1990). In the case of sociocentric networks of public policies is indeed an easily accessed database.

The database of the approved or running projects consists on the project basic profile which was electronically available in both subprogrammes. Every approved project contains the information of the institutions that participate. As both programmes belong to the European Territorial Cooperation (Regional Policy-Inforegio, 2012), they have similar structure and proceedings, what permits to compare and make the network structures of institutional cross-border cooperation.

The unit of analysis is formed by the institutions and organizations. That is, each of the participant institutions in the projects of the Operative Programmes 2007-2013 of European

cross-border cooperation in each cross-border region. Here are included a different array of public institutions like local and regional governments, universities, NGOs, consultant agencies or foundations. They are all applicants and beneficiaries of approved projects, whether as lead partners (chief applicants) or partners. Once those institutions from each country have got the approval of the projects they entered in a process of cross-border institutional relations and management with their respective partners or counterparts at the other side of the border.

The sample and the universe of the participants institutions in these projects coincide, as the sample comprehends the total number of institutions of all the projects approved within the both subprogrammes Southern Finland-Estonia and Alentejo-Algarve-Andalucía (see Annex 5 with all the participant institutions). The Table 44 shows the number of projects funded in each sub-programme and the number of institutions that participate in those projects. The number of projects in the both cross-border regions is approximated. The projects of the subprogramme Alentejo-Algarve-Andalucía were financed and approved in two project calls. In the first call a total of 12 projects were approved, and in a second call a total of 18 projects. However, the number of 180 participant institutions in the Southern Finland-Estonia subprogramme is much bigger than the number of participant institutions in Alentejo-Algarve-Andalucía.

Table 44: Number Projects executed and in process and participant Institutions

Subprogrammes 2007-2013	Nº projects	Nº of Institutions
Southern Finland-Estonia Subprogramme	35	180
Alentejo-Algarve-Andalucía Subprogramme	30	88
Total	65	268

Source: Author's compilation based on Central Baltic INTERREG IV A Programme 2007-2013 (2007) and POCTEP (2012).

From the total number of institutions and their participation in projects was possible to construct the complete network structure of the institutional cross-border cooperation in the context of interest. The data of both institutions and projects permits to make a network analysis named also as sociocentric network analysis. The purpose is not to study the position of specific nodes and its relations to study self-interest behaviours, but rather to study the whole set of relations existent in a community or bigger group of actors, the dynamics of

power or centrality, the existence of key actors with the whole network, or the position of those nodes of interest in the research. This analysis will be targeted in the Chapter 7.

5.2.1.c. The network analysis to institutions (socio-centric-complete networks).

According to the project data we could construct a data array classifying the information by: the number of projects; the institutions' members; the country of origin of each institution; the type of institution, that is, if the institution is a public administration at local, county, regional or state level, an enterprise, and nongovernmental organization, foundations or consultancy agency; and if the institutions participating were lead partners or simple partners. To be the lead partner of the project implies that the institution has the responsibility of the whole project life and is the main actor in the group of institutions participating. This information permitted to make a simple statistical analysis of the profile of all the participant institutions.

Later we constructed a symmetrical matrix in order to get a graph of the cross-border network structure of each sub-programme. Both sociocentric networks analysed correspond to the formal networks promoted under the objective of the European cross-border cooperation, through the Operative Programmes displayed in different European cross-border regions. Following Knoke and Kuklinsky (1982) we had the components for the network analysis. The nodes were the participant institutions and the relations between these institutions that are objectively defined by their joint participation in a certain project of cross-border cooperation. With the use of network analysis we examined the network structure with measures of centrality like the degree and betweenness. We identified the key position of certain institutional actors in the cross-border network structure of both sub-programmes that made them to be those bridging actors. By last, with measures of subgroups like cut points and lambda bridges (see Chapter 2) we identified those key institutions that could be considered as the most important in both complete networks. For the analysis of the networks of the institutions, as well as the experts' networks, we have applied one of the most common software for the network analysis, UCINET, version 6.0 (Freeman, 2004; Borgatti, Everett & Freeman, 2002). For the visualization of the complete network formed by the institutions we used NETDRAW, that is, an application integrated in Ucinet for the creation of graph images. This visualization permits to traduce the mathematical algorithms of network analysis into a visual sign system (Krempel, 2011).

5.2.2. The interview to experts.

The semi-structure interview contains structure and unstructured sections with standardized and open-format questions. It is a useful method of obtaining information from experts during the early stages of a research project (Walliman, 2006). In this work, the semi-structured interview has consisted in a complex instrument for the data collection that has two main parts. The first part of the interview was an interview guide or questionnaire that uses semi-structure and open questions related to the experts' biographical data, and opinion regarding cross-border networks and cross-border cooperation. The second part was a module for the network analysis that included a name generator and a name interpreter.

The name generator and name interpreter are recent network methods for eliciting different types of people's networks and collecting information of these networks or contacts (Çarkoğlu & Cenker, 2011). The name generator is employed normally for the study of ego-networks and consists of a measurement technique based on reporting a list of people with whom the respondent maintains relations—ego ties with alters—and the relations among them—relations among alters- (Lin, 2008; Lin & Erickson, 2010). The name interpreter of personal networks consists of a survey with questions about the people cited in the name generator (Burt, 1997b). It constituted a section added to the name generator designed to obtain different information of the listed contacts, like personal data, or information about the respondent's perception on attributes of the contacts listed, or information about the relationships that the respondent has with the contacts listed, like intensity or type of relations, etc.

Although it has been adapted from previous researches, the first version of the semi-structure interview was previously used in a research project where the author of this research was involved (González & Gualda, 2010; Gualda & González, 2010; Fragoso et al., 2011; Gualda et al., 2011; Lucio-Villegas et al., 2011; González et al., 2011). Equally, the name generator and name interpreter for the analysis of personal networks have been used in previous studies (Gualda et al. 2008). Nevertheless, the semi-structure interview was adapted accordingly to the new criteria and objectives of this research and it was redesigned ad hoc for this research. A final version of the semi-structure interview (see Annex 1) has the same structure, though it changed especially the semi-structure questions.

In the first part of the interview, a first group of data refers to sociodemographic data of the respondent. A second group of questions were targeted to inquire about the respondent biographical and relational data related to the cross-border region and the cross-border cooperation like institutional trust, identity, the experts' attachments to the cross-border region, the experts' relations with people from the neighbour border country, etc. The last group of questions pursuit to know the respondent's opinion on the institutional cross-border cooperation developed in their cross-border region.

The second part, with the name generator and name interpreter, was designed in order to study the structure of the personal networks of each respondent based on their regular contacts from personal, professional and social relations. The name generator consisted of recalling up to 25 people with whom the respondent normally has relation independently of the way of contact, the type of relations or the origin of contacts. The name interpreter consisted of collecting the personal data of these people and of the relations that the respondent has with them (see Annex 3). The following attributes of the ego's relations (alters) were collected: the sex, the origin of the alter, the durability of the ego's relation with the alters, the intensity of the relation (where 0 was never and 6 was daily), the type of relation (if the contact was a friendship, family, work, known, neighbour or other), and the type of support received from the contact (1. Personal, 2. Material, 3. Helping in some tasks, 4. Diversion, 5. Positive Feedback, 6. Negative Feedback, 7. Difficult situations, 8. Reciprocity) according to the support scale of Barrera (1980).

5.2.2.a. The data collection of experts-respondents.

The individuals who were interviewed were named in this research as experts. This term is ascribed to the profile of professional in cross-border cooperation and it will be used from now on throughout this work. The notion of experts has been used in other researches related to policy analysis and cross-border cooperation (Fürst & Kilper, 1995; Grix & Knowles, 2002; Grix & Houzvicka, 2002; Pikner, 2008; Lepik, 2009; Gualda et al., 2008; González, 2012; González & Gualda, 2013; González & Gualda, 2014). By expert we consider professionals from different public and private institutions who have or have had professional experience in cross-border projects of Interreg A programmes for cross-border cooperation in the European Union and in other type of cross-border initiatives at the margin of the European Territorial Cooperation. Most of these experts work in public institutions, whether at regional,

county/province, or local levels, which are members or beneficiaries of cross-border projects within these programmes. The professional profile of the experts varied in a wide range of project coordinators, local development managers, local mayors, representatives of cultural and academic institutions, representative of entrepreneurial institutions, etc.). Among these professionals, some of them are also professionals working for the Euroregions operating in each cross-border area. These experts working in the Euroregions are representatives of regional or local governments who were members of the Secretary/Board of the Euroregions. Within this term are also included some professionals who are not directly involved with Interreg projects, though they had long experience in institutional cooperation and their work was based in the cross-border cooperation with the neighbour country, like some experts from consultancy agencies or cultural institutions.

Regarding the definition given of experts, there is not possibility to know an approximate account of the professionals who work in the institutional cross-border cooperation or an account of the professional working in those institutions that participate in Interreg projects. Furthermore, so far there is not such a kind of institutional cross-border cooperation registers or directory of professionals working in projects within the operative programmes for European cross-border cooperation. Even if so, it would be a costly task to revise and actualize a register considering the dynamic of professional mobility. Thus, from an unknown universe of experts, and the qualitative nature of the research it was not possible and convenient to do a random and representative sample, but a theoretical sample following the criteria of theoretical sample. The theoretical sample is that based on the selection of cases until the researcher gets redundant information and can develop a theory (Eisenhardt, 1989; 1991). There is not a formal or appropriate number of cases that a theoretical sample should contain. Therefore, the size of the theoretical sample is given by the criteria of saturation proposed by the founders of the grand theory (Glaser & Strauss, 1967), that is, the extent to which the researcher considers that the number of cases selected provide sufficient and/or redundant information. The researcher is who limits the sample when he/she does not find, foresees, or thinks of new cases that might add new information or data.

Besides the criteria of experts' definition, the research contemplates other criteria for the sample selection based on Elorie (2009). The geographical criteria, so for the sample those experts from institutions located in the closest area to the border were prioritized. The institutions where they worked were those most involved in cross-border relations. In the

cross-border region AAA most of the experts pertain to the closest area to the border, that is, the programme area, though regarding the relevance of the regional institutional some other experts pertain to adjacent area of Seville. In the cross-border region SFE all the experts belong to institutions within the adjacent area. By the institutional criteria, the sample took into account those more relevant institutions, known between experts. Most of the institutions where these experts belong have participated in projects of European cross-border cooperation, and some others have very long experience at promoting cross-border relations. By the relational criteria, those experts who were cited by others were potential respondents to be included in the sample.

Nevertheless, for this research it was planned from the beginning to carry on a minimum of twenty interviews in each cross-border region equally distributed by countries. As the purpose was to get a theoretical sample of experts, no gender and age criteria were considered in the selection of the informants. On the contrary, it was important to get a sample of experts with experience in cross-border cooperation and to gather the possible differences according to their knowledge of the language from the neighbour country, their feeling of identity or presence of cross-border networks in their personal network structure.

The Table 45 shows the distribution experts sample interviewed. A total amount of forty five semi-structured interviews were done across the four different countries of the both cross-border regions. The second part with the name generator for obtaining personal networks of interviewees was applied to those who agreed to report personal and relational data. Due to the difficulty of reporting personal data and time limitations, the sample of the experts' network analysis is a bit smaller from the sample of the questionnaire with semi-structure questions. A total of thirty six experts out of forty five participated at reporting their personal networks in the name generators. Although this study does not aim to make inferences to general patterns of cross-border relations in both cross-border regions, the results of our qualitative and quantitative analysis here could provide meaningful information to continue in this line in future research with bigger samples.

Table 45: Sample distribution in border regions AAA and SFE

Cross-border regions	Alentejo-Algarve-Andalucía (AAA)		Southern Finland Estonia (SFE)		Total
Instruments	Spain	Portugal	Estonia	Finland	
Qualitative part of the interview	11	11	12	11	45
Name generator of the interview	9	9	8	10	36

Source: Author's compilation from fieldwork.

5.2.2.b. The selection process of experts.

The selection process of interviewees encountered the difficulty of reaching to available professionals who work mostly in public administrations but also in private institutions.

First, the researcher's participation in a previous research project in the cross-border region of Alentejo-Algarve-Andalucía, the researcher's attendance to different institutional meetings, seminars related to cross-border cooperation and Interreg programmes in each cross-border areas, and the researcher's participation in different congresses were the initial step in the selection process of interviewees. Second, the available data on Interreg Projects in the respective operative programmes POCTEP and Central Baltic Programme Interreg IV A, provided public contact information of the leader institutions and those professionals responsible of the projects.

This initial data for contact, and the informants' contacts due to the relational criteria were used in the process of the sample selection through the snowball technique. With the snowball technique is possible to achieve a theoretical representativeness of the sample (Biernacki, & Waldorf, 1981; Goodman, 1961; Heckathorn, 1997). It is the appropriate technique in the case that the population cannot be delimited, when the target population has very specific or particular characteristics, and when the qualitative research refers to the study of behaviour, opinion, where it is more important to extract general patterns than to get representative data (Drăgan & Isaic Maniau, 2012). This technique was very useful in both cross-border areas as several, of the interviewees knew among them through their participation in Interreg projects and through professional relationships maintained along time.

It was normal that in the first interviews, new contacts for next potential interviewees were got, which facilitated significantly the fieldwork. Successively, from the previous interviews was possible to get access to other potential experts in the four countries to be interviewed

thanks to the facilities of email directions and advices given from the previous interviewees or other experts. It happened that when the contact was done through this relational or network criteria (the recommendation of some professional) the majority of experts answered. The appealing factor of networks was blatantly influencing in the calling process for these interviews. Through the Interreg projects database it was possible also to contact some other experts directly involved in Interreg programmes. At the same time, after the researcher's participation in some institutional events related to cross-border cooperation (for example: the Forum on Common Media Space organized by Euroregio Helsinki-Tallin in Tallinn, in 2010; or the Conference "Future of the European Policy of cross-border cooperation: Financial Perspectives and Euroregions", held in Huelva in 2011) was possible to meet other potential informants.

The majority of the experts were contacted later through the snowball sampling by emails. In the first email contacts, a letter of presentation was sent to potential interviewees so they could have a brief idea of the research objectives and the process of the interview. The appointment was agreed in consensus to the suitable date for experts. The majority of the interviews were done in the working places of the interviewee and in some cases proposed by respondents in public places like cafes or restaurants. In the sample gathered, five out of 45 interviews were done in other different places (a library bar, a restaurant or a language school). In these cases the informant proposed to do it in a different place from their work-place for more convenient reasons. During the interview, the respondents were informed about the objectives of the research and the content of the questions. All the interviews were recorded with previous consent of respondents and clarification of the anonymity of the interview. The average of time for each interview was one hour. The interviews time-length varied from 20 minutes in some cases to almost two hours in one case. The majority of interviewees used to put some time limitation for the interview. Therefore, in some cases (37 out of 45) the second part with the name generator, for personal network analysis, was not filled or partially filled during the interview with the compromise of the respondent to finish it by email, though it was not filled in all cases, but one. So the resulting number of respondents to the name generator was 36 (see Table 45).

In the case of Alentejo-Algarve-Andalucía cross-border region, the first contact was done through the Province Council of Huelva. Through this first contact was possible to access to more informants in both sides of the border. Through these contacts also the researcher

entered into different list of contacts from different institutions what facilitated to be informed and attend to different events related to cross-border events and to get more contacts with potential respondents. In the region Southern Finland-Estonia, through the snowball technique was possible to contact with experts not only directly related to the Interreg projects but very related to cross-border activities and relations in the field of culture and business that permitted a closer acknowledgment of the border relations in this area. A first contact with the Euroregion Helsinki –Tallinn was the first key to get access to other professionals.

The comparative of two different and very distant areas has influenced significantly on the scheduling of the fieldwork, which has been carried out in different periods. A first phase of the field work was carried out by September and October 2010 in the cross-border area of Southern Finland and Estonia. In this phase eleven of the total number of twenty three interviews was done. A second phase took place from February to April 2011 in the cross-border area of Alentejo-Algarve-Andalucía, where the complete number of 22 interviews was completed. In a final third phase we made a second round of interviews in the cross-border area of Southern Finland-Estonia, from August to October 2011 to complete the total sample of the experts.

The process of fieldwork encountered some limitations that made difficult the access to information. First of all, the experts used to start the interviews with time shortcomings. In some cases the interviewed people had few time for the interview, and this was advised just at the same time of the meeting. This affected specially to the second part of the interview where the questionnaire of personal networks was applied.

By last, regarding that this research is a comparative study involving four countries, an important aspect of the methodology was the language used in the fieldwork and in the application of the techniques. The empirical work was rather facilitated by the linguistic competences in English of most of the interviewees, except those from the Spanish side whose interviews were done in the mother tongue of the respondents and the researcher. The interviews to Spanish experts did not encounter with misunderstandings due to language. The Portuguese experts demonstrated to have good or sufficient knowledge of Spanish language (see also Chapter 6), so the interviews with them were done mostly in Spanish or even in the so called “portuñol” (see Chapter 3). Only in very few cases respondents spoke in Portuguese during most of the interview or in some moments, though they spoke slower. The basic

knowledge that the researcher has of Portuguese language, as a border inhabitant was a useful methodological resource.

In the case of Finnish and Estonian interviews the questionnaire and the interviews were done in English. Here is important to remark that both Finnish and Estonians have good level of linguistic competences in English. Besides that, it is necessary to make two remarks on this matter. Both Estonians and Finnish are very used to speak in English, furthermore, the experts were rather familiarized with English language that was the common language used in their cross-border working meetings, unlike in the cross-border meetings between Portuguese and Spanish, where the Spanish language or “*portuñol*” dominates. It is presumed that the use of a non-native language like English in the case of Estonians and Finnish experts, and Spanish in the case of Portuguese experts could have had an effect over the respondent’s spontaneity. So it is estimated that the difficulties derived from speaking in a foreign language could have interfered in some way in the experts’ capacity to express correctly. However, during the interviews the researcher and experts’ clarification contributed to the fluid discourses.

The semi-structure interviews were all recorded with the informants’ consent. Once they were recorded each interview was labeled by an order number, the cross-border area, the informant’s name, and the date of the interview. In order to preserve the anonymity of the experts and their alters’ identity, the graphical representation of the expert network and the quotes of experts, the experts and alters were indicated as follows. The expert identification was coded by the cross-border area (E=cross-border region AAA, F= Southern Finland-Estonia), the number of the interview, the country of origin, the experts’ job position, the type of institution where the experts worked, and the year in which the interview was carried out. In the following Chapters 6, and 7 along the text we will refer also to the experts by the cross-border area and the number of the interview (for instance F9, E3, etc) in order to make the reading easier. The experts could report their 25 most usual relations or alters by real names, nicknames or just initials or any other identification code in case they did not want to rapport real names. Lately, for the analysis and visualization of the networks, the real names were coded with a order number followed by two or three letters corresponding to hypothetical personal names. All the data collected from the interviews were transcribed by the researcher.

5.2.2.c. The analysis of experts' first part of the semi-structure interviews.

The content analysis was applied to the experts' answers to the qualitative guide of the semi-structure interview. According to Lopez (2000) the content analysis is appropriate when the objective of research is explorative and descriptive, being the descriptive function the most traditional use of the content analysis. The technique consists of a coding method that results appropriate when the objective of the research is to describe general tendencies or changes in the content analyzed; to ascertain the evolution of interests and thoughts; or to establish international comparisons in the data analyzed among others. Based in these objectives, in this research we considered that the content analysis of the data was the most appropriate technique for the analysis of the qualitative discourse of the experts.

We can define the content analysis as a technique for the complete, systematic and objective description of the content of data or texts. It is accepted that the content analysis has a descriptive and inferential function, and it can use both qualitative and quantitative analysis. And as any other technique of analysis it can prove its validity (López, 2000). In other words, we can understand the content analysis as an interpretation method of the qualitative and quantitative data based on a systematic exercise of codification (Kohlbacher, 2006). Babbie (2001) points that the content analysis consists of a technique of coding operation. That is, a process of transforming the raw data into standardized information susceptible for making inferences. This definition implies that the content analysis entails an operative process of coding in order to extract a conceptual structure from the text or content of the data.

This process consists of the codification of units of recording from the origin data into new "ad hoc" created categories of analysis. These categories are the most important element of the content analysis, and they need to be exhaustive, exclusive and independent. As the creation of categories are not subject of objective and standard consensus, the researcher is who establishes these categories through a continuous process of trial and error aligned to the research objectives (López, 2000). In this study the codification of the experts' discourse followed the instructions of the method described by Burnard (1991). This method details the process of categorization in different fourteen operative stages and test the external validity through a researcher not involved in the theme of the study but familiar with the content analysis and categorization process, or through the testing of minimum three of the interviewees who read and set up main points comparable to the researcher's list of categories.

The software Atlas.ti (Muh, 1991) version 3.03 (Muñoz, 2005) was used for the content analysis of the experts' answers to the qualitative questionnaire. The software Atlas.ti it is a common computer programme for the analysis of qualitative data based in grounded theory that stands out in the qualitative research assisted by computer (Valles, 2000). This software permits also to export the qualitative data into the SPSS for statistical analysis. The SPSS is one of the most used programme for analysing statistical data in social sciences (López, 2009). We have used the SPSS 15.version for Windows mainly for the analysis of the experts' data.

Subsequently, the 45 interviews were codified by the researcher. After two exhaustive readings of the interviews a list of categories or codes was created. First, the codes were linked to the registrations units of the texts. This first codification was revisited by the researcher and changed with a second list of codes that was subjected to the criteria of an independent researcher familiarized with the research. With this validity test, it proceed a new categorization process with a revised and final list of codes (see Annex 2), l that got the acceptance of the two researchers. This list of codes corresponds to the different parts of the qualitative questionnaire, though not all the codes have been used for the analysis in this research. All the codes used in this research for the content analysis were group into sub-groups named family of codes. Later on, the codes were analysed quantitatively with the software for statistical analysis SPSS. Here on, we include an abbreviated description of the codes used in the content analysis and in the Table 46 the correspondence between the codes used with the objectives of this research.

A first group of codes reflects the socioeconomic profile of the experts, based on the one hand on their education level, their self-economic evaluation, working experience in cross-border cooperation, their experience in Interreg projects, and the knowledge of the neighbours' language. On the other hand, experts' trust in national and European institutions, and experts' feeling of identity reflect those cognitive attributes and proxies used in the analysis of social capital. Both codes, trust and identity, were adapted to nominal variables for the statistical analysis. Following Spelleberg (2001), the study of identity together with trust will form in this research the experts' attitudinal dimension of social capital that has been used in other studies of communities' social capital.

A second group of codes comprise the analysis of experts' cross-border relations and cross-border attachment to the cross-border area or link with the neighbour country. The cross-border relations adopted a nominal answer (to have or to not to have cross-border relations) by family, friends, and working cross-border relations. Additionally experts' comments on the benefits that they perceived from their cross-border personal networks were codified into instrumental and expressive resources, following the classification of Lin (2008). The content analysis of the experts' cross-border relations will be complementary to the analysis of the experts' personal networks. Therefore, we will accomplish the structural dimension of the expert's cross-border social capital. By the experts' links with the neighbour country, we extracted different codes like the experience of living or have lived in the neighbour country, brotherhood feelings opinion of the neighbour, though only the first was used in this research. The experts were classified by those who have lived or live in the neighbour country and those who not. This factor was presumably considered as relevant in the experts' cross-border personal networks.

Finally, the third group of data corresponds to the experts' opinion of cross-border cooperation and institutional relations. In this research were used the codes of institutional relations measured in terms of intensity and quality with binary answer of poor /good, and the codes that referred to different institutional actors involved in the cross-border cooperation. This group of data will add the meaningful information to the network analysis of the cross-border cooperation carried out through projects in the sub-programmes Alentejo-Algarve-Andalucía and Southern Finland-Estonia.

Table 45: Relation between the research objectives and the codes used in the analysis.

OBJECTIVES	CODES FOR CONTENT ANALYSIS
Objective 1: To analyse the experts main socio-demographic demographic characteristic by country in order to offer a general picture of how the experts are and the relation between experts personal competences like language and cross-border living in their identity feelings	Socio-economic Profile: Education: Level of education Working experience Interreg participation Self economic situation Language competence Identity feeling Border relation: Border living
Objective 2: To characterize and compare by country the experts' level of trust in institutions and identity feeling	Socio-Economic Profile: Trust in national institutions Trust in European Institutions Identity feeling
Objective 3: To identify and analyse the nature of the experts' cross-border networks. Number of cross-border relations and nature (intensity/ work/ family) of those border relations, and to identify the type of networks present among experts	Cross-border Relations: Border family Border friends Border workmates:
Objective 4: To analyse the influence of the experts' personal competences like language and cross-bordre living in their cross-border networks	Language competence Border living Cross-border Relations
Objective 5: To analyze the role of the cross-border ties in their personal network structure	No codes from content analysis
Objective 6: To analyse and describe the opportunities that the experts perceive from their cross-border contacts and the types of support that they received from their cross-border ties	Resources Instrumental Brokering Information Expressive
Objective 7: To analyse the two complete network structures among institutional actors, using social network analysis, and the characteristics of the institutions members of the network	No codes from content analysis
Objective 8: To identify those most important actors, and to analyse their role in the network structure of cross-border cooperation in both cross-border regions	Actor's Role: University actor Enterprise actor Local actor Region actor Government Euroregions
Objective 9: To analyse from the experts' opinions the institutional relations measured in terms of intensity and quality	Institutional Relations: Intensity Good intensity Poor intensity Quality: Good quality Poor quality
Objective 10: To analyze the role that plays the Euroregions by their position in the network structures of cross-border cooperation of the subprogramme Southern Finland-Estonia and Alentejo-Algarve-Andalucía, and by the experts' opinion about the role of the Euroregions and their performance in their cross-border region	Euroregions: Important Non important Do not know

Source: Author's compilation.

5.2.2.d. The analysis of experts' second part of the semi-structure interview. Experts' personal networks (egocentric networks).

The analysis of the experts' personal networks (egocentric networks) used the name generator and name interpreter of the interview. With the name generator the expert reported up to 25 people with whom they usually relate. The experts were asked to report their contacts or alters, independently of any possible criteria that could influence in their spontaneous recall of personal relations. The purpose was to analyse the presence or not of relations from the neighbour country, that is, the possible experts' cross-border personal networks or contact from the neighbour country. This name generator restricts the size of the personal networks to those relations closer to the respondent, compared to other measures of personal network like the personal agendas or diaries. Although, like in the study of Fu (2005), mentioned in the Chapter 2, 25 people provided a sufficient range for reporting both close and diary relations and those weak ties like colleagues from work. The recall of possible cross-border personal networks was independent of the recall of cross-border relations in the qualitative questionnaire of the interview analyzed with content analysis. As we have seen in the Chapter 2, other studies collect a bigger number of contacts. But in this research, the complementary use of the network analysis and the qualitative questionnaire made convenient to not to increase the number of 25 contacts to be recall in the name generator.

With the name generator the experts had to report the possible relations among the alters listed. This part of the questionnaire was fundamental for the analysis and visualization (see Annex 4) of the experts' personal network structure in the Chapter 6. Consequently we could analysed the integration (Bolivar, 2011; Lozares & Verd, 2011; Lozares, et al. 2011) of those cross-border alters in the rest of the experts' personal network structure, or if the alters from the neighbour country form isolated nodes not integrated or linked to other national alters of the experts. Using social network analysis, the measures of centrality (degree, betweenness, and Bonacich indicators) will indicate the role in terms of power of the cross-border alters in the whole network structure of the experts. And the sub-group measures like Lambda set and cut points will indicate the role of the cross-border alters as possible structural holes in the network structure. For the analysis of the networks of the experts we applied UCINET, version 6.0 (Freeman, 2004; Borgatti, Everett & Freeman, 2002) and NETDRAW for the visualization of the relational data of the experts.

By last, with the name interpreter we analysed the different features of the alters and the relations between the expert and his alters, like the durability of the ego's relation with the alters, the intensity of the relation, the type of relation, and the kind of support received from the contact. The analysis of these attributes of the ego-alter relations permits to ascertain the type of cross-border social capital that the experts have. For the analysis of the alters' data we used SPSS.15 version for Windows.

CHAPTER 6: EXPERTS' SOCIAL CAPITAL FOR CROSS-BORDER COOPERATION: EXPERTS' CROSS-BORDER NETWORKS AND ENTAILMENT TO THE CROSS-BORDER AREA

The main goal of this Chapter is to study the social capital at the individual level of those experts whose work is related or directly involved in cross-border cooperation². We tackle the experts' scope for cross-border social capital comparatively between the two cross-border regions of analysis. Along the different sections we present a descriptive and comparative exercise of the experts' characteristics related to the main elements of social capital in both cross-border regions. One of the main lines of the empirical analysis committed on social capital proposed a very holistic measurement of social capital that entails a balance measurement between the cognitive and structural social capital (Grootaert, Narayan, Nyhan & Woolcock, 2003; Grootaert & Van Bastelaer, 2002), specially authors from the called Australian approach (Stone, 2001; Bullen & Onyx, 2005; Spellerberg, 2001). More concretely, after a revisionist work of other empirical proposals to social capital in communities, Spellerberg (2001) proposes three independent components of the community (population data, attitudes /values and participation in social networks). They are three main blocks of data analysis that correspond with what people are, what people do (behaviour and relational data), and what people feel (attitudinal data). In each of these big components Spellerberg points a specific row of potential indicators (see Figure 3 in Chapter 1) from which we selected some specific indicators and adapted to this research, like the identity feeling, trust and networks.

Accordingly, the general purpose of this chapter displays into different specific objectives presented along the following sections. In the first part the objective is to analyse and describe the experts' main socio-demographic characteristics. The second part describes a general picture of experts attributes related to social capital, and hence related to cross-border cooperation and cross-border relations. We examine aspects like trust, identity and attitudes towards their neighbours, declared in the depth interviews. The third part is dedicated to the

² The territorial reference of regions is based on Interreg Programmes NUTS III that corresponds with the delimitation of Alentejo, Algarve and Andalucía, administrative regions in Portugal and Spain. In the case of Finland and Estonia, Interreg territorial delimitation use Estonia and South Finland that comprises different counties in the south of Finland (see <http://www.centralbaltic.eu/>). However, most of all interviewees belong to the programme eligible areas. In this research a difference between the northern part of Estonia based on Harjumaa (Harju county) and the rest of the country was considered useful, as most of the experts and population in Estonia are concentrated in this county.

analysis and description of the experts' personal networks and the role of their possible cross-border networks. The last part aims a brief analysis of resources, based in the resources approach of authors like Lin (2008) and Burt (2000). We enquire qualitative and quantitatively in the type of resources that the experts receive from their cross-border contacts.

In this study the interview carried out to the experts was based in a questionnaire including a first part with questions about these three components (population data, attitudes /values and participation in social networks). A first group of questions dealt with the sociodemographic and professional profile of the experts, and a second group of items comprised questions on the level of trust in national and European institutions, and other attitudinal data like identity feelings, and also, the opinion of the people at the other side of the border. The interview had a second part with a module of social network analysis included in order to analyze the experts' relational behaviour. With this module the aim is to know their cross-border relational implication. The following sections are based first in the description of the content analysis of qualitative interviews to experts, with the help of the software Atlas.ti. One of the results of the qualitative approach from the interviewees' answers was the extraction and systematization of different codes and categories codes around the cross-border issue. Afterwards qualitative codes and categories were exported to Spss job, taking advantage of this function of Atlas ti for combination of qualitative and quantitative data. Here we present some of the results of this qualitative plus quantitative integrated analysis. Once again results offer a descriptive picture of our experts on cross-border cooperation characteristics, opinions and relationships. Although the discussions on experts' data can not be generalized to all those people working in institutional cross-border cooperation, as this was not a representative statistical study, the results, contrasting experiences of experts of four different European countries, pay attention to relevant issues for the sustainability of cross-border cooperation in Europe.

6.1. Experts' profile (what people are).

In this section we focus in the experts' main socio-demographic characteristics by country, in order to offer a general picture of how the experts are and the relation or influence between experts' personal competences/facilitators like language and cross-border living in their identity and in their cross-border behaviours. Demographic variables like sex and age, family background, cultural variables like religiousness or people's employment are all important

characteristics as back-drops to social capital that can impact on the nature of relationships (Spellerberg, 2001). In this research we describe experts characteristics by sex, age, educational level, the self-economic perception, the professional experience related to cross-border cooperation and THE experience working with Interreg A projects. Two other important aspects were considered important for the analysis of the experts' social capital: the knowledge of the neighbour's language by experts in each cross-border region, and the ineludible fact living or to have lived in the neighbour country. These are two very relevant aspects to be considered for the experts' competence for cross-border relations and cross-border cooperation. Thus, and as part of the objective, we are interested at describing the relations between these two variables in connection with the experts' manifested identity and relations with the neighbour country.

6.1.1. Experts' socio-demographic profile.

According to sex, in our interviews the management of cross-border cooperation tends to be dominated by men with a total 27 out of 45, and 18 women. However, in the Table 47 we can see the differences by country and by cross-border area. The cross-border region AAA counts with more men than women both in the Spanish and Portuguese sides, while in SFE there is a certain unbalance. In Estonia the majority of experts are women compared to the more balance distribution of men and women in Finland. The major presence of women in this cross-border region might be due to the major presence of experts from universities and research centers in the institutional cross-border cooperation of SFE in respect with the AAA areas. Nevertheless, the data on sex is merely descriptive as the sample of experts was selected by theoretical criterias and through the snowball technique. There is not any analytical porpuse on the base of the sex of the experts but to emphasize that in general terms those professionals working and related with cross-border relations tend to be men, while women were more present by the participation of educational and research institutions involved in cross-border projects. The average of experts' age is around the mid forties in all the four countries, though Finnish experts' average is a bit higher. Nonetheless, the age of the experts is just an indicative of the experience or time that they have been working in cross-border cooperation, what will be commented in next section.

Table 47: Experts by country, sex and age

		Spain	%	Portugal	%	Estonia	%	Finland	%
Total	45	11	24.4	11	24.4	12	26.7	11	24.4
Sex	Men	9	82	9	82	3	25	6	55
	Women	2	18	2	18	9	75	5	45
Average Age		41.6	100	44.8	100	44.3	100	48.12	100

Source: Author's compilation based on fieldwork.

In relation to the level of education represented in the Table 48, the majority of interviewed experts have a master level degree, especially the experts from the Portuguese and Finnish border regions. Only two Spanish experts have a bachelor degree that correspond with those who were city majors in our sample. Those experts with a Doctoral degree correspond mainly with experts coming from universities or research institutions, though in Estonia two of the three experts do not work in these institutions. According to the self-economic perception, there are more relevant differences interesting to be commented, specially in the cross-border region SFE. While the 54% of Finnish experts affirm to have a very good economic condition, none of the Estonian experts declare this option. In the same way, there are not any Finnish expert who finds himself or herself in a regular economic state, on the contrary approximately the 33% of Estonian experts affirmed that their economic condition was regular and that it should be better according to the level of studies that they had. This disparity in the self-economic perception of experts does not result surprising as there is an important economic disparity between the Finnish and Estonia economies, commented in the previous Chapter 3 in relation to the data of GDP at current market price (see Table 16). The experts' self-economic perception in the cross-border region AAA is more homogenous, but still the tendency among the experts reflects the better economic level of development of the Spanish border region compared to the Portuguese border regions. This difference was also represented in the GDP indicator of the Table 16 in the Chapter 3. Among the Portuguese experts, like among the Estonians ones, none of them declared to have a very good economic condition. While almost half of them affirmed that their economic condition was regular, and it should be better according to their studies and working functions, compared to their Spanish counterparts. The Spanish experts reflect a better self-economic perception with 54.5% declaring having a good economic situation. Two of them (18.2%) perceived to have a regular economic condition due to their particular situation for being in a difficult moment despite having acceptable or good rents.

Table 48: Experts by country, educational level and self-economic perception

		Spain	%	Portugal	%	Estonia	%	Finland	%
Educación level	Bachelor	2	18.2	0	0	1	8.3		
	Master	7	63.6	10	90.9	8	66.7	10	90.9
	Doctor	2	18.2	1	9.1	3	25.0	1	9.1
	Total	11	100	11	100	12	100	11	100
Self-economic perception	Regular	2	18.2	5	45.5	4	33.3	0	0
	Good	6	54.5	6	54.5	8	66.7	5	45.5
	Very Good	3	27.3	0	0	0	0	6	54.5
	Total	11	100	11	100	12	100	11	100

Source: Author's compilation based on fieldwork..

6.1.2. Experts' experience in institutional cross-border cooperation.

As the Table 49 shows, the average of experience in cross-border cooperation of the experts intervieweed is approximately the same in all the border regions. Only the Portuguese experts have the longest experience with 20 years working in cross-border cooperation. To report that the average of experience is around 10 years implies that the experts of both cross-border regions have had sufficient experience and consequently have a well-funded opinion on the institutional cross-border issues and cooperation where they are involved. On the contrary, not all the experts have experience in the Interreg A cross-border cooperation projects. Particularly aproximately one third of Estonian (25%) and Finnish (36%) experts dot not have experience at working in some project of the Interreg A II, III or IV programmes. This less presence of Interreg experience owes to the professional activity of some experts coming whether from the diplomacy, entrepreneurial, culture or research fields. The criteria followed in the selection of the experts was to have experience in cross-border projects and/or Interreg. In the cross-border region SFE, through the snowball technique, we were redirected to those experts with experience in cross-border issues and well known among others, but they had not necessarily experience in Interreg projects. On the contrary, among Spanish experts interviewed, only two of them did not have experience in Interreg projects. Although they recognized to be involved in Interreg programme through higher institutions at county (province) or regional level that represent them. The total of Portuguese experts had experience in Interreg. Practically those with the longest experience of 20 years working in cross-border cooperation declared that they started working with Interreg A programme.

Table 49: Experts' years experience in CBC and Interreg A projects by country

Average		Spain	%	Portugal	%	Estonia	%	Finland	%
Years of experience in CBC		10.4	-	14.1	-	10.3	-	10.5	-
Years of experience in Interreg projects	No	2	18.2	0	0	3	25	4	36.4
	Yes	9	81.8	11	100	9	75	7	63.6

Source: Author's compilation based on fieldwork.

6.1.3. Experts' cross-border living.

To live or to have lived in the neighbour country of the cross-border region is also an important aspect. This vital experience creates a solid background of knowledge about neighbours, their language, their culture as way of thinking and behaving, the national legislation, structure of administration and its procedures, etc. But it might influence and explain the experts' patterns of cross-border networks as well. Therefore, to have this experience is whether a cause or a consequence of cross-border networks and social cohesion across the border.

As the Table 50 shows, the experts from the Portuguese side have not lived in the neighbour country, and only one Spanish expert, lived in Portugal for three years due to family working reasons. On the contrary, the experts in the cross-border region SFE present a more intense pattern of living in the neighbour country. More than the 30% of experts interviewed have lived or live in the other country. Exploring the reasons of their cross-border mobility, work is the main motive for living in the other country. Almost half of the Estonian experts (41.7%) lived or have lived in Finland. Four out of five migrated to Southern Finland (Etelä-Suomi) for working reasons, and one for study reasons that later evolved into working attainment. Two of them work for Estonian institutions with headquarters in Finland. One of these experts (F10) is working for an Estonian institution, living between Estonia, where family lives, and Finland where most of his/her work takes place. In three out of five experts, once they migrated to Finland, they consolidated their relation with Finland through their marriage with native Finnish, putting down their roots in the country. The same experts live or have been living for five years to 20 years the longest. Only one of them has lived for a shorter period in Helsinki.

The Finnish experts show a distinctive pattern. They have migrated for working reasons also, in all the cases working for Finnish or other non-estonian institutions. Their cross-border living seems less tied to Estonia as none of them have married with Estonian couples but with

Finnish ones, what has implied and implies a greater temporality of their cross-border living in Estonia. This reproduce the general pattern of Finnish labour migration commented in the Chapter 3 (see, Hyvönen, 2008). Only one of this Finnish experts has greater personal attachment for being descendent of a mix marriage of a Finnish-Estonian couple.

Table 50: Distribution of experts who have lived or live in the neighbour country

Cross-border living		Spain	%	Portugal	%	Estonia	%	Finland	%
	No	10	90.9	11	100	7	58.3	7	63.6
	Yes	1	9.1	0	0	5	41.7	4	36.4

Source: Author's compilation based on fieldwork.

6.1.4. Experts' linguistic competence.

In the Chapter 2 we underlined the relevance of linguistic competence in the neighbours' language as an advantage for social interaction across the border. To have knowledge on the other's language has been demonstrated to influence positively in the opinion about neighbours, in the assesment of the CBC taking place and in the better predisposition for social interaction with neighbours (Grix, 2001; Grix & Houžvička, 2002; Prokkola, 2008; Zillmer, 2005). Although language matters have not been a traditional focus of systematic research in cross-border cooperation studies. Instead, the linguistic competence has been a crucial factor in the study of immigrants process of integration to their hosting societies, for instance. The studies of immigrant's integration highlight the language as a form not only of human capital but also of social capital that through social network provides access to social attainment. Language influences in the access and use of the health-care system, national labour market, and in general in the social community membership. The linguistic competence is a resource that flows through the social networks, and both variables interplay in the stock of their social capital (Grim-Feinberg, 2007; Nawyn, et al. 2012; Lozares & Sala, 2011)

The language is the thread of any social interaction and specially in cross-border interaction is an ineludible aspect to consider. The experts were asked about their knowledge of neighbour's language. For the experts of AAA, cross-border region the knowledge of language is a very relevant issue for the cross-border cooperation, though not exactly an obstacle for cooperation. The experts commented about the dominance of Spanish language over the other in cross-border working meetings. This asymmetrical dominance was also reported in the Chapter 3 (section 3.1). The Portuguese experts try to speak Spanish or a sort of pseudo and crossborder

language colloquially recognized as “portuñol/portugñol”. The professional meetings between the Finnish and the Estonian experts have also flow through the dominance of Finnish language, though progressively these events have turned to English language (Mikkola, 2011). The English permits a greater equality in the linguistic competences between these two neighbours.

The Table 51 reflects the degree of knowledge that the experts reported on the neighbour’s language that goes aline with previous results in the cross-border regions commented in the Chapter 3. Regarding our interviews, more than half of the Spanish experts (63.6%) declare to have a low level of Portuguese language and 18.2% have very low level of knowledge. On the contrary, none of the Portuguese experts reported a low or very low level. The majority of them have a good knowledge of Spanish language, and two of them report to have very good level. The linguistic competence as a bilingual is not present among the Portuguese and the Spanish experts. In general terms the knowledge of neighbour’s language is better and less asymmetrical among the Finnish and the Estonia experts. First, the bilingualism is present among Estonian and Finnish experts. One Estonian expert as much as one Finnish expert are bilingual in Finnish and Estonian languages respectively. The Estonian one has been living for more than twenty years in Finland, while the Finnish expert (F19) has grown up in a bilingual family from a mix-marriage. The biggest percentege among the Estonian experts are those who declared a good level of knowledge, while 45% of the Finnish experts had a very good level. However, adding those with good and very good level, the Estonian experts had better knowledge of Finnish language (58.3%) than Finnish do. In the same way, the percentage of Finnish with a low level is greater than the Estonian one.

Table 51: Experts’ knowledge of neighbour’s language by country

Language	Spain	%	Portugal	%	Estonia	%	Finland	%	Total
No response – Do not answer	0	0	0	0	0	0	0	0	0
Very low	2	18.2	0	0	1	8.3	3	27.3	6
Low	7	63.6	0	0	3	25	2	18.2	12
Good	1	9.1	9	82	4	33.3	0	0	14
Very good	1	9.1	2	18	3	25	5	45.5	11
Bilingual	0	0	0	0	1	8.3	1	9.1	2
Total	11	100	11	100	12	100	11	100	45

Source: Author’s compilation. N = 45.

6.2. Experts' identity and attitudinal profile (what people feel).

In order to answer our second objective, in this part the aim is to offer a general picture of what the experts feel, that is, to characterize and compare by country the experts' level of trust in institutions and their identity feeling. Their attitudinal data related to social capital form a group of elements that aims to describe the general competence of the experts for cross-border relations. Following Spellerberg (2001) aspects like beliefs, identity, and opinions form an ideological base from which the predisposition to behave might go in one or another direction. Thus, they motivate to less or greater extent the initiative for social interactions across the borders. In this research, the following variables have been estimated as important for a more comprehensive analysis of the experts' cross-border social capital. First, we analyse the levels of general trust in national institutions and European Institutions expressed by experts, and second, we analyse their identity feelings. By last, the description of the experts' entailment to the border area can be considered as a prelude of the following section where we focus in the analysis of personal networks.

6.2.1. Experts' trust in national and European institutions.

One of the main dimensions in the study of social capital is whether to consider social capital as cognitive vs structural. The cognitive dimension of social capital resides in the study of values and attitudes like trust, reciprocity and willingness to cooperate (Oorschot, Arts, & Gelissen, 2006). Although from the structural dimension of social capital trust is not considered as an analytical component, in the Chapter 3 we emphasized the study of trust rather as a cultural value that according to Uphoof (2000) is likely to motivate people for cooperation or greater commitment in their social interactions. Trust constitutes then a minimum social requisite that correlates positively with cooperation or participation (Zmerli, Newton & Montero, 2007). In this section the objective is to analyse the expert level of trust in both national and European institutions as cultural values that we believe it will report valuable information for the study of cross-border cooperation.

Looking at the Tables 52 and 53 we can see the great difference between both cross-border regions in relation to experts' trust in national and European institutions. Regarding national trust the experts in AAA tend to have much less trust in their national institutions. Although Portuguese experts experience a more negative trust. Around 27% of the Portuguese experts

valued as very low their trust in governmental institutions, and more than half of them (54.5%) reported a low level of trust compared to the 36.4% of Spanish experts. By contrast, the experts in SFE present a more optimistic opinion as they have not reported a low or very low level of trust. Still the Finnish experts have more confidence in their national institutions than Estonians ones. Almost all the Finnish experts (81.8%) value as very high their trust in governmental institutions, while this porcentage in Estonians is 16%, and 75% of the Estonian experts have high trust in national institutions.

Table 52: Experts' trust in national institutions by country

Trust	Spain	%	Portugal	%	Estonia	%	Finland	%
No response	-	-	-	-	-	-	-	-
Very low	-	-	3	27.3	-	-	-	-
Low	4	36.4	6	54.5			-	
Medium	3	27.3	2	18.2	1	8.3	-	-
High	4	36.4	-	-	9	75	2	18.2
Very high	-	-	-	-	2	16.7	9	81.8
Total	11	100	11	100	12	100	11	100

Source: Author's compilation based on fieldwork. N = 45.

Examining the experts' trust in European institutions, we encounter that while the Spanish experts have more trust in European institutions than in their governmental ones, Portuguese opinion do not change in respect to their trust in national institutions. By contrast, in SFE we find a less level of trust in the European institutions. It is noticeable that Finnish experts do trust in less degree compared to their trust in national institutions with a 72.7% of them who trust very high, and one expert that has medium level of trust in European institutions. Estonian experts' trust in European Institutions is more positive distributed between a high (41.7%) and very high trust (41.7%), though 16.7% of them have medium trust. Comparing the experts' trust in national and European institutions by country with the confidence in European Union and in Government commented in the Chapter 3, section 3.2.3. we can see the same tendencies repeated. The Spanish confidence in European Union is higher than the confidence in Government while this tendency is opposite in Estonia and Finland data, what suggest the appropriateness of future research in this line with bigger samples.

Table 53: Experts' trust in European institutions by country

Trust	Spain	%	Portugal	%	Estonia	%	Finland	%
No response Do not answer	-	-	-	-	-	-	-	-
Very low	-	-	3	27.3	-	-	-	-
Low	1	9.1	6	54.5	-	-	-	-
Medium	3	27.3	2	18.2	2	16.7	1	9.1
High	6	54.5	-	-	5	41.7	2	18.2
Very high	1	9.1	-	-	5	41.7	8	72.7
Total	11	100	11	100	12	100	11	100

Source: Author's compilation based on fieldwork. **N = 45.**

6.2.2. Experts's feelings of identity.

In the framework for measuring social capital Spellerberg (2001) proposed the analysis of both attitudes and values. Among this attitudinal group she highlighted not only the study of general trust and reciprocity but also what people feel or belief about themselves and others. As these aspects reflect a more positive or negative predisposition from which start people's relational behaviour towards others. Accordingly, the positive or negative attitudes towards neighbours, as well as the feeling of social-spatial identity, have been considered here as important predisposal factors for mobilisation of social capital. The study of identity has become an important axis in other studies of communities' social capital (Hamptom & Duncan, 2011; Holt, 2012, Onyebuchi, 2011). Specifically, the debate on identity in the European Union has become a very attractive catching topic of political and ethical interest (Simonsen, 2004; Vujadinovic, 2011). Different studies emphasize the relevance of identity process in the European integration, by the permanence, re-constructions or re-formulation of minorities identities, regional identities in the emerging or consolidated cross-border regions (Esparza, 2010; Fatima-Amante, 2013; Nadalutti, 2011; Prokkola, Zimmerbauer & Jakola, 2012; Sabec, 2007; Zhurzhenko, 2004; Zivkovic, 2009), or the role and dominance of national identities across border regions in the making (Brym, 2011). The feeling of identifying one-self with a specific territory is well discussed in the human approach of cross-border cooperation, although few studies focused on the analysis of identity as analytical element for the social capital construction across the borders (Gualda, et al., 2011; González et al., 2011; Fragoso, et al., 2011; Pérez & Monago, 2011). The dominance of local and national identities in cross-border regions could discourage the aims of a greater social interaction and union across the borders. However, there are also feelings of proximity towards their

neighbours that instigate for positive predisposition to maintain relations with neighbours. Thus, there are both lights and shadows in the cross-border maps of remaining old identities and emerging positive feelings of social proximity towards the neighbour.

The objective here is to know which are the identity feelings of the experts of both cross-border regions. What kind of identity or identities the experts feel most and how they might be related to specific biographical particularities of the experts. The questionnaire applied to experts included an open question about identity feelings in order to dig out in all the possible manifestations of identity and in the possible proxy to a cross-border identity. Examining the experts' answers on identity, we have created a synthetic typology of identities from all the experts that permits its application to both cross-border regions, represented in the Table 55. The typology contains eight different types of identities that vary from the most local level to the broadest level reported by experts. First of all, it is necessary to point out that the expression of identity attached to an specific territorial and social space might implies a multiple feeling of belonging to different socio-territorial spaces. The identification process is then a complex exercise of sintetization for respondents where a sort of multiplex, hibrid and inclusive identities tend to occur at the same time. Accordingly, the multiple response is a logical option when 15 out of 45 experts declared a multiple feeling of identity or an hibrid identity. In these cases, experts mentioned before an identity related to their closest social space like the locality, area or region where they lived, that coexisted and could be included within a supra identity beyond their national border.

In the Table 53 we can see the dominance of local and regional identity among the experts of the AAA cross-border region. The Spanish experts identified more with the local area where they lived (36.4 of local identiy and 36.4% of county identity) and the Portuguese experts identified more with the region where they belong (54.5%). The feeling of attachment to the county or region territori occurs among those experts who are from a certain city but live and/or work in oher locality. In the cross-border area of SFE we find a more diversified map of identities. In the case of the Estonian experts the majority of them identify mostly with the country as a whole. This dominance of national identity among Estonian experts might be related to the intensive ethnic nationalism feeling among Estonians. The Estonian case is one of the East European variants of an ethnic model of the nation (Smith, 1991: 11-13) that emerged reinvigorated since Estonia regained its second independence. Their national identity and statehood were presented as the revival of an historical justice and the Estonian

flourishing ethnicity (Berg, 2002). Among them, two experts had a bi-national identity, that corresponded to Finland and Estonia country. At this respect their biography explained this typology. Both of these experts live or have lived in Finland for a long time. Consequently, they both expressed to feel at the same time as Estonian and Finnish. The same reason explains why one Finnish expert expressed a bi-national identity, though in this case was between Finland and a non-European country where part of his life and family are attached.

It is interesting to see that principally among the Finnish experts (27.3%) appear a supra-regional identity on the basis of their belonging feeling to the Nordic or Scandinavian countries. In the same way the Portuguese expert identifying with a supra-regional area did it in relation to the feeling of being from the Mediterranean or southern area. The broader identity of being European-Global or “citizen of the world” is more spread across countries, though it represents a minor response among the experts. Surprisingly, only one Portuguese expert identified with the cross-border area. Particularly this expert commented to spend great part of the free-time in the Spanish border area and to have many Spanish friends and contacts in general. Summarising, the identity feeling of the experts is well attached to the closest territories where their live go by, and the existence of identity beyond their closest social space is less frequent and obeys to the personal biography of the experts.

Table 54: Experts feeling of Identity by country

Identity	Spain	%	Portugal	%	Estonia	%	Finland	%	Total	%
No response/ Do not answer	0	0	0	0	0	0	0	0	0	0
Local	4	36.4	0	0	3	25	3	27.3	10	22.2
County	4	36.4	0	0	0	0	0	0.0	4	8.9
Regional	1	9.1	6	54.5	0	0.0	2	18.2	9	20.0
National	1	9.1	1	9.1	7	58.3	0	0.0	9	20.0
Supra-regional	0	0	1	9.1	0	0	3	27.3	4	8.9
Bi-national	0	0	0	0	2	16.7	1	9.1	3	6.7
European- Global	1	9.1	2	18.2	0	0.0	2	18.2	5	11.1
Cross-border	0	0	1	9.1	0	0.0	0	0	1	2.2
Total	11	100	11	100	12	100	11	100	45	100.0

Source: Author's compilation based on fieldwork. N = 45.

By last, the purpose of this section was also to enquire if the identity manifested by experts is related to some of their biographical characteristics. It is interesting to know if some biographical aspects like the linguistic competences and the experience of living in the neighbour country are related or correlate with their identity feeling.

In the Table 55 we can see the co-occurrence between the linguistic competences of the experts in neighbour's language with their identity. Those with very low level of linguistic competence in the others' language tend to have a local identity; while on the contrary, those with high degree of linguistic competence show a broader feeling of identity. Although we are analysing small samples that do not permit to make statistical inferences, the relation between identity and language can be considered a sign for tracing social integration policies across border regions. The relevance of language promotion across border regions is what other researchers have remarked also for promoting greater social integration (Gualda et al. 2008), and for the promotion of social capital across the border regions (Grix, 2001).

Table 55: Co-occurrence between neighbour's language competence * self identity feeling

Neighbour's Language Competence	Self Identity Feeling								
	Local	County /Province	Regional	National	Supra regional	Bi-National	European /Global	Cross-Border	Local
Very low	40	0	11.1	0	25	0	0	0	13.3
Low	50	75	0	22.2	0.0	33.3	20.0	0.0	26.7
Good	0	25	55.6	55.6	25.0	0.0	40.0	0.0	31.1
Very good	10	0	33.3	22.2	25.0	33.3	40.0	100.0	24.4
Bilingual	0	0	0	0	25	33.3	0.0	0.0	4.4
Total	10	4	9	9	4	3	5	1	45

Source: Author's compilation based on fieldwork. N = 45.

The same type of analysis was done between the variable of cross-border living with identity. Identity seems to be more related to the fact of being skilful in neighbour's language than to the biographical experience of living in the neighbour country, at least in the case of our intervieweed experts. However, considering the biographical co-occurrence between cross-border living and knowledge of neighbour's language we appreciate an interesting relation. As we can see in the Table 56, the majority of the 10 experts who have lived in the neighbour country, have also a very good level (63.6%) and bilingual level (100%) on neighbour's language.

Table 56: Co-occurrence between cross-border living and neighbour language competence

			Neighbour's Language Competence					Total
			Very Low	Low	Good	Very Good	Bilingual	Very Low
Live in neighbour's country	No	Number	6	12	13	4	0	35
		% de Neighbour's language competence	100.0%	100.0%	92.9%	36.4%	.0%	77.8%
	Yes	Number	0	0	1	7	2	10
		% de Neighbour's language competence	.0%	.0%	7.1%	63.6%	100.0%	22.2%
Total		Number	6	12	14	11	2	45
		% de Neighbour's language competence	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Source: Author's compilation base don fieldwork,. N = 45.

6. 3. Experts' border network structure (what people do).

In the previous sections we discussed what the experts are and what they feel. The linguistics competence, identity and trust are facilitators for greater social interaction and cooperation spirit, but the experts' personal network might be the complement and promising mean. In this part, the other block of analysis we are interested in, is what the experts do, that is, their behaviour and relational data. While the model of Spellerberg proposes both the study of membership and participation in community, and the individuals engagement in networks, we focus on the behavioral analysis of social capital to its most irreducible unit or asset, the network (the contact = behaviour, relation). Along the following sections we center in the structure of social capital analysing the experts networks, the nature of these networks, and especially the role of the contacts from the neighbour country in the experts' networks. By last, we focus on the resources and support that the experts receive from their contacts in the neighbour country.

According to Bourdieu (1980), the volumen of social capital that a certain individual can mobilizes depends on the scope or extension of the net of ties that he/her has, and on the volume of capital possessed by these ties. In doing so, we aim to offer a comparative analysis on the scope of cross-border social capital at the experts's reach. The interest is also to enquire what kind of cross-border social capital the experts might have. One of the main lines of discussion about social capital is that social capital can be studied as a metaphor of social cohesion or social integration. This mean if the agents' social networks are dense or open

networks. The analysis of the networks' attributes will enquire what type of cross-border networks the experts have, if the relations from the neighbour country are dense and strong ties, or if their networks are composed by broad and weak ties. As we will see along the different sections, those relations from the neighbour country tend to be more of the second type. They act like bridges that in terms of Granovetter (1973) have their strength in the broad myriad of advantages that these relations imply for the experts.

Following the classic authors of social capital, we are immersed in a social structure that possibilitates actions and which is formed by durable relations of expectations and obligations (Coleman, 1988). In the analysis at the individual level we enjoy of the most clearly and visible relation between network and social capital (Foley & Edwards, 1999, where the social structure corresponds with the social capital metaphor by which certain individuals or groups have a competitive advantage in pursuing their ends (Burt, 2008). Consequently, to have relations like knowns, friends, etc. from the neighbour country is a potential resource for cross-border cooperation. The population living in cross-border areas with high levels of social cross-border interaction have greater possibilities to benefit mutually from the resources that they have. These cross-border relations might be the advantages inherent in the European Union rhetoric of social integration. Nevertheless, the analysis of the social structure is a complex analytic exercise. In words of Foley and Edwards (2001; 1999), there are many important nuances to be distinguished. As commented in the Chapter 2, they propose a model of social capital that discerned the social network as a unit of analysis from the individual whose relations constitute this network. Thus, on the one hand, we enquire in the social network of each expert, the number and weight of the relations in the neighbour country and their attributes, that is, the strength and nature of these relations. On the other hand, in the analysis of the individual networks we enquire the location of the relations from neighbour country in the whole network (centrality and subgroups) and the use value of these ties, that is, the resources that the individual can actually access.

In the second part of the interview, the questionnaire for the analysis of social networks using a name generator (see Chapter 5) was applied to 36 experts from the total number of 45 experts interviewed. They were asked to report up to 25 people with whom they usually related, independently of the method of contact, kind of relations or origin of contacts. Certain attributes of these relations were also collected: origin of the people, intensity of relations, kind of support received from the contact, and type of relation (if the contact comes from

friendships, family, work, etc.). The experts' network data was analysed and visualised from Social Network modern perspectives using the Ucinet and Netdraw software (Freeman, 2004; Borgatti, Everett, & Freeman, 2002). Additionally the questionnaire used in the first part of the interview included a question about the personal relations that the experts had in the neighbour country. As it is detailed in Chapter 5, the answers were processed with Atlas.ti, a specific software for content analysis in order to classify the information for the interpretation of the data. Accordingly, a list of codes was created considering "relations with people who are from the neighbouring country": border family; border friends; and border workmates. The discussion of results in the following sections is based on the triangulation of content analysis from the first part of the interviews and the quantitative analysis of personal networks. To contribute to the analytical discussion of the experts' networks, some interview quotes from the same experts are included. These direct quotations appear with some data of the experts' profile in order to understand the relation between experts' profiles or biography and the content of the quotes, though preserving the experts' anonymity.

6.3.1. Experts' personal and cross-border networks.

In respect of their relational behaviour with neighbours, the experts could be considered as a particular social group among the population living in cross-border regions. It is assumed that by their professional duties they might have greater intensity of cross-border activities, than the average, and/or have more frequent contacts with their neighbours. The detailed account of their relational cross-border behaviour will be a rich information for appreciating the degree of social proximity and cohesion across the borders in two different communities of four different countries, the Spanish and Portuguese experts, and the Finnish and Estonian experts. The objective in this section is to analyse the experts' networks, focusing the analysis on the relations with people from the neighbour country. First, identifying the presence of cross-border relations among the expert's personal networks, and second, analysing the nature of these border networks. The number of border relations, their nature in terms of time, frequency of contact, and type of relation, will be discussed in this section. All these data was collected in the second part of the interview using the name generator and the name interpreter. Additionally, we analyse the co-occurrence between experts' personal competences like language and the experience of living in the neighbour country with the experts relations with people from neighbour country.

Like other authors have previously pointed, the relations of people tend to be limited to the spatial promiximity (Lundén, 1973; Gualda et al., 2008). In our data, we generally found that there was a strong but understandable endogamy of experts' personal networks. The majority of people listed in the experts' personal networks were from the same country. However, we found out are interesting differences between the experts by countries and by the both cross-border regions (see Table 57 and 58). On the one hand, it is noticeable that in the SFE cross-border region there were more cross-border contacts. On the other hand, while Spanish relational rapprochement towards people from Portugal is minimal, the Portuguese experts declared to have more links with Spanish neighbours.

Table 57: Number of alters of experts reported by country of origin

Alentejo-Algarve-Andalucía					
Spain	Number of alters	Number of border alters	Portugal	Number of alters	Number of border alters
E1	25	7	E4	12	6
E2	25	0	E5	25	3
E3	25	1	E10	25	3
E6	25	0	E11	25	0
E7	0	0	E16	25	3
E8	0	0	E17	25	5
E9	25	0	E18	0	0
E12	20	4	E19	25	22
E13	25	0	E20	15	0
E14	20	0	E21	25	6
E15	25	0	E22	0	0
Southern Finland-Estonia					
Estonia	Number of alters	Number of border alters	Finland	Number of alters	Number of border alters
F1	25	0	F4	25	4
F2	9	7	F6	25	0
F3	10	0	F7	17	0
F5	12	7	F8	25	3
F10	25	10	F9	25	11
F11	0	0	F12	0	0
F13	15	4	F15	25	5
F14	19	11	F20	24	5
F16	0	0	F21	25	3
F17	0	0	F22	13	2
F18	25	0	F23	25	1
F19	0	0			

Source: Author's compilation based on fieldwork.

Note: The codes E1, E2,... and F1, F2....indicates the cross-border area (E = Alentejo-Algarve-Andalucía; F = Southern Finland-Estonia) and the number of the interview. They are the identification codes used along the whole research (see Chapter 5).

Table 58: Experts' networks by origin

Mean	AAA		SFE	
	Spain	Portugal	Estonia	Finland
Number of people listed in network (0-25)	19.5	18.36	11.67	20.82
Number of people from the same country	17.9	13.91	7.58	15.73
Number of people from the neighbour country (border relations)	0.9	4.36	3.25	3.09
Number of people from other countries	0.55	0.9	0.83	2.00

Source: Author's compilation based on fieldwork.

Note: Data based on 9 experts interviewee in Spain, 9 in Portugal, 8 in Estonia and 10 in Finland.

We include in the Table 57 the number of alters from the neighbour country reported by every expert. According to the Table 58 we see the average number of relations reported by the experts through the name generator. The average of total contacts (alters) listed by the experts is around 19 people, excepting in the case of the Estonian experts who reported in general less number of people in their personal networks. Regarding the number of people of the same country with whom experts have normally contact is obvious that they represent a bigger number in the whole personal network of the experts. The majority of people tend to relate with contacts who are geographically close to them, even those who live in border areas tend to relate with the most proximal knowns (Lundén, 1973). Nevertheless, while in Spain the average of border acquaintances is one respect to a total of 19.5 contacts, in Portugal the experts tended to report significantly a bigger number of Spanish contacts (4.36). On the contrary, the cross-border relational behaviours of Estonian and Finnish experts are more balanced. In general, among the foreign contacts that the experts mentioned those from the neighbour country were more frequent. This data seems to reinforce what previous studies on cross-border relations have remarked in relation to the general population, specially in the border between south Portugal and Spain (Gualda, et al. 2008).

In the section 6.1 we advanced the relevance that the linguistic competences of the experts and the experience of living in the neighbour country could have for other aspects, like the building of identity. Consequently, once we have described the distribution of the experts networks by origin of contacts one of the immediate questions is to know the relation or co-occurrence between these biographic traits (the knowledge of language of the neighbour country and the experience of living or to have lived in the neighbour country) with experts cross-border networks. Do experts who have lived in the neighbour country has greater number of cross-border relations? The significant experience of living in the other country should lead to greater probabilities to have a cross-border relational pattern.

The co-occurrence between both variables depicted in the Table 59 results to be interesting and evident. We can see that among all the experts who answered the questionnaire of SNA (a total 36), the six experts who have lived or live in the neighbour country have also cross-border networks. The Table 59 indicates also that the experts from the both cross-border areas are socially integrated when they live in the neighbour country. This tendency supports what it was commented in the Chapter 3 that the Spanish, Portuguese, Estonian and Finnish residents

in the respective neighbour country form a immigrant group socially well integrated in their hosting societies.

Table 59: Co-occurrence between cross-border living and cross-border networks

			Cross-border Networks		Total
			No	Yes	No
Live in the neighbour country	No	Number	14	16	30
		% Cross-border networks	100.0%	72.7%	83.3%
	Yes	Number	0	6	6
		% Cross-border networks	.0%	27.3%	16.7%
Total		Number	14	22	36
		% Cross-border networks	100.0%	100.0%	100.0%

Source: Author's compilation based on fieldwork. N = 36.

In the case of our interviewee, the co-occurrence between the level of knowledge in neighbour's language and to have cross-border relations seems less interesting (see Table 59). We can appreciate that only those experts that reported very low level of knowledge of the neighbour's language had also less cross-border relations. Although one of the experts managed with the others' language, there were not strong differences according to the level of knowledge. Beside this data, all the experts interviewed (45) commented to have relations in the neighbour country, mainly due to working reasons.

Table 60: Co-occurrence between language and cross-border networks

Neighbour's Language Competence	To have border networks		Total
	No	Yes	
Very Low	21,7	4,5	13,3
Low	39,1	13,6	26,7
Good	26,1	36,4	31,1
Very Good	13,0	36,4	24,4
Bilingual	0	9,1	4,4
Total	100	100	100

Source: Author's compilation based on fieldwork. N = 36.

Once we have identified the amount of border acquaintances or relations in the neighbour country we focus on the nature of these relations. Do experts have only working acquaintances derived from their professional activity, or do they also have other types of relations beyond those originated from their work. The Table 60 presents the nature of the cross-border contacts that the experts reported in the name interpreters. In general terms, the dominant type of cross-border relation is based on working reasons. The days in which the experts go to the neighbour country and the meetings for joint projects are basically the main contexts where these professional relations begin. In Spain the cross-border contacts are basically those that

emerge from work. In Portugal, where more cross-border contacts were reported, the experts do not only have acquaintances from work but also from friendships reasons. In this sense, the geographical proximity and the particular cross-border behaviour of certain experts is the main reason that explains why some Portuguese experts have more Spanish friends, like is the case of expert E19. This expert declared in the interview to visit the Spanish cities and villages close to the border not only for working reasons, but also because of his consolidated network of Spanish friends. The cross-border network of the Estonian and the Finnish experts is more diversified. From the average of three cross-border acquaintances, approximately two of them tend to be colleagues from work (1.75 in Estonian experts and 2.27 in Finnish experts). But there are cross-border relations due to family reasons, and in less degree to cross-border friends. According to the Table 61, the cross-border networks between our Spanish and Portuguese experts are rather based in the formality of the working relations that have emerged in the institutional setting. While both the Finnish and the Estonian experts do not only have these formal acquaintances or cross-border workmates, but also, more informal links across the border through family and friendship relations, like some brother/sister living in the neighbour country, or friends originated from study exchanges.

Table 61: Experts' networks by type of relation

Mean	Spain	Portugal	Estonia	Finland
Number of people from the neighbour country (Cross-border contacts)	1.09	4.36	3.25	3.09
Number of border contact from family reasons (Cross-border family)	0	0	1.08	0.36
Number of border contacts from firendship (Cross-border friends)	0	1.36	0.25	0.27
Number of border contacts from work (Cross-border workmates)	1.09	3	1.75	2.27
Number of border contacts from other country (Other cross-border relations)	0	0	0.17	0.09

Source: Author's compilation based on fieldwork. N = 36.

How conclusive can be the results of the Table 61 coming from social network analysis? One of the criticisms that SNA receives is regarding the high subjectivity involved when the individual reports people with whom he/she relates. It might happen that the individual does not exactly recall the reality of his/her personal network when he/her cites them in the context of an interview. Regardless, it is a reflection of an individual's awareness of personal relations at a certain moment. By contrast, if we include in the sample all the 45 experts and consider the experts answers along the interviews, we can see that all the experts had cross-border acquaintances based in their profesional activity. All the experts commented in the

questionnaire with semi-structured questions to have personal relations with neighbours, though not all of them reported them in the name generator, as part of their personal network structure.

The difference between cross-border acquaintances reported in the qualitative questionnaire and in the name generator means that though all the experts have cross-border contacts not all of them form part of their normal relational behaviour, just as we try to dig out with the name generator in order to know the intensity of those acquaintances reported during the first part of the interviews. Through the application of the SNA questionnaire the experts usually reported the people with who they normally contact according to the criteria “most usual relationships”. That is, the cross-border contacts commented in the qualitative part of the interviews not necessarily became or were part of their most usual and relational structure the name generator was applied.

In the Table 62 we have included the data from the two parts of the interviews. The data of cross-border acquaintances reported in the qualitative questionnaire, which sample is up to the 45 experts interviewed, and the data of cross-border contacts listed in the name generators (SNA), which is up to 36. Regarding the data from the qualitative questionnaire we can see that all the Spanish, Portuguese, Estonian and Finnish experts reported acquaintances from the neighbour country. But having cross-border contacts as part of usual or daily networks (reported in the name generators) was more usual in Portuguese, Finnish and Estonian experts than in the Spanish ones. At the same time, both in the qualitative questionnaire and in the name generators, all the acquaintances tend to be cross-border workmates. Although in the questionnaires the expert reported to have cross-border friends, beside their cross-border workmates, most of them declared that these friendships started in the professional meetings. First of all, they were workmates that along time became friends. *“Well friends are mainly through work”* (F22, Finland, Professor, University, 2011); *“Because of work... I have a great friendship that started from work”* (E17, Portugal, Manager, Public Institution, 2011). Following the data obtained with the name interpreter, we can appreciate that the Finnish and Estonian experts account more cross-border friends as part of their most usual relations. According to the cross-border family data from the qualitative questionnaire it is also very significant the difference between the Iberian group of experts and the Finno-Baltic one. The Finnish and Estonians commented to have or have had family living in the neighbour country (five Estonian experts and four Finnish experts). While only one Portuguese had family in

Spain. This expert commented to have family living in the province of Huelva (the closest province of Andalucía region to the border). This expert is the same who declared to have a bigger number of cross-border contacts and the only one with a clear cross-border identity.

Table 62: Number of experts reporting different types of cross-border contacts

Number of experts interviewed	Spain		Portugal		Estonia		Finland	
	Questionnaire	SNA	Questionnaire	SNA	Questionnaire	SNA	Questionnaire	SNA
Total of experts	11	9	11	9	12	8	11	10
Experts with cross-border relations	11	3	11	7	12	5	11	7
Experts with cross-border Workmates	11	3	11	7	12	5	11	7
Experts with cross-border Friends	9	0	7	1	7	2	9	4
Experts with cross-border Family	0	0	1	0	5	2	4	2

Source: Author's compilation based on fieldwork. N of the questionnaire = 45.

N of the name generator = 36.

Globally, as it could be anticipated, the number of experts with cross-border family was found related to the number of experts who have lived or live in the neighbour country. In the Table 63 we can see that the 75% of the 10 experts who have lived or live in the neighbour country, have cross-border family or family in the neighbour country. Among the Finnish and Estonian experts is important to remark that some of the 75% had stronger family links than others. For instance, three Estonian experts were married with Fins, and one Finnish expert was descendant of a Finno-Estonian mix-marriage.

Table 63: Co-occurrence between cross-border living and cross-border family in experts

			Cross-border family		Total
			Yes	No	
Live in neighbour country	Yes	Number of experts	3	7	10
		% cross-border family	75.0%	17.1%	22.2%
	No	Number of experts	1	34	35
		% cross-border family	25.0%	82.9%	77.8%
Total		Number of experts	4	41	45
		% cross-border family	100.0%	100.0%	100.0%

Source: Author's compilation.

Note: The data of the Table owes to the description of the sample and not to offer inferential data, though it has been applied quantitative analysis.

Summarising, from the analysis of the answers of the qualitative questionnaire to experts on cross-border cooperation, we found, first, that the Finnish and Estonian experts have more

cross-border acquaintances (see Table 61). This cross-border behaviour is also more balanced than between the Spanish and Portuguese experts, where it is noticeable the less amount of cross-border contacts of the Spanish experts with Portuguese people. Second, all the experts commented in the qualitative questionnaire to have cross-border workmates. It means that the relation of each national group of experts with the respective neighbours is mainly a professional and formal relation, originated in the institutional context of meetings and exchanges. Third, all the experts declared to have cross-border friends in the neighbour country that derived from the working relations.

However, when the second part of the interview was applied, these professional friendships were found more frequently in the Finno-Baltic group of experts and among the Portuguese experts. The Spanish experts do not had friends from Portugal in their network, though in the qualitative questionnaire they mentioned to have friends who were first workmates. It is important to clarify that the mean data in the Portuguese experts is diviated considerably by the personal data of one Portuguese expert (E19) who declared to have many Spanish friends, to visit frequently the Spanish side of the border, to have family living there and to have a cross-border identity. Fourth, in the SNA analysis the number of Finnish and Estonian experts reporting personal friends apart from working relations is considerably bigger (two Estonian and four Finnish experts). Fith, also the number of Finnish and Estonian experts with cross-border family is rather bigger compared to the absence of Spanish experts with family in Portugal and only the Portuguese expert E19 with relatives in the Spanish side. These conclusions reveal the interesting value of the triangulation with the results from the qualitative questionnaire and the name generator. In the name generator the experts tended to establish a hierarchy of acquaintances listed as usual contacts, that they did not in the qualitative questionnaire.

Besides the type of contacts the experts have, we are interested at analysing these relations in terms of time. The durability of the relations in the assesment of social capital is a relevant aspect (Bourdieu, 1980; Coleman, 1988; Foley & Edwards, 1999). For Burt (1997) three usual dimensions to measure the strength of relations are emotional closeness, frequency, and duration of relationships. And the continuity of the relations is a condition sine qua nom the network would have nothing to do (Burt, 2008). The time lenght and the intensity of therelations are then key factors for the mobilization of these relations into used resources. For instance, in the interorganizational relations, trust have been studied as a resource that firms

can foment from their exchange relations along time (Gulati & Sytch, 2008). In the interview were included the questions for how long (in years or month approximately) the expert knew every contact reported, and how often do they contacted with them. According to this data we can describe the strength of experts' cross-border contacts, and to enrich the adscription of the cross-border contacts as more bonding or bridging social ties.

The Table 64 discloses the lenght of all the expert's contacts. Obviously, first come those from the same country. The experts, like the general population, tend to report in the SNA those family and friends who live close to them and form part of their life for longer time. The national relations are then the oldest, especially in Spanish experts (20.87 years). By contrast, the cross-border acquaintances tend to be more recent, though with important differences between countries and both groups of experts. If the Spanish experts have older national relations they are the experts whose cross-border contacts are more recent. The Portuguese experts seem to have cross-border contacts since longer time as part of their usual network. This difference of time is smaller among the Finno-Baltic experts' group. In this case, the Estonian experts have newer relations with Finns than viceverse. In general, the Finnish experts' cross-border contacts are the oldest among all the experts (12.97 years). The bigger longevity found in cross-border relations between Finns and Estonians can have different explanations. On the one hand, the greater family links and other informal ties among them. Some Finnish experts commented their personal interest in Estonia society and history after the Estonian independence that derived also in cross-border acquaintances. *"I was so interesting in Estonia already in the soviet times. I had some secret connections and I found it very exciting. I was going to school and then I contact those emigrants in Stockholm"* (E20, Finland, Manager, Public Institution, 2011). On the other hand, as it was commented in the Chapter 3, the significant amount of Estonian diaspora in Finland, and the relevance of Finnish acquaintancies for Estonian people formed the context of these longer relations, especially for those Estonian people living in the north of Estonia during the Soviet era.

Table 64: Experts' networks by length of relations (years)

Mean	Length of relations			
	Spain	Portugal	Estonia	Finland
National relations	20.87	16.64	17.05	17.80
Border relations	3.25	8.19	9.4	12.97
Other countries's relations	4.67	39	8.80	13.50

Source: Author's compilation based on fieldwork.

Regarding the data disclosed in the Table 65 the frequency of contact that experts have with their acquaintances differs also considerably among the different experts' origin and the origin of the experts' networks. It is interesting to note that the intensity of contact with people from the same country is somewhat different between the Iberian group of experts and the Finno-Baltic ones. While both Spanish and Portuguese experts contact weekly and daily their ties from the same country, in the Finnish and Estonian experts the intensity is much lower. The distribution of frequency of contact is spread more proportionally between once in a month, weekly and daily. Regarding the cross-border ties of the experts, there are even more discrepancies across each group of experts. It is presumably expected that the intensity of contacts will be less and this is what can be observed in the Spanish experts, although most of the cross border acquaintances are contacted weekly. By contrast, the Portuguese experts tend to contact with less frequency their Spanish ties. Half of the contacts are made once in a month. This can be explained because most of the Spanish ties reported in the interview were from work who are necessarily contacted with more frequency. The Portuguese reported more friends in the neighbour country who are less contacted than the working relations. The Estonian experts have also more intense contact with their Finnish ties (23.1% and 25.6% are contacted once in a month and weekly respectively) than the Finnish experts, who most of their cross-border relations are contacted some times (61.3%). The Estonian experts' greater intensity of cross-border contact, with 17.9% of ties contacted daily, can be related to the slightly bigger amount of family ties (See Table 60) as three Estonian experts were married with Finns.

In terms of time and intensity of contact, the cross-border contacts of the Spanish experts seem to be stronger ties, though more recent. The Portuguese experts have older and more stable and durable relations with Spanish people, though less intense. That is, the Spanish experts' rapprochement is being more recent and more intense to their Portuguese neighbours, while Portuguese experts have less intense contact though they are already older and stable ties maintained along time.

The Estonian and Finnish experts have older cross-border contacts compared to the Iberian group of experts. Nevertheless, the Estonians seem to have stronger ties according to the time and intensity of their cross-border relations, while the Finnish experts have weaker ties, as the majority of them contact their Estonian acquaintances some times.

Table 65: Experts' networks by frequency of contact

Country and Type of relation	Frequency of contact (%)						
	Never	Hardly never	Some times	Once in a Month	Weekly	Daily	Total
Spain							
Nacional Relations	0	0.5	7.1	20.8	40.6	31	100
Border Relations	0	0	16.6	25	41.7	16.7	100
Other Country Relations	0	0	33.3	0	66.7	0	100
Portugal							
Nacional Relations	0	0	19.6	5.9	27.5	47.1	100
Border Relations	0	4.2	52.1	37.5	6.3	0	100
Other Country Relations	0	0	0	0	0	100	100
Estonia							
Nacional Relations	0	1.5	24.2	31.08	28.4	13.6	100
Border Relations	0	2.6	30.8	23.1	25.6	17.9	100
Other Country Relations	0	10.0	60.0	30.00	0	0	100
Finland							
Nacional Relations	0	2.3	19.3	25.6	34.7	18.2	100
Border Relations	0	6.5	61.3	29.00	3.2	0	100
Other Country Relations	0	0	59.1	27.3	13.6	0	100

Source: Author's compilation based on fieldwork.

Given this, it may be concluded that the cross-border relational behaviour of the Iberian group of experts is less that in the Finno-Baltic group (see also the Table 57 and the Table 61). The cross-border contacts of the Iberian group of experts are also more institutionalised, instrumental and weaker than the Finno-Baltic group. The cross-border contacts of Portuguese and Spanish experts with their respective neighbours are more based on working reasons. Their relations are consequently more instrumental than those from family and personal links. These relations are much more dependent on the formal and schedule of the professional agendas, and dominated by the formal participation of experts in cross-border projects and other initiatives. Consequently, after these formal frames, cross-border friendships do not necessarily must endure along time and with the same intensity. Instead, the cross-border relational behaviour between Finnish and Estonia seems to be a more a normalized trend in their lives. Their ties are based on both informal relations due to family or personal friends, and on formal relations derived from their work in cross-border cooperation. They have both the formal and instrumental relational pattern and the informal and more emotional links. The Finno-Baltic group of experts have a closer link with the Finnish and Estonian populations in general. They have stronger ties beside or independently of the relations from the official

cross-border cooperation. Although unbalanced between Estonian and Finnish, they have more reasons for exchange and visiting the neighbour country, because the relation to the neighbour country finds deeper and closer roots, as they have family and friends as well. Among the Finnish and Estonian experts we can consider that their cross-border relations do not represent only weak and loose relations but also more emotional closer and dense relations.

The weak ties act like bridges between separated sub-groups. They represent structural holes (Burt, 1992), that is, people like friends, colleagues or acquaintances that in certain moment represent a potential opportunity for ones' own benefits. In this sense, the cross-border contact in the Iberian group of experts is less intense and more formal compared to the group of Finnish and Estonian experts. Despite all, these contacts in the neighbour country represent those weak ties that enhance the possibilities of those experts for their own personal sake and for their professional activity. The loose social networks of the experts in the neighbour country are then important for achieving resources and accessing to new information, what practically social capital is about.

These differences in the nature and strength of the relations with neighbours in both groups of experts represent the type of cross-border social capital that the experts have. The question now is if differences between both groups could be interpreted as a stronger or weaker social integration between neighbours in the cross-border region of SFE than in the AAA. The concluding remarks pointed above are based in the description of a small community of people that by their professional profile are expected to have a different relational behaviour with the neighbour country. Results, though not statistically representative, are very valuable and encourage the improvement of further research with bigger samples of respondents. It will be of great value, for instance, to know if these different patterns of relationships are below different ways in which CBC is taken place in Europe. This question definitely urges further research to be conducted on bigger samples of population.

6.3.2. Types of experts' networks structures.

Examining the experts' networks in both cross-border regions, we have extracted a synthetic typology of personal network structures applicable to both cross-border areas. This typology has been designed according to two dimensions:

1. The territorial origin of the experts' alters or ties. In relation to some of the indicators displayed in previous tables, the experts' networks were clasified according to:

- the total number of people reported in the personal network;
- number of people in their personal network from the same country as the expert;
- number of people from the neighbour country;
- number of people from third countries.

Additionally, the number of people reported from the same country were discerned into the following indicators:

- the number of people from the same city as the expert;
- number of people from other localities and counties;
- number of people within the same region of experts (Algarve, Alentejo, Andalucía, Southern Finland (Etelä-Suomi) and Harjumaa (Harju county) in Estonia)ⁱ;
- people from other cities of the country.

2. The kind of relation that the experts have with them, that is:

- work relations,
- friendship,
- family or
- other type of reasons like knowns or neighbours.

As a result, eight different types of experts' networks were identified from the total amount of 36 respondents across the four countries. This typology is supported also in previous empirical analysis in the cross-border region AAA (Gualda et al., 2008; Gualda et al, 2012, Gualda & González, 2010). The sample of Finnish and Estonian experts has permitted to enlarge and enriche this previous typology with other networks types existing in the cross-border region SFE (González & Gualda, 2013). Principally, these types of networks have been categorized into those without cross-border contacts and those that have cross-border contacts and/or some other contacts from third countries, independently of how many contacts. Among those experts who did not report any contact from the neighbouring country, we can differentiate between those whose network is more locally oriented and those more locally-regionally oriented. The rest of the networks have the indicator of cross-border relations in fewer or greater number which is concomitant with the local and regional relations. However, it is also interesting to note that other types of networks introduce an additional indicator of

international relationships. In our data, this tends to occur more frequently among experts from Southern Finland (Etelä-Suomi).

The Table 66 displays the distribution of these eight categories by the origin of the experts. Before going in depth with the description of each type of network structure, we can see that in each group of experts dominates a certain type of network. Hence, the networks based in the local proximity of experts' alters dominate in the Spanish experts, as three experts have a local network type and four have a local-regional type. The Portuguese experts tend to have a broader type of network compared to their Spanish counterparts, as four of them have a Local/Regional/Border networks, that means, that their alters locate not only in the local-regional territorial proximity within the country, but also in the cross-border territorial proximity. Very surprisingly are two experts with a Local-Regional-Binational network, whose some of their cross-border relations where not located in the proximity area to the border but in other cities beyond the border area, like capital cities of Spain (Sevilla or Madrid). Among the Estonian experts there are both local and local-regional networks, but they have more in the Cross-border/International type of network. That is, experts that have significant number of usual contacts in Finland and other countries. The Finnish experts open a new category where they dominate. The Local/Regional/Border/International network is mainly the most comprehensive type, as it means that those experts have among their usual relations all kind of alters, from the local proximity, other parts of the country, from Estonia and from third countries. By last, it was identified the only cross-border network present in a Portuguese expert, for whom most of the usual relations are located in the Spanish territory closest to the border.

Table 66: Distributions of experts' types of networks by country

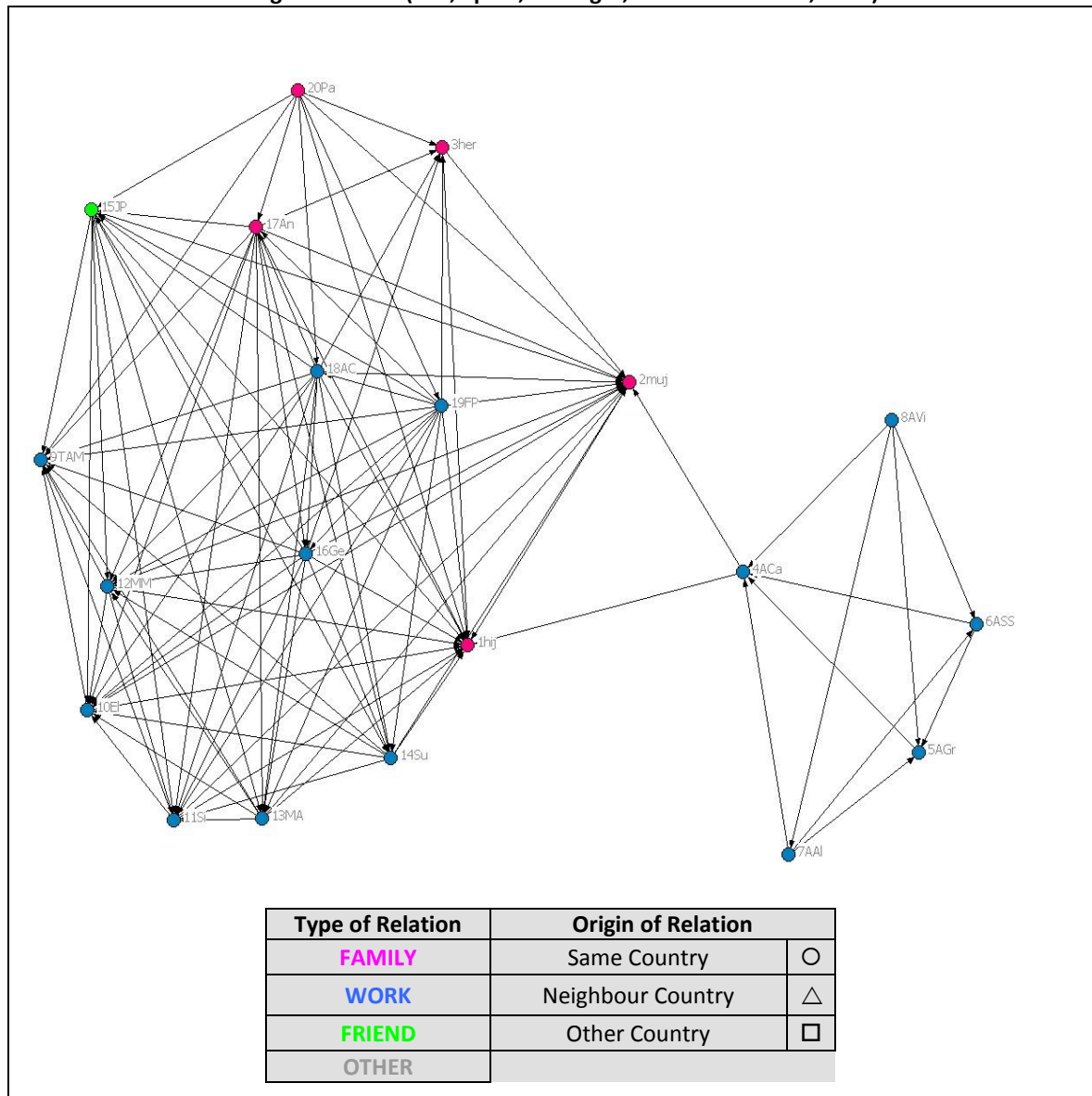
Types of networks	Spain		Portugal		Estonia		Finland		Total	
		%		%		%		%		%
1. Local	3	33			1	12.5			4	11.1
2. Local/Regional	4	44.4	2	22.2	2	25.0			8	22.2
3. Local/Regional/ Border	1	11.1	4	44.4	2	25.0			7	19.4
4. Local/Regional /Binational			2	22.2					2	5.6
5. Cross-border			1	11.1					1	2.8
6. Local/Regional/ International	1	11.1					3	30	4	11.1
7. Cross- border/International					3	37.5	1	10	4	11.1
8. Local/Regional/ Border/International							6	60	6	16.7
Total	9	100	9	100	8	100	10	100	36	100

Source: Author's compilation based on fieldwork.

The visual representation of the experts networks is also one of the main targets in this Chapter. Previous researches have identified types of personal networks. But in this study is interesting the application of different typologies extracted from the interviews of four different countries. To represent the Graphs of the networks structures helps in the description of the experts' networks in general terms, searching for the patterns of relations according to the origin of alters and type of relations between the experts and the alters. Once we identified the different types of networks according to data in the Table 66, we have represented an example of each type with the software Netdraw (an application integrated in programme Ucinet for the visualisation of networks). The following description presents and describes each example for each type of network identified across the 36 experts' personal networks from both cross-border regions

1. Local: This network structure means that experts usually relate with people very close to the territory where he/she lives. It is a network limited to spatial proximity where the majority of contacts are from the same municipality of the experts. This kind of network was found mostly on the Spanish side. The Figure 5 (as example) belongs to a Spanish expert from a local municipality of the border area. Despite being close to the border and participating in CBC, this expert is representative of the stronger endogamy of national networks among the Spanish experts. The network also shows the high density of the expert's family and work relations, with a second group of work ties.

Figure 5: Local (E14, Spain, Manager, Public institution, 2011)

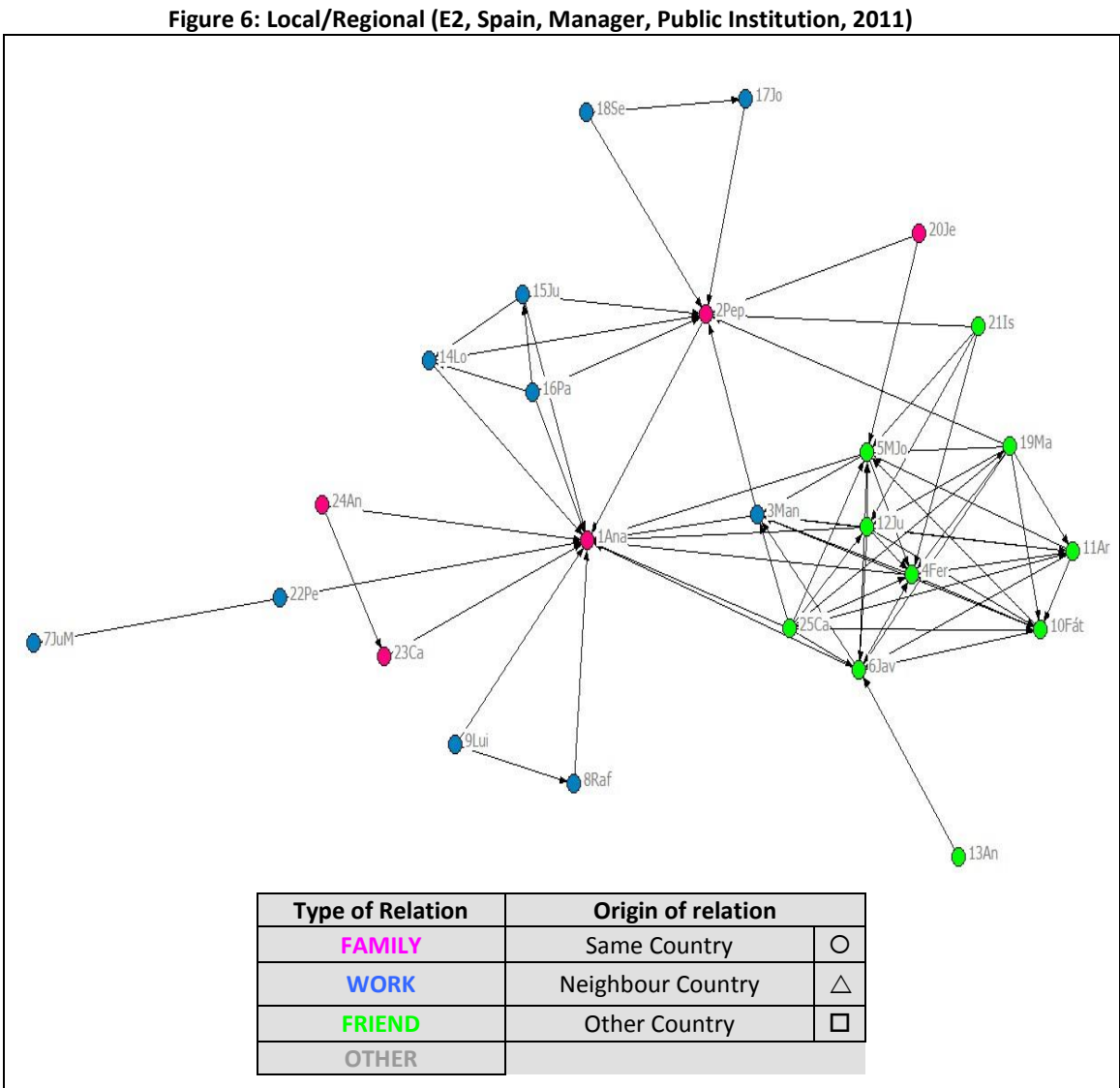


Source: Authors' compilation based on fieldwork.

2. Local/Regional: In this type, the majority of people reported belongs to either the same municipality where the experts live or to other close localities generally within the same county (in the case of Finland and Estonia), province (in the Andalusian region) or *concelho*³ (within the Algarve or Alentejo regions). This kind of network occurs mostly with experts who live and work in a different place from where they come from. Thus they do not show a strong density of their personal networks. This network (Figure 6) belongs also to a Spanish expert who lives and works in different localities. This pendular mobility explains that the

³ The local administrative division in Portugal is structured in two levels. The *Concelho* is the most important local division. The *Concelho* has subdivisions named *Freguesias* which are the lowest level of local administration in Portugal (Gualda et al, 2008).

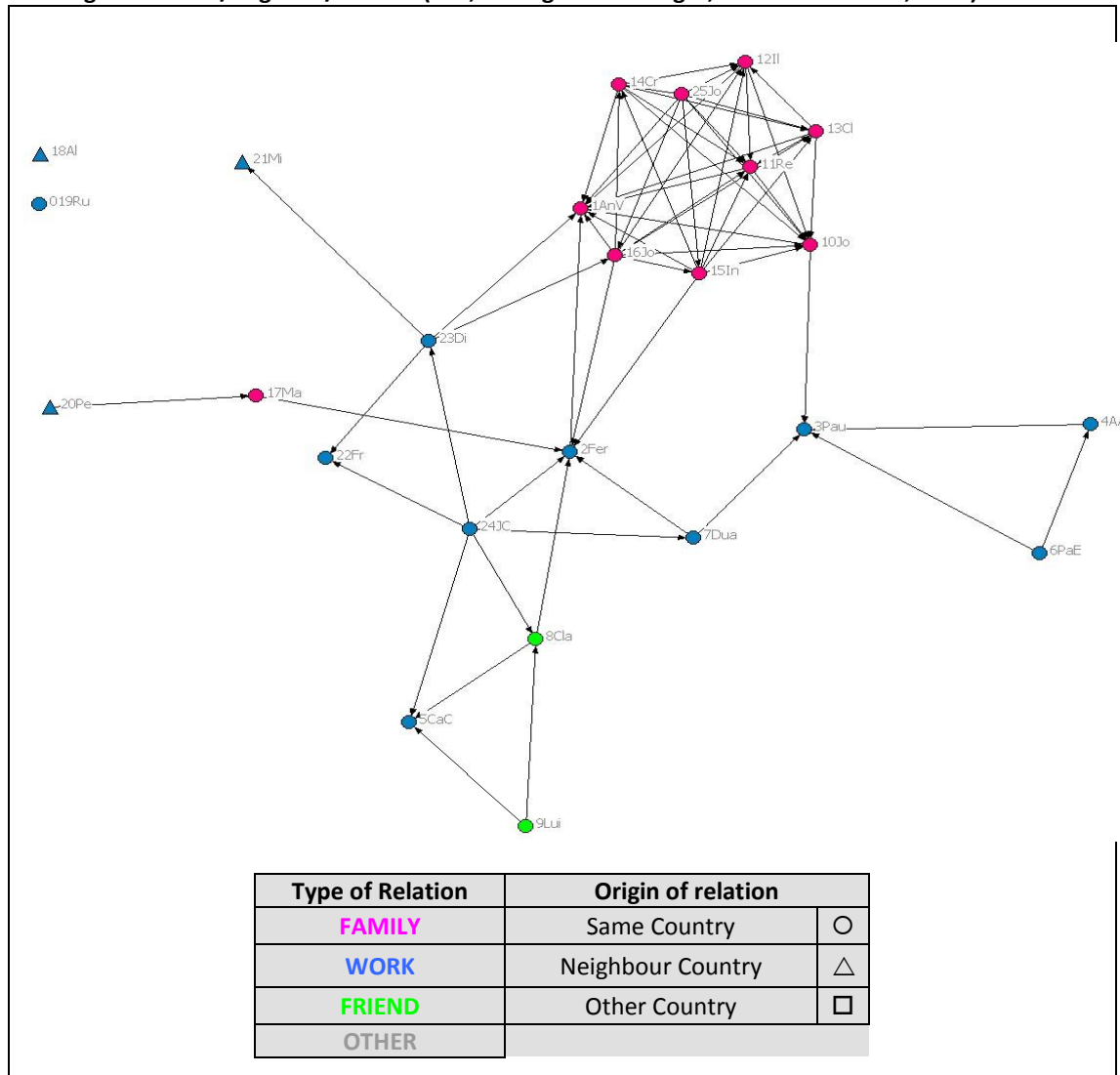
relations between alters are less dense and they grouped more on the base of the type of relations.



Source: Author’s compilation based on fieldwork.

3. Local/Regional/Cross-Border: This type of network structure practically corresponds to the former with additional border relations. Though experts’ networks are based in local and regional relations, in some cases there are some ties from the most proximal area of the neighbouring country to the border. Most of the networks of this type were found in the Portugal side of the cross-border region AAA. Consequently, the density of the network is not so strong as experts alters are very disperse. The network reflected in the Figure 7 belongs to a Portugese expert. We can see that the alters from family have a high density compared to those from work. At the same time, it appears some cross-border alters who are not very integrated or isolated in the personal network structure.

Figure 7: Local/Regional/Border (E10, Portuguese Manager, Public Institution, 2011)

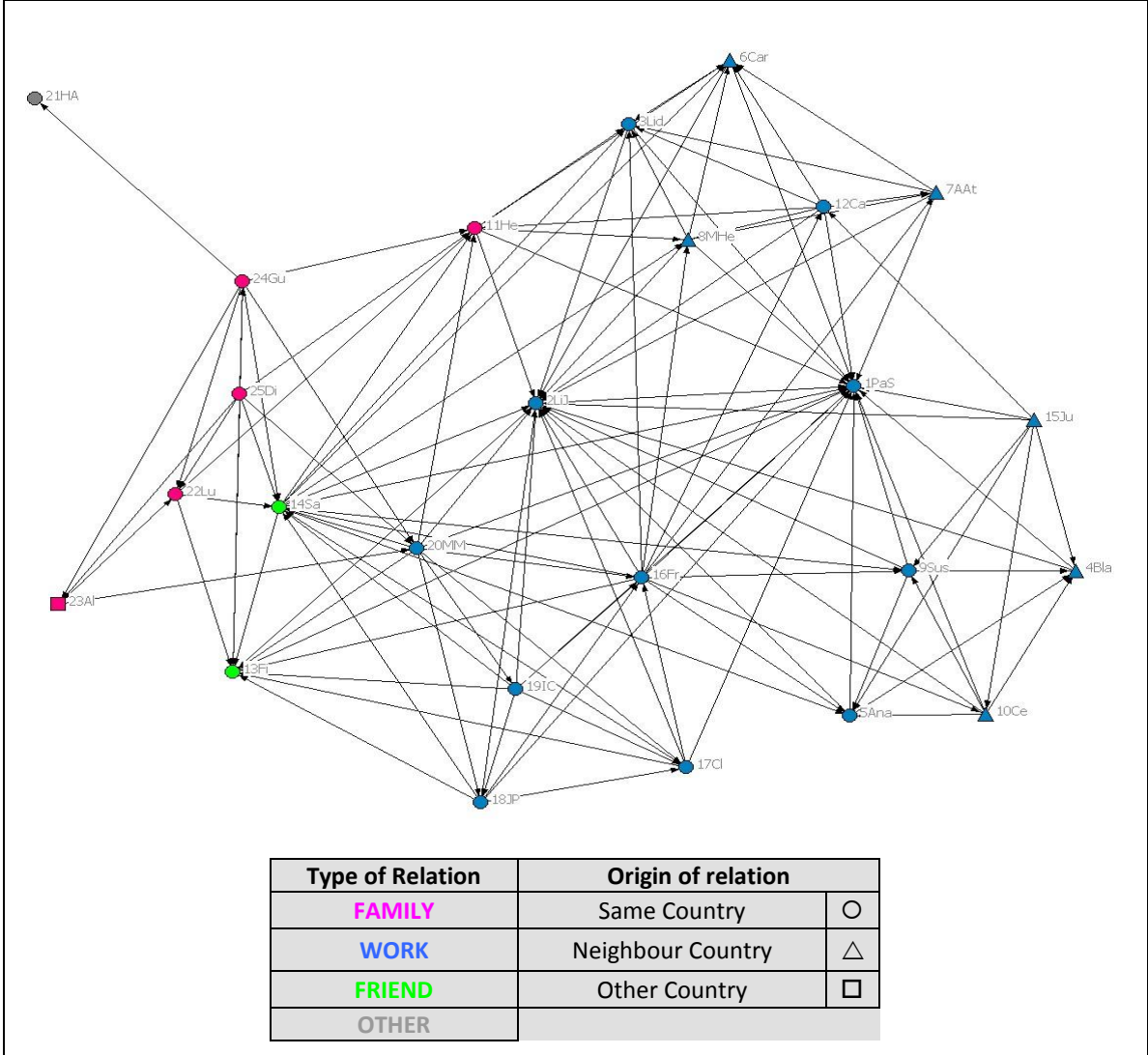


Source: Authors' compilation based on fieldwork.

4. Local/Regional/Binational: This type is also very similar to the precedent. Although the expert listed people from the neighbour country, these acquaintances were not from the border area. In the case of the AAA cross-border region, these relations came from important cities of Spain and Portugal. In the case of the SFE cross-border region, people cited were from places further from the border area, such as the south of Estonia or northern counties of Finland, for example. The professional trajectory and mobility explain why certain experts relate more with people from the neighbouring country that is not located in the border area. The personal network of the Figure 8 shows a Portuguese expert's network characterized by a great density and the predominance of work links. Some of them are cross-border relations from the biggest cities of Spain. This expert works at the regional level in CBC and has work contacts mostly

with people who live in Seville and Madrid, where regional and national institutions involved in CBC are located.

Figure 8: Local/Regional/Binational (E21, Portuguese Manager, Public Institution, 2011)

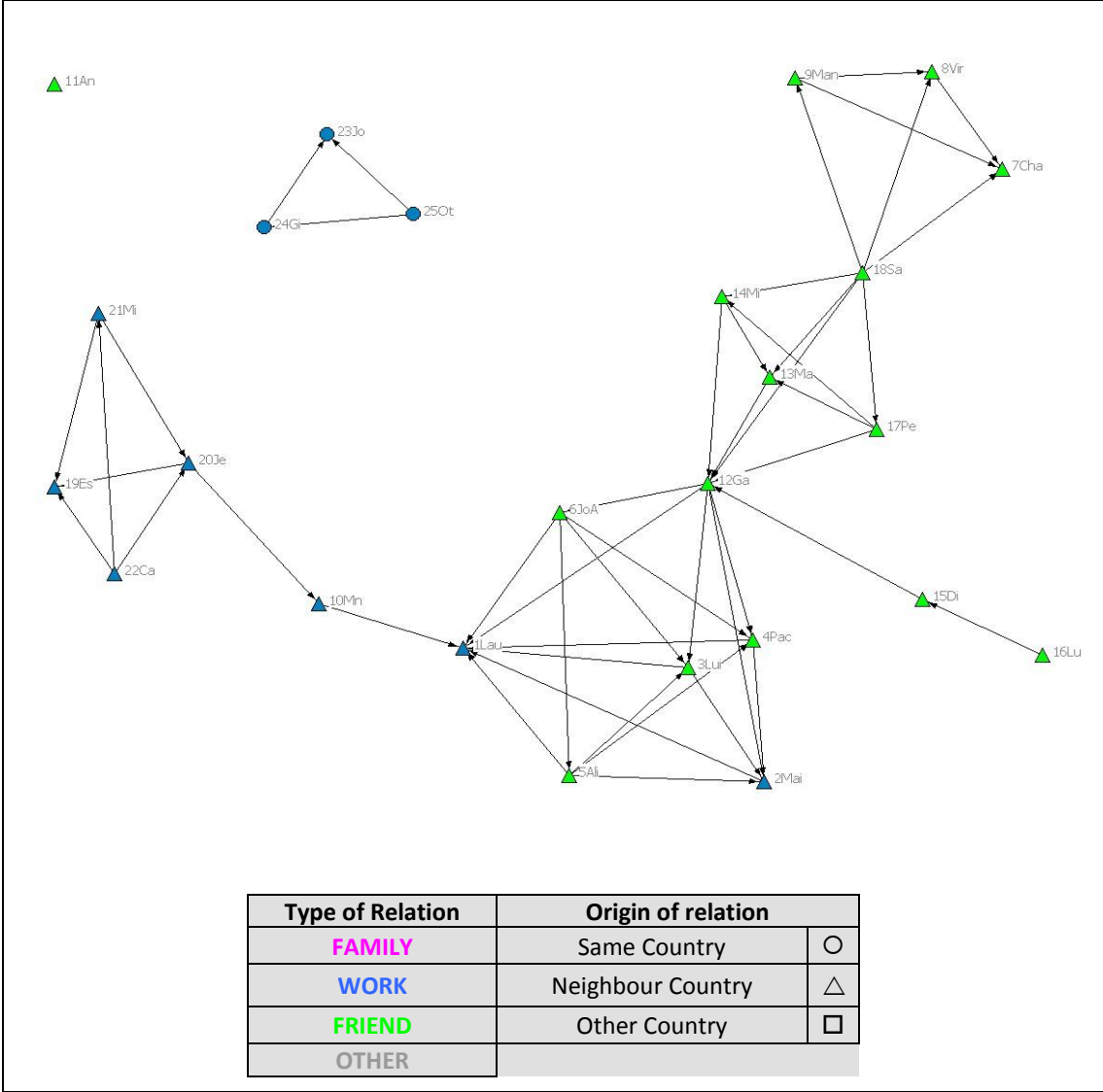


Source: Author’s compilation base don fieldwork.

5. Cross-border: This type of network structure corresponds with the experts that cite people from the border area of the neighbouri country in the same or greater number to those from the same country. Indeed, this kind of network depicted in the Figure 9 was reported only by one expert from Portugal out of 36 experts. And it is explained especially by the expert’s specific, personal links to the neighbouring country, whose life is related to Spain both for working and personal reasons. His network structure highlights by the bigger number of cross-border alters, the low density of the network, and the existence of different subgroups not very related among them. The experts has both friends and workmates in the spanish closest area to the border, beside very few national workmates. This kind of network might fit well with the idea

of regionauts, meaning by that a prototype of cross-border citizen who has developed skills of using the world on both sides of the border (O'Dell, 2003, in Löfgren, 2008, p. 196).

Figure 9: Cross-border (E19, Portuguese Manager, Public Institution, 2011)

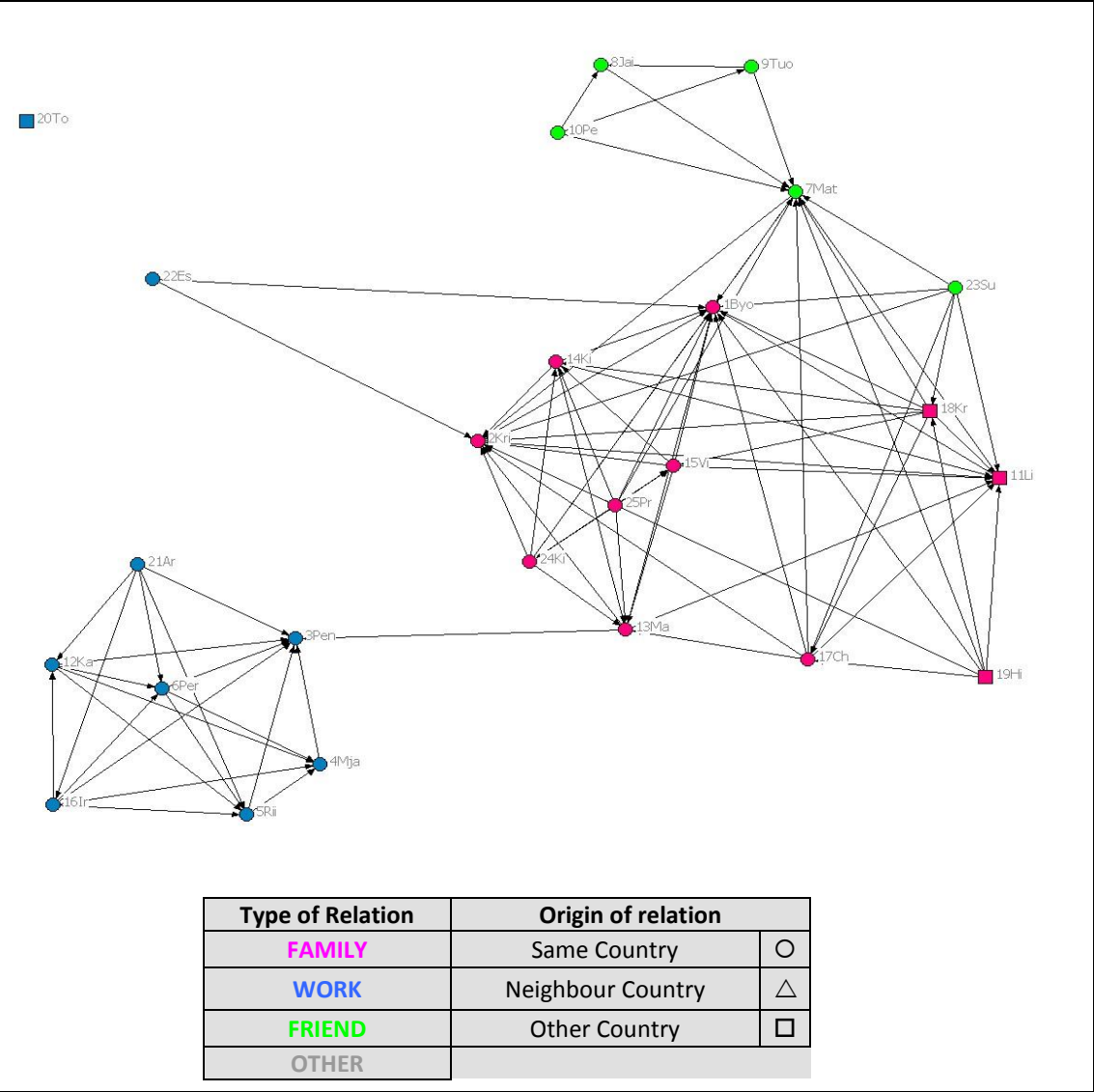


Source: Author's compilation based on fieldwork.

6. Local/Regional/International: This network structure is practically an expansion of the network two, Local/Regional; with the exception that it incorporates some people from other countries. The majority of people listed by the experts are from the same locality or region. The expert has an open and not dense network, with foreign contacts, though they are not from the neighbour country. This network refers to those experts whose lives take place in the limited proximity of their alters at local and regional levels, and have some close relative or friends living in other countries. In the Figure 10 we can appreciate a Finnish expert's personal network with three different big subgroups. The family network with dense relations

among the alters, the work group of alters, and friends. By last, an isolated alter from the rest of the network is from other non European country.

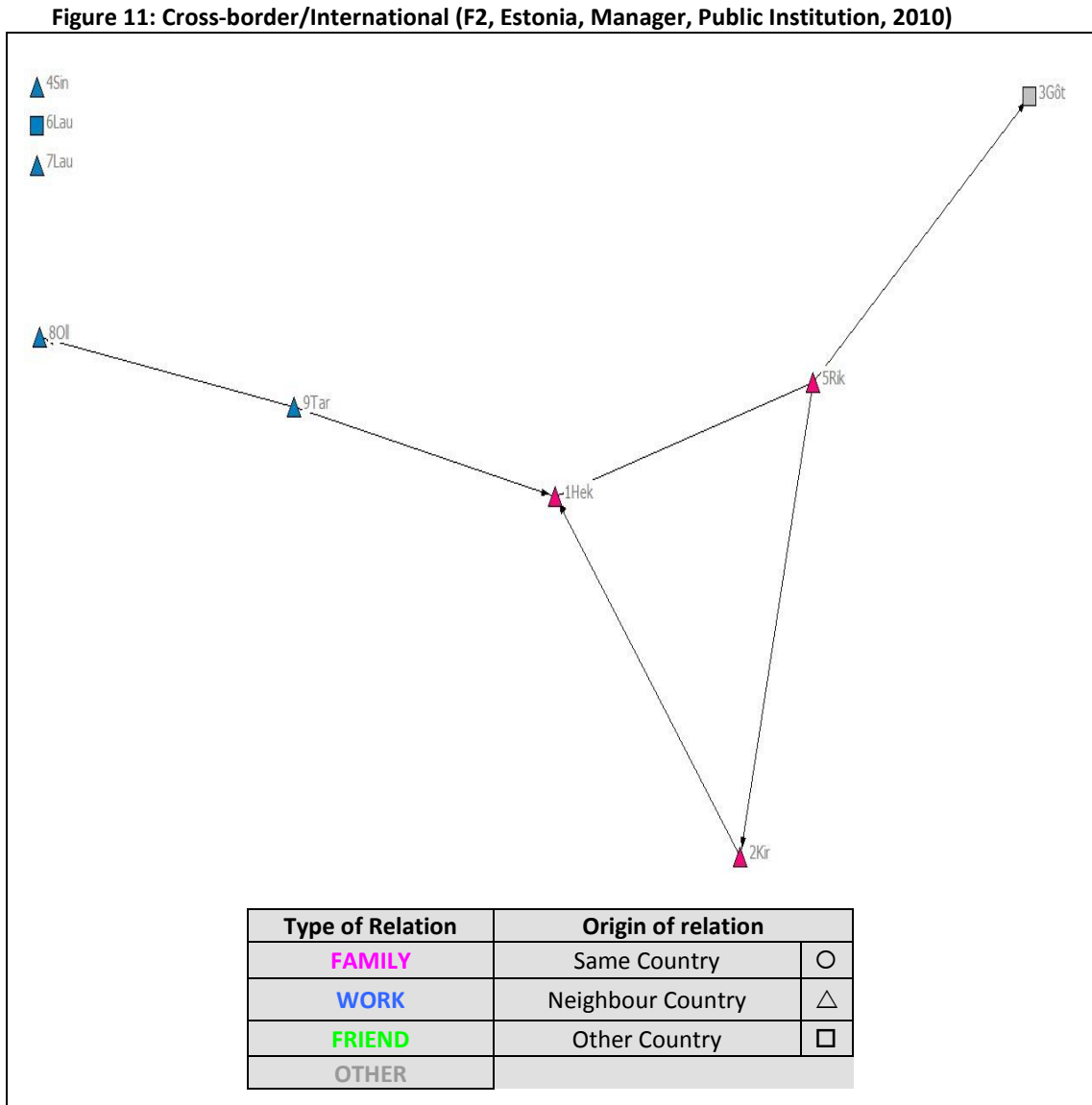
Figure 10: Local/Regional/International (F6, Finland, Manager, Development Agency, 2010)



Source: Author's compilation based on fieldwork.

7. Cross-border/International: This type is similar to the network type five Cross-border, though with the international dimension added on the expert relational structure. It corresponds with those experts whose network included a similar or greater number of people from the neighbour country and third countries to the number of people from the same country as the expert. It is reasonable that this kind of network appeared in those experts who have been living or live in the neighbour country or in other third countries. Their greater geographical mobility in respect to average population makes their personal network structure to be very spread and disperse. The experts from Estonia showed more this pattern. The

Figure 11 depicts a particular network of an Estonian expert that has had high professional international mobility and works in CBC with Finland. The network is rather open, with an important number of Finnish contacts both for personal and working reasons. At the same time, the expert has other international alters not very integrated in the experts' network.

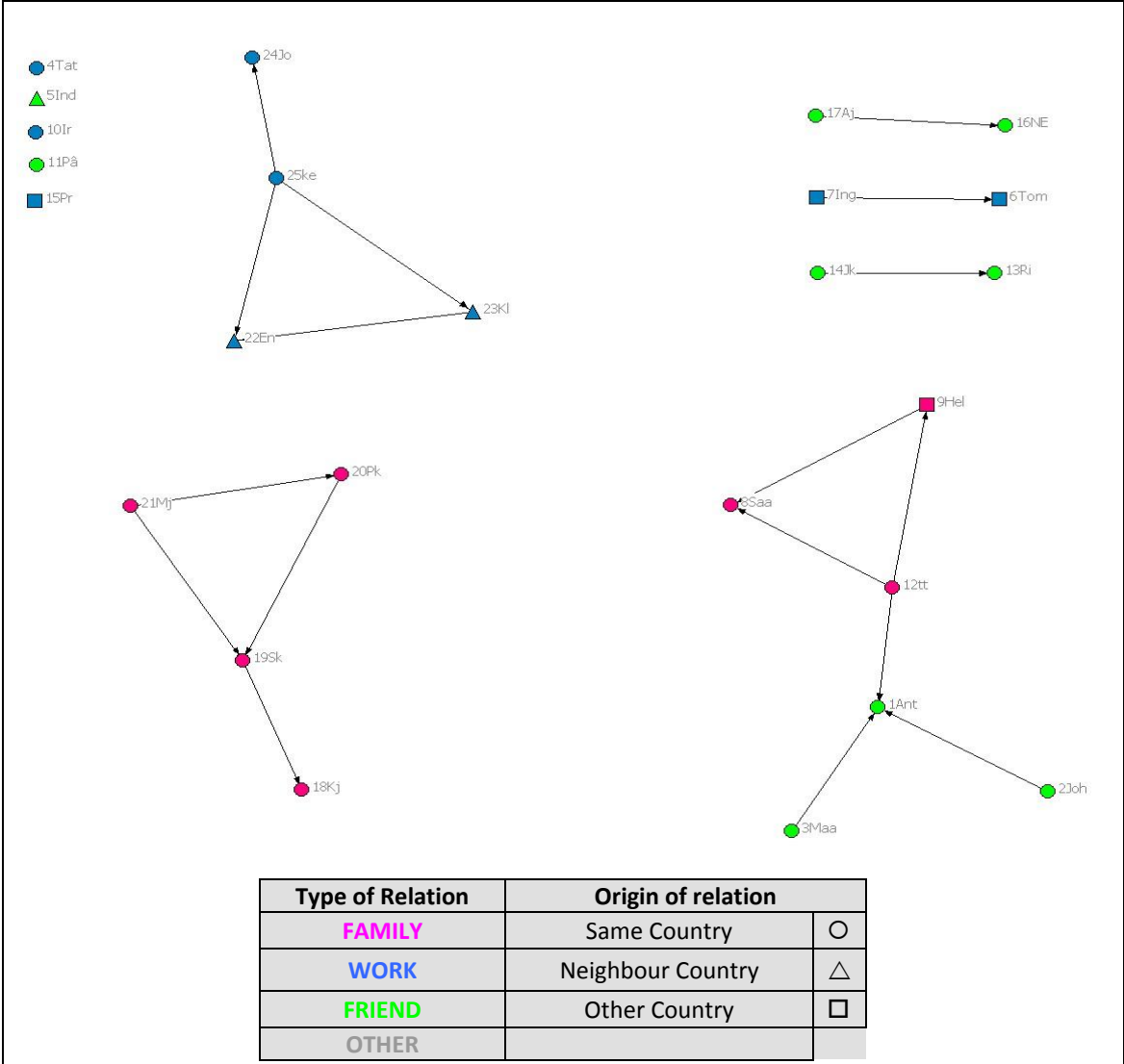


Source: Author's compilation based on fieldwork.

8. Local/Regional/Cross-Border/International: We could affirm this last type as the most complete and integrative type of network structure that was found. It is like an accumulative type of the all the previous ones. The majority of relations reported by the experts pertain to the same country distributed between the same localities as other places. At the same time, approximately one third of the experts' relations are both from a border area of the neighbour country and from some other country. As it was advanced, this kind of network was more common among the Finnish experts. All the experts with this type of network had significant

border links to Estonia, as they have work links or have lived in Estonia. As an example, the figure 12 shows a Finnish expert’s network who has lived for several years in Estonia due to work-related reasons, and currently works in CBC. The network is also very dispersed with many small and independent subgroups of family ties, work and friends ties. And the number of isolated alters is significantly bigger than in other network types.

Figure 12: Local/Regional/Border/International (F20, Finland, Manager, Public Institution, 2011)



Source: Author’s compilation based on fieldwork.

One of the questions emerging from this typology is to know if the experts’ networks are related to the experts’ feeling of identity discussed in the section 6.2. The Table 67 is a table of contingency with the purpose to represent the co-occurrence between both variables. Previous studies have discussed the relations between the types of networks and other psico-individual variables, like role segregation between wives and husbands in families (Bott, 1955) or coping strategies of families with handicapped children (Kazak & Marvin, 1984) or the

immigrant's use of social services and immigrant's level of depression (Maya, 2002). Molina and Aguilar (2004) detected that there is a relation between the composition of the networks of youngsters in Sarajevo and their ethnic identity discourses. Thus, those with a more cosmopolitan identity discourse had a very ethnically diverse network. Lubbers, Molina and McCarthy (2007), argue how both the individual and network characteristics of immigrants in Spain contribute to understand the ethnic self-identification. In the same way, we find correlation between the experts' identity and their network type. The type of network and type of identity have an interesting co-occurrence represented in the Table 67. We appreciate how those experts who have more local or/and regional oriented networks tend to have a more local/regional identity. In the same way, the experts with cross-border and international relations show a broader feeling of identity beyond the local and national limits, like the supra-regional identity, dominant in the Finish experts, or the European-Global identity. Very significantly is the case of the expert (E19) with a cross-border identity and whose network is the only detected as cross-border composition. This finding tendency is of great interest for researchers and policy makers and it could be examined and corroborated in future researches with bigger samples.

Table 67: Co-occurrence between networktypes and experts' self identity feeling

NetworkType	Experts Self Identity Feeling								
	Local	County/ Province	Regional	National	Supra regional	Bi- National	European/ Global	Cross- border	Local
Local	33.3	25	0.0	0.0	0.0	0.0	0	0	11.1
Local/Regional	11.1	50	0	33.3	0	0	75	0	22.2
Local/Regional/ Border	11.1	0	42.9	33.3	0.0	50.0	0.0	0.0	19.4
Local/Regional- Binational	0.0	0	28.6	0.0	0.0	0.0	0	0	5.6
Cross-border	0.0	0	0.0	0	0	0	0	100	2.8
Local/Regional/ International	11.1	25	0	0	33.3	50	0	0	11.1
Cross-border/ International	11.1	0	14.3	33.3	0.0	0.0	0.0	0.0	11.1
Local/Regional/ Border/ International	22.2	0	14.3	0.0	66.7	0	25	0	16.7
Total	100	100	100	100	100	100	100	100	100

Source: Autho's compilation based on fieldwork.

6.3.3. The role of experts's cross-border relations in their personal networks.

In the exercise of analysing the cross-border relational behaviour of the experts, the objective in this section is to enquire the role of the alters from the neighbour country in the experts' personal networks. As we have seen before, unlike in the cross-border region AAA, the experts in the cross-border region SFE have higher number of contacts in the neighbour country respectively due to working and personal reasons like friendship and family ties. The interest is to know the role that these relations play in the whole experts' network structure. Are they important relations within the whole network or do they form only isolated alters with whom only the expert maintains relations with? What we aim exactly is not only to describe and analyse the whole network of each expert, but rather to identify the alters from the neighbour country in terms of centrality and subgroup measures, and to describe the role that they have in the whole network structure. Thus, the following tables reflect the relevance of the alters from the neighbour country in each expert' personal network according to different indicators of the social network analysis. The description of these tables will contribute to know: to what extent the alters from the neighbour country are integrated among the experts personal network, and consequently the influence in the experts network; and to know if they are relevant or key actors.

From the second part of the interview, using the name generator, the relations between the expert' alters were reported and analysed with the help of the Ucinet and Netdraw programmes. Different measures of centrality and subgroups were extracted from each network. From the data it was identified those alters from the neighbour country in order to know their weight in absolute numbers and/or in percentage within the whole network. In the Chapter 2 we described the different concepts and measures of social network analysis that proceed for the research of this study. Thus, the following tables represent data on centrality or cohesion like density, and degree centrality and betweenness centrality (for definitions, see Chapter 2). These measures in the Table 68 and Table 69 will tell us about the extent of the power or influence capacity of the alters from the neighbour country in each expert's personal network. We will detect if the alters from the neighbour country have an important position within the experts' network structure and the differences across both cross-border regions. The Table 70 represents data of subgroups like cliques, clan, bloques and bridges of each expert's personal network.

The Table 68 shows the data on density, network centralization, and normalized degree⁴. There are significant differences across both cross-border regions in the density of the experts' networks. It is noticeable the homogeneity concerning the density of the whole Iberian group of experts, which is the maximum. By contrast, the density of Finno-Baltic group of experts varies. There are experts with a high density in their network while others experts have very low density. The stronger cohesion that show the experts from Portugal and Spain indicates that the experts have very cohesive network structures where more than half of their alters have relations among them. It is interesting to highlight the relation of this feature on cohesion of the personal network with the cultural characteristics of societies which are pointed as being whether individualistic or collectivistic. Following Hofstede (1994) in those individualist-oriented societies the ties between individuals tend to be loose, while in the collectivist-oriented societies people are integrated within strong and cohesive groups. In a cross cultural study in the organizational setting (González, 2010) Estonian cultural values appear close to Finland values, being both similarly as more individualist-oriented; and Spain as moderate collectivist in contrast to the more collectivist scores of Portugal in collectivism values.

Looking at all the Graphes of the experts' networks (see Annex 4), those with lower density have in their personal network isolated alters and/or cohesive subgroups of alters not related among them. Concerning the macro indicator of the network centralization, this tends to be moderately higher in the experts of Spain and Portugal. In their networks the influence or power among the alters is not very equally distributed. By contrast, among Finnish and Estonian experts we find with more frequency experts whose networks have a moderated and low network centralization, what means that the capacity to influence of some actors over others is not so strong, and there is less concentration of power.

Looking at the Table 68, the mean and standard deviation of the Nrm Degree helps to enquire the relevance of the alters from the neighbour country in the expert's personal network. In the columns, Alters from the neighbour country $\geq$ Mean Nrm Degree, and % of Alters from the

⁴**Density** is the proportion that represents the total number of relational ties divided by the total number of possible or potential ties that could have the network

Network Centralization indicates the degree to which the connections in a network are concentrated around a small group of actors. It represents the extend to which there are actors with central positions in the network.

Normalized degree represents the degree of power that a certain individual has within a complete network. The degree is the sum of all the relations (indegree and outdegree) connected to an actor, or the number of points to which a point is adjacent.

neighbour country $\geq$ Mean Nrm Degree, we marked those alters from the neighbour country whose degree was equal or superior to the mean of Nrm Degree. According to this criteria, very few alters from the neighbour country (N.C) appear with a NrmDegree equal or higher than the mean of Nrm Degree of the whole network (see Table 68). This means, in terms of power, that though the experts reported alters from the neighbour country, these alters do not approximate to the capacity of influence that the other alters from the same country have in the experts' networks. In terms of communitation or flow of information these alters would not be placed in an advantage position in order to get involved with the experts' national alters. The general tendency is once again the differences between experts by the cross-border regions. In the majority of the experts in the cross-border region AAA the alters from neighbour country do not have a relevant position in the whole experts' personal networks. Consequently, they tend to be connected with the expert, though not strongly with the rest of alters, mainly those national alters. In the cross-border region SFE we find in some experts' networks that some of the alters from neighbour country tend to have a key role in the expert network structure. Herein we will comment the data of the following tables and later on we will focus on a more detailed analysis of the network structures of some experts.

In the case of the three Spanish experts who have alters from the neighbour country. (E1, E3, and E12) only in one expert's network (E1) these alters appear to be relevant among the whole expert personal network. All the alters from the neighbour country have a Nrm Degree higher than the mean 31.66. This means that the alters from Portugal have considerable influence in the whole personal network of this expert. They have an advantaged position and could have access to the other national alters of the expert. Among the Portuguese experts is observable a different pattern. The Portuguese experts' alters from the neighbour country are more integrated and have a favourable positions in the experts' network. In five Portuguese experts, out of seven, who reported to have relationships with the neighbour country, we find that they have some Spanish alters that have access to the experts' network and the expert national alters. In the other two experts' network the alters from the neighbour country represent peripheral nodes of the experts' personal network. Nevertheless, in the case of three Portuguese experts (E16, E17, and E19) we see how a high percentage of the alters from the neighbour country (100%, 100% and 54.5) respectively have a Nrm Degree higher than the mean Nrm Degree (19.66, 35.00 and 15.66). In the experts E16 and E17, the alters from the neighbour country reported are very integrated with the experts' national alters, both work-related alters and friendship-related alters (see Graphs E16 and E17 in Annex 4). We

found again the particularity of the expert E19. The alters from the neighbour country represent 88% of the network, and half of them (54.5 %) have a Nrm Degree higher to the mean 15.66%. However this expert network is mainly based in alters from Spain. As it can be appreciated in the Graph E19 (in Annex 4) they are all disconnected from the national alters. Thus, we can not value the high centrality of the alters from the neighbour country comparatively with the national alters. This Portuguese expert seems very integrated with Spanish alters, while the Spanish relations are not connected and do not have capacity to reach the expert's national alters. This analysis of Nrm degree of the alters from the neighbour country in experts' personal network reminds the imbalance relational behaviour of Spanish and Portuguese experts with their neighbours that we advanced in the section 6.3.1.

Regarding the Finno-Baltic group of experts we appreciate some differences compared to the Iberian group. There is less unbalance considering the relevance that the alters from the neighbour country represent in Finnish and Estonian experts' personal networks. Regarding the Estonian experts, in the five experts with alters from the neighbour country we found that in all of them most of the alters from the neighbour country have a Nrm degree higher than the network mean Nrm Degree. In the experts F2, F10, F13, and F14 these alters represent a high percentage (57%, 90%, 100% and 54.5% respectively). Considering the biographical aspects commented in the interviews, the Estonian expert F2, has an intense relation with Finland, both for working and personal reasons. However, this expert's network has very low density and it is formed only by alters from the neighbour country and alters from third countries. Thus, like in the Portuguese expert E19, we cannot appreciate if the alters from the neighbour country have a good position in respect with the expert's possible national relations. In the Estonian experts F5 and F14 more than half of their alters are from the neighbour country, what is reasonable as they are both married to Finns. The expert F5 though reported an important number of alters from the neighbour country, only one of them, who is a family tie, appears to be in a better advantage position in the expert's network. Also in the network of the expert F14, those alters from the neighbour country with higher Nrm Degree are cross-border family ties. The experts F10 and F13 have both alters from Finland who are working relations and have also a favourable position. Among the eight Finnish experts reporting alters from Estonia, in five of them these alters from the neighbour country, from less to greater extent, have an Nrm Degree higher than the mean Nrm Degree. Only in the case of the expert F20 they do represent less than 50%, that is, only one alter from the neighbour country whose relation with the expert is from work. In the rest of the experts (F4, F9, F15, F21 and F22) we

appreciate that more than half of their alters from the neighbour country have a good position within the whole network. It is also important to remark that these alters from the neighbour country are most of them working ties, that apparently could reach to the experts' national and other third country alters. However, the experts' networks are in some cases characterised by the low density and the existence of subgroups isolated one to each other where the expert is the only link. Thus, it is necessary to analyse the betweenness centrality.

Table 68: Measures of centrality (Degree) in experts' personal networks

Ego	Densi-ty	Net Centrali-zation	Nrm Degree		Alters Total	Number of Alters from N.C.	% of Alters from N.C.	Number of Alters N.C. ≥ Mean Nrm Degree	% of Alters N.C. ≥ Mean Nrm Degree
			Mean	Desv. St.					
Spain									
E1	1	38.04	31.66	13.74	25	6	28	6	100
E2	1	42.21	23.66	16.48	25	0	0	0	0
E3	1	39.49	30.33	14.65	25	1	4	0	0
E6	1	34.24	22.66	14.72	25	0	0	0	0
E9	1	51.27	40.33	18.66	25	0	0	0	0
E12	1	40.94	31.57	17.13	20	4	20	0	0
E13	1	53.08	47.00	17.34	25	0	0	0	0
E14	1	22.81	53.15	19.89	20	0	0	0	0
E15	1	43.12	35.33	16.37	25	0	0	0	0
Portugal									
E4	1	41.82	28.78	19.22	12	6	50	1	16
E5	1	48.91	30.00	17.91	25	3	12	0	0
E10	1	23.19	20.33	13.65	25	3	12	0	0
E11	1	16.12	31.00	15.68	25	0	0	0	0
E16	1	46.56	19.66	11.51	25	3	12	3	100
E17	1	43.48	35.00	18.33	25	5	20	5	100
E19	1	28.26	15.66	8.68	25	22	88	12	54.5
E20	1	15.38	15.23	9.71	15	0	0	0	0
E21	1	44.02	38.66	17.58	25	6	24	1	16
Estonia									
F1(*)	-	-	-	-	25	0	0	0	0
F2	0.08	26.79	16.66	14.43	9	7	77	4	57
F3	1	50.00	37.77	20.00	10	0	0	0	0
F5	1	52.73	37.87	19.92	12	7	58	1	14.2
F10	0.09	15.58	19.00	9.05	25	10	40	9	90
F13	0.10	33.52	20.95	21.10	15	4	26	4	100
F14	0.13	50.00	27.48	17.97	19	11	57	6	54.5
F18	1	40.94	29.00	16.56	25	0	0	0	0
Finland									
F4	0.09	32.97	19.66	10.77	25	4	16	2	50
F6	0.14	28.44	28.00	13.20	25	0	0	0	0
F7	1	29.17	24.26	12.10	17	0	0	0	0
F8	0.13	34.06	27.00	14.09	25	3	12	0	0
F9	1	47.64	18.66	13.59	25	11	44	9	81.8
F15	1	37.14	28.33	13.22	25	5	20	3	60
F20	0.04	13.83	9.05	6.13	24	5	20.08	1	20
F21	1	7.43	5.66	4.06	25	3	12	2	66.6
F22	1	26.52	35.89	13.23	13	2	15	1	50
F23	1	23.55	20.00	12.30	25	1	4	0	0

Source: Author's compilation based on fieldwork.

Nrm Degree: Normalized Degree from the expert's network.

Nº Alters from N.C: Number of Alters from the Neighbour Country

% of Alters from N.C: Percentage of Alters from the Neighbour Country.

Alters N.C. ≥ Mean Nrm Degree: Number of Alters from the Neighbour Country with their Nrm Degree equal or superior to the Mean NrmDegree.

% of Alters N.C. ≥ Mean Nrm Degree: Percentage of Alters from the Neighbour Country with their Nrm Degree equal or superior to the Mean Nrm Degree.

(*) In this case the calculation of the density, network centralization and Nrm Degree were not done. The expert did not reported the relations between the alters.

The Table 69 shows N Betweenness and Bonacich measures⁵. With N Betweenness we measure the potential of control that the alters from the neighbour country might have within the whole expert's network. The Bonacich index is a complementary measure of centrality that measures also the power that the alters might have in the network. That is, other alters are dependent on the actor with highest Bonacich score. Among the Spanish experts is remarkable that only in the case of the expert E1, there are two alters from the neighbour country with a higher N Betweenness than the expert's network mean N Betweenness. And one of these alters from the neighbour country has the highest score in the Bonacich index. Among the Portuguese group, only in the networks of the experts E17 and E19 there are two alters from the Spanish side whose Bonacich score are the highest. In the Portuguese expert E19, two of the alters from the neighbour country have their N Betweenness higher than the expert mean N Betweenness. This expert's network was mainly formed by a subgroup of alters from the neighbour country and with few national Portuguese alters who are separated from them. Thus, the capacity of influence and power of these alters from the neighbour country is among other alters from the Spanish side, than among Portuguese alters.

Regarding the Estonian and Finnish experts, the relations from the neighbour country tend to have more influence and power than those of the Spanish and Portuguese experts. Among the Estonian group, the expert F2 like in the case of the expert E19, has the same relational pattern. This expert has all the alters from the neighbour country, with a high N Betweenness, and two of them are among the highest scores in the Bonacich index. But again this capacity of influence of the Finnish alters can not be interpreted among the national Estonian alters of the expert, because there are not Estonian alters reported by the expert (see Figure 7). The experts F5, F10, F13, and F14 have alters from the neighbour country with a N Betweenness higher than the mean N Betweenness. And in the case of the experts F10, F13 and F14, there are one or two alters from the neighbour country who have significant power in relation to the whole experts' network. In the case of the Finnish expert F4, two alters from the neighbour country have higher N Betweenness from the mean, and one alter from the neighbour country is among the highest scores of Bonacich index, what means that this alter is a significant actor

⁵ NBetweenness indicates the extent to which an actor connects pairs of other actors, or the degree of connection that an actor has between other actors.

Bonacich index is an extension of the degree centrality that distinguishes the notions of being important (centrality) and power. This distinction depends on how well interconnected are those alters with who the actors relate. Accordingly, one actor is not only central but powerful when the alters with who he relates are not well connected to others. This means that the alters depend more in the actor. Bonacich measure takes into account this dependency of alters upon the actor.

in the network structure. He has a relevant position for connecting other alters and from whom others alters also depend on. In the case of the Finnish experts F15 and F22 we see that the alters from Estonia are very integrated and have strong capacity of influence. The expert F15 has been working more than 20 years with Estonians, sharing also the same working place, what explains logically that the alters from Estonia are relevant actors (two of them have high score in the Bonacich index) in the expert network structure. The expert F22 (see Graph F22 in Annex 4), has lived for working reasons in Estonia. In the network based in work ties, some alters from the neighbour country are well positionated as it shows the N Betweenness and the Bonacich index.

Table 69: Measures of centrality (Betweenness) in experts' personal networks

Ego	N Betweenness		Alters Total	Number of Alters from N.C.	% of Alters from N.C.	Number of Alters N.C. ≥ Mean N between ess	% of Alters N.C. ≥ Mean N Between ess	Number of Alters NC among the 3 alters with higher Bonacich index
	Mean	Desv. St.						
Spain								
E1	1.13	1.98	25	6	28	2	33.3	1
E2	0.19	0.38	25	0	0	0	0	0
E3	0.3	0.6	25	1	4	0	0	0
E6	0.84	1.46	25	0	0	0	0	0
E9	0.16	0.32	25	0	0	0	0	0
E12	1.00	2.40	20	4	20	0	0	0
E13	2.01	5.16	25	0	0	0	0	0
E14	0.20	0.52	20	0	0	0	0	0
E15	0.52	1.11	25	0	0	0	0	0
Portugal								
E4	1.13	2.39	12	6	50	0	0	0
E5	0.50	1.09	25	3	12	0	0	0
E10	0.30	0.64	25	3	12	0	0	0
E11	0.06	0.22	25	0	0	0	0	0
E16	0.02	0.06	25	3	12	0	0	0
E17	0.05	0.15	25	5	20	0	0	2
E19	0.42	1.29	25	22	88	5	22.7	2
E20	0.40	0.86	15	0	0	0	0	0
E21	0.95	1.83	25	6	24	0	0	0
Estonia								
F1(*)	-	-	25	0	0	0	0	0
F2	0	0	9	7	77	7	100	2
F3	0.97	2.04	10	0	0	0	0	0
F5	1.89	4.3	12	7	58	2	28.5	0
F10	0.37	0.71	25	10	40	3	20	1
F13	0.18	0.46	15	4	26	2	50	1
F14	0.08	0.16	19	11	57	3	27.2	2
F18	0.37	0.64	25	0	0	0	0	0
Finland								
F4	0.25	0.94	25	4	16	2	50	1
F6	0.21	0.40	25	0	0	0	0	0
F7	0.22	0.55	17	0	0	0	0	0
F8	0.84	2.32	25	3	12	0	0	0
F9	0.02	0.05	25	11	44	0	0	1
F15	0.58	1.12	25	5	20	3	60	2
F20	0.01	0.05	24	5	20.08	0	0	0
F21	0.01	0.07	25	3	12	0	0	0
F22	1.22	1.23	13	2	15	1	50	1
F23	0.44	1.24	25	1	4	0	0	0

Source: Author's compilation based on fieldwork.

N Betweenness: Normalized Betweenness from the expert's network.

Nº Alters from N.C: Number of Alters from the Neighbour Country

% of Alters from N.C: Percentage of Alters from the Neighbour Country.

Alters N.C. $\geq$ Mean NBetweenness: Number of Alters from the Neighbour Country with their N Betweenness equal or superior to the Mean NBetweenness.

% of Alters N.C. $\geq$ Mean NBetweenness: Percentage of Alters from the Neighbour Country with their NBetweenness equal or superior to the Mean N Betweenness.

(*) In this case the calculation of the N Betweenness was not done. The expert did not reported the relations between the alters.

The Table 70 depicts the data of subgroups on both perspective bottom-up and top-down. From the bottom-up perspective, the interest is at which are the ties, dyads or triads that build up the whole network. First, we describe in general terms the sub-structures that may be present in the experts' personal networks. For that we will focus in the data of N-Cliques, N-Clans⁶ to know the distribution of the alters from the neighbour country across these subgroups. Do they form a compact subgroup more or less connected to others subgroups, or do they integrate in different subgroups together with national alters and alters from other third countries. From the top-down perspective we search for the presence of alters from the neighbour country who might be key actors at connecting different substructures in the experts' network. In order to identify the possible alters from the neighbour country as bridges or key players that connect different substructures in experts personal networks, we center in the analysis of cutpoints and bridges⁷.

According to the N-cliques there are subgroups of alters where they are not all necessarily related. That is, an alter not necessarily connected to the whole group could be considered a member for being related to some alter of the group. In the N-clans are grouped those alters who have all the ties among them. In the table we can appreciate that the number of N-clans and N-cliques are a bit more unbalance between the Spanish and Portuguese experts. This mean that when the definition of group is restricted to N-clan the number of subgroups tend to be less in some Spanish and Portuguese experts (like E1, E6, E12, E13 and E10). While among Finnish and Estonian experts the number of N-clans and N-cliques are practically the same. Among these experts' network, the alters who form a group tend to be related all among them, being the notion of a group member more restricted to have direct ties with all the members, instead of being a friend of a friend.

⁶**N Cliques:** The clique is a the group of individuals where all of them have mutual relations within the group (Inggerd, 1997), and N means the number of ties or steps by which actors are connected. In the N-clique, actors are member of a group if they are connected with all the member of the group at a distance (number of ties/steps) greater than one (Freeman and Riddle, 2005). But, in the measure N-cliques it might happen that some actors are not clearly members of the group. For that reasons, it is used a measure more adapted to the idea of a group. The **N-Clan** measure takes into account the distance N=2 at which actors are connected but include a new condition. All the ties among members of a n-clique must occur by way of other members of the n-clique (Hanneman & Riddle, 2005).

⁷**Blocks and CutPoints** identify those actors who could cut the entire network into un-connected subgraphs or blocks. These actors would be the cutpoints that can play as brokers in the network.

Lambda set and Bridges focus in the connections or ties. Lambda set search for those ties through which flow the greater number of actors. That is, there are certain connections in the network that if removed would discomposed the network at the most. The bridges are those actors whose relations connect more in the network.

According to the number of alters who are cutpoints we can affirm that the alters from the neighbour country do have an important role at connecting or disconnecting the experts' network structure. Only in the personal networks of the experts E19, F2, F5 and F9 we find that the alters from the neighbour country could alter significantly the flow of relations in the network. We can affirm that in these experts' networks there are certain alters from the neighbour country who can be considered as brokers among disconnected groups. However, the role of alters from the neighbour country is different if we pay attention to the capacity of connecting that the alters have in the network. That is, the extent to which the alters have a great deal of traffic or manage the relations among other alters. In all the experts networks there are alters who act like bridges between other alters that are not connected. Among them we find that the alters from the neighbour country have this bridging capacity. However, we can affirm that this occurs mainly in the cross-border region SFE. In this area eight experts have in their personal network structure people from the neighbour country who are bridges connecting other people (friends, workmates, etc) whether from the same country of the expert or from the neighbour country. While in the cross-border region AAA only in one expert there is a bridge actor from the neighbour country.

Table 70: Experts' networks subgroups and key actors

Ego	N- Cliques	N – Clan	Blocks	Cut Points	Number of Alters N.C. as CutPoints	Lambda set	Bridges	Number of Alters N.C. as Bridges
Spain								
E1	6	3	1	0	0	11	2	1
E2	6	6	7	4	0	6	4	0
E3	3	6	2	1	0	9	3	0
E6	7	5	3	2	0	11	2	0
E9	2	2	2	1	0	11	2	0
E12	20	2	1	0	0	8	3	0
E13	25	2	1	0	0	7	2	0
E14	3	3	2	1	0	8	5	0
E15	4	4	1	0	0	11	3	0
Portugal								
E4	12	12	2	1	0	6	4	0
E5	5	5	2	1	0	12	2	0
E10	13	10	5	3	0	10	2	0
E11	3	3	5	2	0	7	12	0
E16	5	5	5	1	0	8	12	0
E17	2	2	2	0	0	7	2	0
E19	7	7	9	6	6	6	7	7
E20	3	3	5	2	0	5	2	0
E21	4	4	2	1	0	11	2	0
Estonia								
F1	-	-	-	-	-	-	-	-
F2	3	3	4	3	2	3	3	3
F3	3	3	3	2	0	5	2	0
F5	2	2	4	2	2	5	3	1
F10	8	7	4	4	0	6	8	6
F13	1	1	1	0	0	5	2	2
F14	4	4	3	1	0	9	2	2
F18	10	6	3	2	0	10	2	0
Finland								
F4	5	5	6	2	0	9	2	0
F6	4	4	4	2	0	11	2	0
F7	3	3	3	1	0	6	2	0
F8	5	5	2	1	0	10	2	0
F9	2	2	8	1	1	6	4	1
F15	6	6	2	1	0	9	3	2
F20	4	4	8	3	0	4	12	1
F21	4	4	11	4	0	3	9	2
F22	6	2	1	0	0	5	2	0
F23	6	6	8	4	0	9	3	0

Source: Author's compilation based on fieldwork.

(*) The calculation of the N-cliques, N-clans, Blocks, Cutpoints, Lambda set and Bridges were was not done. The expert did not reported the relations between the alters.

It is interesting to analyse some particular cases in which we have detected that the alters from the neighbour country are relevant actors in one way or another. What follows is a detailed analysis of those experts' personal networks according to previous tables commented and the network structure depicted in the Graphs of Annex 4. In the network structure of the Spanish expert E1, the alters from Portugal 6Dal, 18Al, 19Me and 20Ne have a high comembership as they are in all the six N-cliques and in the six N-clans. As it shows the Graph of Annex 4, all the alters from Portugal are working contacts who are connected with other Spanish workmates and a Spanish family member. In terms of centrality the alter from Portugal 20Ne is an important actor, as he has a high degree and high score in the Bonacich index in the whole network structure. Though in terms of betweenness centrality the national actors are more relevant in the network, like the alter 13MA. The whole network has only one block, so there is not any alter that could act like a broker disconnecting the network into different parts or subgroups. Although the alters from Portugal 20Ne and 21MA are those bridging actors in the whole network. They connect the work-related alters from the neighbour country with the national alters who are both workmates and family. At the same time, some of them are connected directly with other Spanish alters of the expert.

The expert E19 in the cross-border region AAA and the expert F2 in the cross-border region SFE, as it has been commented above, are particular cases, due to the dominant border character of the experts' relational behaviour. In the case of the Portuguese expert E19 we can appreciate in the Figure 9 that the majority of subgroups are formed by the alters from the neighbour country, while the national subgroup of alters is isolated from them. The number of N-cliques and N-clans coincide, and also the same actors with highest comemberships, concentrated in those Spanish alters who are friends. Among these actors we find those who act like cutpoints, actors 1Lau, 10Mn, 12Ga, and 18Sa. Without these actors the expert's network structure would be formed by isolated subgroups from work and friendship. The relations among these alters are not highly centralized, therefore the number of actors who act like bridges is significantly higher. Despite we detected many alters from Spain who act like bridges, we can not consider that they connect the expert alters from Portugal with those from Spain. These bridging actors play in the endogamic group of Spanish alters.

In the network of the Estonian expert F2 we find also the logical representativeness of alters from the neighbour country as relevant cutpoints and bridges in the network, as there are not national alters at all. But again, the bridge actors from Finland connect only Finnish alters and

alters from a third country. The network centralization and density are also very low and therefore the ties connecting the nodes are very few. Among all the actors, the triangle formed by the alters 1Hek 2Kir and 5Rik are bridges in the network, though those that would unconnect at most the network are the actors 1Hek, 5Rik, and 9Tar.

The expert F5 is a Estonian expert living in Finland and married to a Finn. Consequently is expected that the alters from the neighbour country are relevant actors in the network. The members of N-cliques and N-clans coincide. The network is formed by two separated subgroups, one based on family and friendship ties, where national Estonian alters and Finnish alters are connected, and the other subgroup of the workmates. As it is appreciated in the graph, the alters from the neighbour country 4Vil and 5Joh are clear key actors at connecting both subgroups. But actors 2Mil, 12Ms and 4Vil who are from Estonia could disconnect at the most the network structure. In this expert's network we can see how the family ties are both from Finland and Estonia, in which the Finnish family ties play an important role, not only with the family sub-group but also connecting the private and professional life of the expert.

The Estonian expert F10 is an expert who has an intense geographical mobility between both countries Estonia and Finland. As commented the personal network has a significant number of alters from the neighbour country due to working reasons (they represent the 40% of the whole alters). Again we see that the network is clearly divided between the professional subgroup and the personal with only family ties. Unlike the Estonian expert F5, the national alters and alters from the neighbour country are connected in the professional group, as the mobility of the expert across both countries is for working reasons. As we appreciate in the Graph F10 (see Annex 4) there is little connection between the family and national alters, and the Finnish alters from work. In this sense, the national alters 16Ot and 1Esm are the cutpoints who would disconnect the whole network structure. The alters from the neighbour country 5Too, 7Tap, 8Gre, 9Hei, 14Im and 21Er, play an important role as bridge actors. Among them the alters 7Tap, 8Gre and 14Im have also the NBetweenness higher than the mean N Betweenness. Nevertheless the Finnish alter 23Ri seems to have strongest power, that is, the rest of the alters from the neighbour country depend more on this alter for being connected with others.

The network of the Estonian expert F13 characterises by the low density and the important number of alters (seven between national alter and alters from third countries) who are

isolated or disconnected from the network. There is not any alter who could disrupt the fluidity of the relations. However, the alters 3Kal and 4Mai are the bridge actors in the network. The alter 15Vo has the highest Bonacich score. These three alters are from Finland. Thus, in this expert's personal network the alters who are friends and workmates from Finland are key actors. That is, other alters from Estonia and third countries need to contact with them in order to get access to other alters.

By last, from the Estonian expert F14 we observe also that the alters who can be considered as bridges are also from the neighbour country like in the case of the expert F13. The expert F14 like the expert F5 is married to a Finn. Thus, it is reasonable that the alters from Finland have a favourable position within the network. Looking at the Graph F14 (see Annex 4) there is a big and very dense subgroup, and a second subgroup of three alters from the neighbour country. Looking at the comembership, the alters from the neighbour country. 1Vil, 2Kal and the national alter 18Ka are present in three N-cliques and in three N-clans. From the Finnish alters 1Vil and 2Kal, who are family ties, play as bridge actors within the whole network. However, they are not those alters with biggest influence and power. The most powerful are on the one hand, the alter 18Ka who has the highest NBetweenness from all the alters and the same actor is the only cutpoint. On the other hand the alter 16Ol has a high NBetweenness and together with the alter 17Kshave the highest score of Bonacich index. Both alters are family ties in Finland.

In the group of Finnish experts we find the same number of experts with relevant alters from the neighbour country in their network, though with less dominance of these alters. Regarding the expert F9 who lives for working reasons in Estonia is expected as well that the alters from Estonia play some role. As we can see in the Graph F9 of the Annex 4, the network is formed by two big subgroups. There is a complete working cross-border subgroup of workmates and the personal subgroup with national and alters from Estonia who are whether friends or family ties. However, in this personal subgroup the alters from the neighbour country are less present. The alter 1Mk is a central actor. This family node has the highest degree due to the receiving ties and is the only cutpoint because connect the friendship alters with the family alters. However, regarding NBetweenness the family alters from Finland 5Mv, 6Mv. and 7Iv have more centrality. At the same time, these actors together with 1Mk are those with more capacity of influence, though the workmate 14Mk has the highest score in the Bonacich index. In general, we can affirm that there is a balanced situation between some family alters

important in the expert network and some alters from the neighbour country (1MK and 14Mk) who are important actors in each of the two big subgroups.

The expert F15 has been working for more than 20 years in continuous cooperation with Estonian institutions. Thus, in the Graph F15 of the Annex 4 all the alters from Estonia are work relations, though all of them are connected in one way or another with the alters from Finland. Among those with higher centrality the family actor 1Anj, and the work-related actors from Estonia 18Si and 21Ja are those with higher degree. Furthermore, 1Anj is the cutpoint of the network and the two Estonian alters play as bridges within the whole network structure together with the Finnish alter 6Tap. Other alters from Estonia, 17Iv and 18Si are relevant by their high N Betweenness together with the Finnish alter 15Va. According to the comembership of alters in the N-cliques and N-clans, we find the same alters. They are the Finnish 1Anj, and the Estonians 18Si, 19TH, and 21Ja. Briefly, in this expert's network we find a balanced favourable position of the family actor from the same country and some Estonian alters who are working contacts but very integrated in the whole network, especially the alters 18Si and 21Ja who are those with a highest Bonacich index.

The expert F20 (Figure 12) is descendent of a Finno-Estonian marriage and has lived in Estonia for some period. In the Graph of the network is noticeable that is a very disperse network with much differentiated subgroups of relations where the alters from Estonia are both from working and family reasons, though they are not key actors compared to those alters from Finland. The relational behaviour of this expert is characterized by the three subgroups that are completely disconnected by the type of relation. Thus, we find the working subgroup where there is one alter from Estonia, 4Lii with a higher degree than the mean Nrm Degree. In the measures of centrality the national alters are the important actors. Especially the alter 1Äit is the family tie with highest degree. We distinguish those with higher capacity of influence like 5Nii and 10Ji, and those with greater autonomy or powerlike 15Mj, 21Ai and 23Ri. The alters who could disconnect at the most the flow of relations between alters are also national actors, 5Nii, 10Ji, 1Äit.

By last, in the Graph F21 of the Annex 4 we see the network structure of the expert F21 the high dispersion accordingly to the low network centralization (7.43). Like in the expert F20, the different subgroups are also on the basis of the type of relation, where the alters from Estonia do not play a central role. Regarding the measures of centrality, the national alters are

those with more favourable positions. Especially actors 1Ant, 12tt and 19Sk have the highest degree. The alter 19Sk has more capacity to influence in the other alters of the family subgroup, while the alters 12tt and 25ke are those with greater autonomy. The N-cliques and N-clans are the same and the actors 1Ant, 12tt are those with more comembership. As there are different subgroups, multiple actors act like bridges. In the subgroup of working relations the Estonian alters 22En, and 23Kl, are intermediaries among some national alters. But again the actors 1Ant, 12tt are those who could disrupt more the network structure.

6.3.4. Experts' opportunities and resources from cross-border networks.

In the Chapter 1 we introduced several analytical models of structural social capital (Burt, 2000; Foley & Edwards, 2001; Lin, 2008). The main lines of argument operationalize the analysis of social capital into networks and resources. Once we have analysed the different types of personal networks, this section lead us to the enquirement on the resources or opportunities that experts the extract from their acquaintances. Briefly, the objective in this section is to analyse and describe the opportunities that the experts perceive from their cross-border contacts and the types of support that they received from their cross-border networks.

According to Lin social capital are “resources embedded in social networks”, or “resources embedded in a social structure which are accessed and or mobilized in purposive actions” (2008: 12). As we commented in Chapter 1 resources reverted to individuals might be also categorized and operationalized into different types. At this respect, Burt (2000) talks about different types of mutually influenced resources that the individual might get through the weak ties or structural holes. The process of brokering is other important resources. Individuals are also at the reach of brokering through these structural holes. The brokering capacity permits at the same time the capacity to bring together the potentialities of distant actors, which is defined by Burt as the resource of entrepreneurship. The information flow is also a very relevant resource directly related to the creativity and leaning resources. In this type of resources the information flow facilitates agents to get different types of knowledge and to be more creative. Other scholars have studied the resources that agents value at most from their weak ties, which tend to be similar to those emphasized by Burt. For instance, Elorie (2009) points that the resources valued by the restores of Lille are the community observation, which can be a resource for social control within the community, and the access to information.

The questionnaire used in the interviews included a question about the personal relations that the experts have in the neighbour country in which experts commented the benefits that these personal relations implied for them. Additionally in the name interpreter for the analysis of experts social networks (see Chapter 5) the experts had also to identify the types of support that the experts could received from their contacts reported in the name generator. Thus, the results discussed here are based in the qualitative analysis of the experts' interviews and in the quantitative analysis that included a multiple choice question on the type of support that the experts received from their acquaintances.

As we have commented previously, the experts have both informal cross-border contacts at the margin of working in CBC and formal relations originated in offices and meetings. According the qualitative analysis of interviews both types of relations seem to be intrinsically interwoven, especially when the experts commented that their cross-border friends were first cross-border workmates. The binomio formal-informal nature of the relations is a very interesting focus of research in the study of social networks. Devine and Roberts (2003) emphasize the role of the informal social network like family, neighbours, and friends at shaping people participation in the group activitiy or the associational life. A preexisting level of informal cooperation and trust seems to be a predisposition factor for the formal groups' activity. The role that prior relations have in interorganizational firms and clusters has been of relevant interest for researchers. In the study of interorganizational alliances in different production sectors the authors concluded that along time the characteristic formalism of inter-organizational networks decreased.. The social network based on previous alliances has an important influence on the later choice of alliance partners (Gulati, 1995; Gulati & Gargiulo, 1999). In this respect, the authors demonstrated that familiarity of prior interactions does generate trust and that in a non-linear relationship the lenght or history of the relation becomes in the ally for building trust (Gulati & Sych 2008). García (2002) reveals in the networks among companies from the retail sector that the informal friendship network between entrepreneurs was much dense that the formal networks based on the subcontracting. He used the term "low way (vía baja)" to refer to the informality, extra legality and survival strategies that characterised the entrepreneurial relations in a central-west region of Mexico.

In our qualitative analysis several experts in the cross-border region SFE remarked that the institutional cross-border cooperation between both countries is very much based on previous,

informal contacts. Especially in Estonia, where in the period of the Soviet Union decline and after independence, having Finnish contacts was very common for Estonians. This relational and informal prior activity was very representatively highlighted by an Estonian expert in a common saying known in the northern part of Estonia: *“Igal perekond peab olema oma kodustatud Soomlased”* - Every family should have a domesticated Finnish - (E2, Estonia, Manager, Public Institution, 2010). Although in modern days this tendency have changed, it shows how the experts from the cross-border region SFE usually describe the institutional cross-border cooperation, supported in previous informal contacts between Finnish and Estonians, *“This cooperation is grounded on the intense informal relations between Estonia and Finland”* (E17, Estonia, Manager, Private Company, 2011). The informal relations create a breeding ground of experiences that might be potential resources for institutional cross-border cooperation. In this sense, these informal contacts are bridges and opportunities that facilitate access to resources (other contacts, actors, etc.) located in the neighbouring country. The value of these kinds of relations corresponds with the bridging dimension of social networks and social capital and the brokering resource (Burt, 2008). These acquaintances are weak ties that might become bridges to other relations and resources; their strength lies in their capacity to connect different systems, societies or groups (Granovetter, 1973). They are not likely to provide strong cohesion like family relations, but become an important source for acquiring resources, which is a foundation of social capital and fundamental for cross-border cooperation.

In contrast, the Portuguese-Spanish cross-border relational activities tend to be more dominated by their formal participation in cross-border European projects. Nevertheless, experts also highlight that along time the formality of their professional relations decrease making easier or intruding more flexibility to the rigid patterns of formal compromises. These more formal relations from work acquire a more informal component over time. These are most of the acquaintances and friends from work reported by experts. Those especially from the AAA cross-border region commented that those formal contacts from work that become friends soften the institutional cross-border cooperation. The working process tends to be easier and more fluent. *“They are working mates that I can consider as friends too. We go out together, we eat together and even we dance... when there is opportunity for that. Thus, it is a dual relationship that makes easier the work. Sometimes it makes easier to solve difficult problems”* (E21, Portugal, Manager, Public Administration, 2011).

According to the experts' perception of their cross-border contacts both formal and informal implied resources or access to resources, and a form of bridging social capital for cross-border cooperation. They all imply the possibility of relational investment in order to capitalize the existing resources. They constitute sources of social capital. From the experts' answers different kinds of returns can be extracted. A typology of resources is reflected in the Table 71 where the access to information, the access to other contacts or brokering resource are the most common resources valued by the experts from their relations in the neighbour country.

Table 71: Typology of resources received from cross-border relations

	Process of brokering	Access to others actors and political institutions
Instrumental	Information flow Creativity and leaning Entrepreneurship	Information or knowledge for common niches of interest in CBC: Culture Political-administrative structures and norms Cross-border regions needs and others' perspective
Expressive	Consolidation of resources possessed	Spontaneity and familiarity

Source: Author's adaptation from fieldwork based on Lin (2008) and Burt (2000).

The opportunities that cross-border relations offer to experts could be classified as instrumental and finalist. Following Lin (2008) instrumental resources refer to these that permit the access to resources that the individual has not. The instrumental resources that the experts value from their cross-border relations were mainly social resources; on the one hand, the better knowledge and access to others actors and political institutions of the neighbour country. In this sense, the attainment of some expert to the professional positions related to cross-border relations was due to their prior biography very related to the neighbour country *"I started this work as I was originally from Estonia. It was very obvious that it would be my task here"* (F5, Finland, Manager, Public Institution, 2010). On the other hand, the attainment of different types of information or knowledge that serves for the creation of common niches of interest in cross-border cooperation. Cross-border relations imply in most of cases: a better knowledge of the neighbour's culture as way of thinking and acting in all contexts (professional and social), like this expert talking about the benefits from his friend in neighbour country *"They mostly have permitted me to know them better"* (E13, Spain, Professor University, 2011). They mean also to know better the neighbour political-administrative structures and norms; better knowledge of the cross-border regions needs and major awareness of the others' perspective at the time of planning and decision making in projects *"Working with them you*

get a more clear and global vision for the development of this cross-border area”(E11, Portugal, Manager, Public Institution, 2011)

Lin (2008) defines expressive resources like those actions that facilitate the maintenance or permit to consolidate the resources already possessed by the actors. We can add that these expressive resources that go implicit in every durable relation that the experts have in the neighbour country and refer to the familiarity effect commented before. They are not the purpose of the cross-border relations though they are a sine qua non condition for the instrumental resources. For instance, this expert highlights the relevance of his/her informal network for brokering in the formal network. *“Is not formal cooperation, I know whom to ask when I need to find partners or to reach these contacts, because the informal network is huge in fact and the formally is very poor”*(F15, Estonia, Manager, Public Institution, 2011). In such a way that those cross-border relations that along time have acquire an informal character, they facilitate the access to other instrumental resources. At this respect experts commented that the spontaneity and familiarity of these working cross-border relations were crucial for an easier cross-border formal relation. Those workmates become along time in friends from cooperation and friends for cooperation: *“But I can see that after few years in the project we called each other friends, and I know that that If I need something I can ask easily”* (F18, Estonia, Professor, University, 2011).

It is assumed that the increasing social and economic integration of cross-border regions needs to be supported by the existence of different types of cross-border flows, social interactions and cross-border relations between people of cross-border regions. If the resources commented by experts are related to this social and economic integration, then it is necessary to accomplish different empirical works on cross-border regions. To identify the possible cross-border relations, their patterns and their possible implication in cross-border cooperation development, it is a promising research line.

By last, for the quantitative analysis of resources we base on Barrera (1980). This author proposes a scale of six categories of social support that could capture the broad range of activities. This scale could be a reliable measure at identifying social networks by the social support. In the name interpreter the last question refered to the type of support that the experts received from the alters reported. The name interpreter applied to experts adapted the six categories of Barrera’s scale into eight categories. The expert could chose in a multiple choice

question from one up to eight different types of support: Personal support, Material, Task, Fun, Positive feedback, Negative feedback, Difficult situations and Reciprocity. From their selection the Tables 71_ and 72 represent the distribution of the types of support that the experts received from their alters by origin. According to this data we can describe briefly how much and what kind of support the experts receive from their cross-border alters. This will enrich the information for the adscription of the experts' cross-border relations as more bonding or bridging social ties.

The Table 72 represents the amount of sources of support or multiplicity of different kind of resources that experts received from their alters according to the alter's origin. Analysing the experts by country, Spanish experts obtained more support from their national alters than from the alters from Portugal. While the average of number of sources of support received from national relations is 2.2 from eight different supports, the average of support from Portuguese alters implied 1.4. On the contrary, the Portuguese experts seem to value higher the potential support from their Spanish alters, as the average of three types of support is even bigger than the support received from their national alters. The same trend, though more balanced, occurs among Estonian experts who receive bigger amount of support from their Finnish alters than from their national ones. This bigger amount of sources of support received from the cross-border alters in Portuguese and Estonian experts might be explained because of the Portuguese expert E19 (represented in Figure 5) who reported an important number of cross-border relations, and the three Estonian experts who are married to Fins. Regarding the Finnish experts, the average of support from Estonian alters is slightly inferior than the received from national alters. Considering the distribution by number of sources of support we can appreciate that all the experts tend to select more than one source of support by alter, specially the Spanish and Finnish experts chose more one support for their cross-border alters (58,3 and 35,3 respectively). By contrast, the Portuguese and Estonian experts chose more sources of support when reporting this cross-border alters (45.08 and 30.6 respectively).

Table 72: Experts' resources from networks. Multiplicity of sources of support

Spain	One	Two	Three	Four	Five	Six	Seven	Mean	Mode
Same Country	381	31.5	16.8	6.6	1	2.5	3.6	2.2	1
Neighbour Country	58.3	41.7						1.4	1
Other Country	33.3	66.7						3	4
Portugal	One	Two	Three	Four	Five	Six	Seven	Mean	Mode
Same Country	43.8	20.9	24.8	5.2	3.3		3	2.1	1
Neighbour Country	31.3		12.5	45.8	10			3	4
Other Country							100	7	7
Estonia	One	Two	Three	Four	Five	Six	Seven	Mean	Mode
Same Country	57.6	9.1	9.1	16.7	4.5	3.0	0	2.1	1
Neighbour Country	28.2	20.5	20.5	20.5	2.6	5.1	2.6	2.7	1
Other Country	60	10	20	10				1.8	1
Finland	One	Two	Three	Four	Five	Six	Seven	Mean	Mode
Same Country	27.8	19.9	23.3	10.2	13.1	2.8	2.8	2.8	1
Neighbour Country	35.5	16.1	22.6	25.8				2.4	1
Other Country	18.2	27.3	22.7	4.5	13.6	9.1	4.5	3.1	2

Source: Author's compilation based on fieldwork.

The Table 73 displays what kind of support the experts received from their alters by origin. The type of support that Spanish experts tend to receive more from their national alters is personal (70.6), followed by the resolution of tasks, positive feedback and reciprocity. From the cross-border alters Spanish experts pointed in similar way these types of support, though with less degree the personal support (58.3). Reciprocity, personal, and tasks are the types of support most reported also by Portuguese experts. By contrast, the Portuguese experts value much more the support received from their cross-border alters than their Spanish counterparts. And surprisingly, Portuguese experts also count with their cross-border alters for fun in higher degree than their national alters.

The Iberian group of experts value more between themselves the reciprocity and personal support. Among the Finno-Baltic group of experts also the personal and reciprocity support are the most valued by experts. However, compared to Portuguese and Spanish experts, the Estonian and Finnish experts value more between themselves the task support. This confers to their cross-border relations a more functional resource value. The Estonian experts likewise the Portuguese ones, tend to report higher degree in the different types of support that they received from their cross-border alters. The support that Estonians value much less from their cross-border alters is for having fun with them, consequently, resolving task is more important support. Also the support that the Finnish experts most reported from their cross-border alters is task support, followed by the reciprocity. Surprisingly, the Finnish experts are the only

group of experts who reported to received negative feedback from their cross-border alters compared to their national alters.

Table 73: Experts types of support from networks

Spain	Reciprocity		Personal		Material		Tasks		Fun		Positive		Negative		Difficult	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No
Same Country	31	69	70,6	29,4	21,8	78	33	67,7	20	79,7	33	67	7,6	92,4	12,2	87,8
Neighbour Country	33.3	66.7	58,3	41,7	8,3	92	8,3	91,7	-	100	33	67	-	100	-	100
Other Country	-	100	-	100	66,7	33	67	33,3	-	100	-	100	-	100	66,7	33,3
Portugal	Reciprocity		Personal		Material		Tasks		Fun		Positive		Tasks		Tasks	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No
Same Country	54,9	45,1	49,7	50,3	6,5	93.5	38.6	61,4	24.2	75,8	32	68	1,3	98,7	3,9	96,1
Neighbour Country	64,6	35,4	60,4	39,6	6,3	94	39.6	60,4	62.5	37,5	70,8	29.2	-	100		100
Other Country	-	100	-	100	-	100	-	100	-	100	-	100	-	100	-	100
Estonia	Reciprocity		Personal		Material		Tasks		Fun		Positive		Tasks		Tasks	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No
Same Country	30.3	69.7	56.1	43.9	3.0	97.0	31.8	68.2	31.8	68.2	45.5	54.5	15.2	84.8	13.6	86.4
Neighbour Country	51.3	48.7	69.2	30.8	10.3	89.7	61.5	38.5	25.6	74.4	43.6	56.4	15.4	84.6	12.8	87.2
Other Country	30	70	50	50		100	50	50	20	80	30	70	-	100		100
Finland	Reciprocity		Personal		Material		Tasks		Fun		Positive		Tasks		Tasks	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No
Same Country	51.7	48.3	57.4	42.6	13.1	86.9	52.3	47.7	29	71	46	54	14.2	85.8	31.8	68.2
Neighbour Country	58.1	41.9	32.3	67.7	6.5	93.5	38.7	61.3	25.8	74.2	32.3	67.7	22.6	77.4	45.2	54.8
Other Country	54.5	45.5	72.7	27.3	22.7	77.3	59.1	40.9	40.9	59.1	22.7	77.3	13.6	86.4	40.9	59.1

Source: Author's compilation based on fieldwork.

CHAPTER 7: THE NETWORK STRUCTURE OF THE CROSS-BORDER COOPERATION IN THE FRAME OF INTERREG 2007-2013 IN ALENTEJO-ALGARVE-ANDALUCÍA AND SOUTHERN FINLAND-ESTONIA

In this Chapter we tackle the analysis of two complete networks of cross-border cooperation in the cross-border regions of Southern Finland-Estonia and Alentejo-Algarve-Andalucía. Using social network analysis and content analysis the aim is to offer a general and comparative description of the network structure existent between those institutions (public administration, enterprises, foundations, etc) working together through projects within the respective operative programmes of European cross-border cooperation (Central Baltic INTERREG IV Programme 2007-2013, and Operational Programme for Cross-border Cooperation: Spain – Portugal, 2007-2013, POCTEP).

As we discussed in the Chapter 2 there is a significant lack of research of the cross-border regions and cross-border cooperation from the humanist or social-cultural approach. This perspective focuses in the analysis of cultural and social processes that have the same relevance like the policy analysis and impact evaluations of European programmes for cross-border cooperation (Löfgren, 2008; Van Houtum, 2000). At the same time, there is a recent and increasing use of the network perspective in the policy analysis, whether in cross-border cooperation policies and programmes or in any other public policy. Although this analysis has an over metaphorical use of the network concept, that does not allow to accomplish an operative analysis of the networks and their relation with policy governance and outcomes (Isett, et al. 2011). Still, there have been already in different cross-border regions punctual research attempts with network theory and analysis, like Soeters (1993), Brunet-Jailly, (2006), and Walther and Reitel, (2012). Equally important are those studies that based on social capital framework use the content analysis of respondents' or actors' perceptions to offer a richer and meaningful vision of the cross-border cooperation in its formal and informal process (Grix & Knowles 2002; Grix & Houžvička, 2002; Garrido & Moyano, 2002; Pérez & Monago (2011).

For this Chapter are used first the network analysis of the project database of both sub-programmes of cross-border cooperation Southern Finland-Estonia and Alentejo-Algarve-Andalucía, from the respective Central Baltic INTERREG IV Programme

2007-2013, and Operational Programme for Cross-border Cooperation: Spain–Portugal, 2007-2013 (POCTEP); and second the content analysis of the experts' interviews. The questionnaire carried out to experts included questions about their perception of the quality and intensity of the institutional relations in the cross-border cooperation scenario; their opinion of those key actors in their cross-border region, and their opinion concerning the Euroregión Alentejo-Algarve-Andalucía and the Euregio Helsinki-Tallinn (see Chapter 5 for more details and Annex 1).

Across the different sections of this chapter we describe first in section 7.1. the network structure of the cross-border cooperation in both cross-border regions. We identify those institutional actors relevant in each network structure. Second we complement this information with that offered by the experts according to their opinion and perception of the cross-border institutional relations in section 7.2. By last, we deal with the analysis of the role that the Euroregions have in their respective cross-border region in section 7.3.

7.1. The institutional network structure of cross-border cooperation programme Interreg 2007-2013.

Following the objective 7, we analyse the characteristics of the institutions members of the network, and the two complete network structures among those institutional actors who participate in the respective programmes Interreg 2007-2013, using social network analysis. They are institutions participating in projects of cross-border cooperation in the frame of Interreg Programme 2007-2013 in the two cross-border regions object of study, Southern Finland-Estonia, and Alentejo-Algarve and Andalucía. The interest is at identifying how the organizations are connected for the development of projects of cross-border cooperation, the existent subgroups, and the key position of certain institutions that make them to be the most important institutional actors among the rest of projects members. With the analysis of this network structure on the basis of institutions' membership in projects of Interreg A 2007-2013 we can ascertain the flows of communication, information and power that are subjacent to these complete network structures. But also we can approximate to the type of institutional social capital built around the official cross-border cooperation.

The definition of cross-border cooperation given in the Chapter 2 (Perkmann, 2003; González, Guimerá & Perkmann, 2010) contains itself the logic of interorganizational or public networks. The projects of cross-border cooperation are the results of the institutional coalitions. The participant institutions of the Interregprojects in these cross-border areas sign up formal binding agreements of coordination for a period of several years in order to accomplish a common goal that will benefit the whole network members. However, despite the suitability of network approach to the study of cross-border cooperation, there is not up to now a serious attempt for it. The study of cross-border cooperation has been rather targeted to the analysis of the impact in the cross-border areas and efficiency of the programmes and projects implementation. Instead, policy network approach can extent the capacity to explain and to understand the complexity of cross-border cooperation. From this approach the efficiency and impact of those projects might be related also to the network structure forms and the networks as form of governance.

The European Territorial Cooperation is one of the objectives (together with the Convergence and the Regional Competitiveness and Employment) for a Regional Policy financed by the European Regional Development Fund. This objective consists on the promotion of strategies of cooperation between regions and countries towards common goals, being the cornerstone of the European integration. The European Territorial Cooperation encourages the integration between member states through joint programmes of three types. The transnational cooperation programmes, the interregional cooperation programmes and the cross-border cooperation programmes. In this last type of programmes the former Interreg A community Initiative has the fourth programme period for 2007-2013, of the consecutive series 2000-2006; 1994-1999; 1990-1993. There are 53 cross-border cooperation programmes across the European Union (Regional Policy-InfoREGIO, 2013). Two of them, the Central Baltic Interreg IV A Programme 2007-2013 and the Operational Programme for Cross-border Cooperation: Spain – Portugal, 2007-2013 (POCTEP) are the operative frame for the cooperation between Southern Finland and Estonia and between Alentejo, Algarve and Andalucía, who are one of the sub-areas or sub-programmes of the Central Baltic Interreg IV A Programme and POCTEP respectively.

First, we extract some general patterns of the institutional profile in each country and cross-border area, according to the type of institutions participants, the leadership and the country. Second, we construct and analyse the complete network structure of the institutions who are projects participants in both cross-border regions. The data of those participant institutions and the projects where they cooperate is available in the websites of the Central Baltic Interreg IV A Programme 2007-2013 and Operational Programme for Cross-border Cooperation: Spain – Portugal, 2007-2013. These institutions and their projects are those who have got the approval of the respective managing authorities of the programmes, according to the general criteria for the project admission and the types of partners provided in the Programme frame (see Annex 5 for the identification of the institutions).

The Table 74 shows the number of projects funded in each sub-programme area in the programmes for cross-border cooperation in two periods corresponding to former the Interreg A III (2000-2006) and the current Interreg A IV or Community Initiative (2007-2013). The evolution of Interreg A Programme shows in both cross-border areas the decrease in the number of projects). As we can see this explains that the cross-border cooperation emerged from Interreg III implied an explosion of numerous participant institutions with cross-border binding agreements compared to the second period 2007-2013, that reflects a significant less number of funded projects, especially in the cross-border region AAA. With the data reflected in two consecutive periods the reader can appreciate how the complexity of the cross-border networks has been reduced significantly by the number of projects funded.

Table 74: Projects executed and in process of Interreg III and Interreg IV

Southern Finland- Estonia	Nº projects	Spain Portugal Andalucía-Algarve y Alentejo	Nº projects	Total Nº projects
2000-2006 Interreg IIIA Southern Finland-Estonia	64	2000-2006 Interreg IIIA Cross-border Cooperation Spain-Portugal	141	205
2007-2013 Central Baltic Interreg IV Programme Southern Finland-Estonia Subprogramme	35	2007-2013 POCTEP Operational Programme for Cross-border Cooperation: Spain – Portugal	30	65
Total	99	Total	171	270

Source: Author's compilation

7.1.1. The institutional profile.

From the database of projects funded in the period 2007-20013 in the respective subprogrammes, we extracted the participant institutions in each of these projects. The Table 75 displays the distribution of participant institutions by country where we can appreciate the significant differences between both cross-border regions. The members of projects are the total number of institutions participating in the funded projects. However, some of these institutions have comembership, participating in two o more projects. In the cross-border region AAA the bigger multi-presence of certain institutions, reduce significantly the size of the whole network structure of the Interreg cross-border cooperation. Therefore, the real number of institutions doing cross-border projects is much less, especially in the cross-border region AAA, where from 152 members, 88 are institutions. By contrast, in the cross-border region SFE the cross-border cooperation network is formed by a bigger number of different institutional actors (180) with less intensity of comembership. From the 194 members, only 14 institutions are present in more than one project. Other significant aspect is the nationality of the institutions. There is a more or less balance share of institutions by country. The Spanish (56.8%) and Estonian (51.1%) institutions have a bit bigger representation in the cross-border projects. However, looking at the number of institutions who are lead partners we can see the unbalanced leadership between countries. The Spanish partners who are leaders in projects represent the 83.3% against the 16.6% of Portuguese leadership. In the cross-border region SFE the 66.6% of lead partners in projects are Finnish. The clear dominant leadership of Spanish and Finnish

partners reflects the weight of the better socio-economic conditions of these countries in both cross-border regions. The socio-economic and political context of the cross-border cooperation network in both cross-border regions makes the leadership to be unbalanced, especially in the cross-border area AAA. Like we pointed in the Chapter 3, the learning process of the small and big brother that has represented the cross-border cooperation between Finland and Estonia is demonstrated in the Finnish dominant leadership. In the case of Spanish and Portuguese cooperation, the better economic conditions of the Spanish side and the bigger centralization of administration in Portuguese side can explain the Spanish supremacy at leading cross-border cooperation projects. These reasons, for the leadership of Finnish and Spanish counterparts in the projects, were stated also by the experts interviewed.

“They have this tendency...and the Portuguese do so as well. But it is a natural question. It depends on where it is the main strength. At the economic level we have two countries and one of them is stronger economically than the other. It has also more population, so we are more dependent. And we are a peripheral country also” (E16, Portugal, Manager, Public Institution, 2011). “I think that Finnish side is much more experienced because of their longer experience doing European projects. They were the project leaders, we were... And that was known from the very beginning but from the other side it was a learning process” (E13, Estonia, Manager, Public Institution, 2010). “And not because of our projects but because they themselves saw a model in Finland about how to develop their country. I think that is even more important” (E20, Finland, Manager, Public Institution, 2011).

Table 75: Institutions member of projects by country

Cross-border regions	Nº Members of projects	Nº Lead Partners of projects		Nº of Institutions		Nº of Lead Partners	
		Number	%	Number	%	Number	%
Alentejo-Algarve-Andalucía	155	30	100	88	100	19	100
Spain	-	23	76.6	50	56.8	16	84.21
Portugal	-	7	30.43	38	43.1	3	15.78
Southern Finland-Estonia	194	35	100	180	100	30	100
Estonian	-	11	31.42	92	51.1	10	33.3
Finland	-	24	68.57	88	48.8	20	66.6

Source: Author's compilation.

In the documents of the respective Interreg programmes specified the type of institutions that can participate in these projects: From local, inter and supra-municipal, regional administrative authorities, State organizations and other decentralised services,

non-governmental organizations, private enterprises, state public enterprises, agencies for local-regional development, foundations (private/public), and university institutions (POCTEP, 2011; Central Baltic INTERREG IV A Programme 2007-2013, 2011). Accordingly, we created a common list of types of institutions comparable to both cross-border regions, and each of the participant institutions was categorised as: university (U), foundations (F), city/local governments (L), inter o supra local administrations (C), regional administrations (R), private enterprises or associations of employers (B), non-profit organization (O), agency of development (A), any other independent public enterprise or service (P), and trade unions (W). In the Annex 5 we display the complete name of all the participant institutions and projects. The administrative level of the independent public enterprises or services who participate in both programmes vary across the four countries. In Spain, the majority of these public independent entities are regional institutions that belong to the government of Andalucía, while in Portugal these entities are more at national level. This difference obeys logically to the specific and very different administrative organization of both countries commented in the Chapter 3. In Spain regions has reached to a great level of autonomy having competences in health and education policies for instance. In Portugal the regions are represented by the so called CCDR that are central state administration decentralised services, and the local level administrations represented by the City Councils (Cámaras Municipaes), which have stronger autonomy compared to the local municipalities in Spain (Montero, 2008). In Estonia and in Finland the regions or counties are the administrations with less weight in the policy making compared both to the state and local administrations. However, in Estonia the majority of the independent public enterprises and services participating in the sub-programme Southern Finland-Estonia are at the state level, while in Finland there are a great variety of local, regional and state level institutions.

The Table 76 reflects the remarkable different weight that every type of institution plays in both sub-programmes of cross-border cooperation. In Spain the regional institutions are those who participate more in the sub-programme Alentejo-Algarve-Andalucía of POCTEP. They represent the 26% of the 50 institutions. All of them are the regional ministries of Andalucía government. The second relevant group of institutions is formed by the Public Independent Entities that represent the 24%. At this respect, as we commented above, the majority of these entities are at the regional level, what increase

the weight of regional institutions in the Spanish side of the cross-border area. The regional actors represent those institutions with greater opportunity and social capital as they are better positioned in the Programme 2007-2013. On the contrary, in the Portuguese side, the most relevant group of institutions are local municipalities who represent the 26.3% of the 38 institutions. The local administrations are equivalent to the city councils (Cámaras Municipaes) and other institutions representing the interest of different municipalities. Local institutions, due to their greater autonomy, have had better opportunities at forming cross-border networks with the Spanish neighbours.

The cross-border area Southern Finland-Estonia is very different because the universities form a strong institutional block for institutional cross-border cooperation. The universities represent the 23.9% of the 92 Estonian institutions and the 28.4% of the 88 Finnish institutions. This better capacity to make projects of cross-border cooperation might be explained also by the participation of universities in socio-economic development of this cross-border area based in the increasing ICT industry between both countries that was commented in the Chapter 3. After the universities and other research institutions the most prominent institutions in Estonia doing cross-border projects are local administrations, what seems logical as the main urban area is within the priority area of the sub-programme of cross-border cooperation. In Finland, though the universities are an important actor, the public independent entities formed the biggest group representing the 38.6 of the 88 institutions that, as we pointed above, there are whether local county or regional, and state level institutions.

Table 76: Type of institutions participating in projects

Cross-border regions	Alentejo-Algarve-Andalucía				Southern Finland-Estonia			
	Spanish		Portugal		Estonian		Finland	
Types of Institution	Nº	%	Nº	%	Nº	%	Nº	%
Universities	3	6	1	2.6	22	23.9	25	28.4
Foundations	5	10	0	0	6	6.5	6	6.8
County	2	4	0	0	4	4.3	1	1.1
Region	13	26	7	18.4	0	0	1	1.1
Local	5	10	10	26.3	21	22.8	10	11.4
Business	4	8	3	7.9	8	8.7	2	2.3
Non Profit Organizations	1	2	4	10.5	9	9.8	4	4.5
Agencies	3	6	4	10.5	2	2.2	5	5.7
Public Independent Entities	12	24	7	18.4	20	21.7	34	38.6
Trade Unions	2	4	2	5.3	0	0	0	0
Total	50	100	38	100	92	100	88	100

Source: Author's compilation.

Other issue is to consider the role that these institutions have in the cross-border projects, as leaders. In this term, we can observe in the Table 77 that the regional actors in the Spanish area continue to be not only the most numerous actors participating in cross-border projects but also being the leaders of them (31.3%), followed by the public independent entities who are also institutions at the regional level. In Portugal though local actors were the biggest groups of participant institutions they do not lead any of the few projects that Portuguese institutions have leaded. On the contrary, the regional actors and the public independent entities are those with better capacities to lead a cross-border project. It is a non profit organization who is also a lead partner. If we check the data of the Table 75, the number of Portuguese lead partners is seven, but this non-profit organization is leader in five different projects, what explains that the number of lead institutions is only three. Thus, this institution, the Association for the development of Low Guadiana (Odiana), the actor 11O in the Figure 14, represents an important institutional actor in the sub-programme Alentejo-Algarve-Andalucía, according to the measures of centrality analysed.

In the cross-border area Southern Finland-Estonia we appreciate a similar picture than in the Table 76. The role of the universities is also considerably important compared to the role of the rest of institutions. The 40% of the institutions leaders of projects are

universities, and in Finland they represent the 35% of the leadership in cross-border projects. Again the public independent enterprises and services form the second group of institutions leading these projects. Local administrations represent 20% of the leadership in the sub-programme Southern Finland-Estonia. In this sense, it is noticeable the greater role that local administrations have as lead institutions in this cross-border area compared to the local administrations in the cross-border area AAA.

Table 77: Type of institution who is leader of projects by country

Cross-border regions	Alentejo-Algarve-Andalucía				Southern Finland-Estonia			
	Spanish		Portugal		Estonian		Finland	
Types of Institution	Nº	%	Nº	%	Nº	%	Nº	%
Universities	2	12.5	0	0	4	40	7	35
Foundations	2	12.5	0	0	0	0	1	5
County	1	6.3	0	0	0	0	0	0
Region	5	31.3	1	33.3	0	0	0	0
Local	0	0	0	0	2	20	4	20
Business	0	0	0	0	0	0	0	0
Non Profit Organizations	1	6.3	1	33.3	1	10	1	5
Agencies	1	6.3	0	0	0	0	1	5
Public Independent Entities	4	25	1	33.3	3	30	6	30
Trade Unions	0	0	0	0	0	0	0	0
Total	16	100	3	100	10	100	20	100

Source: Author's compilation.

7.1.2. The network structure and key actors of the cross-border cooperation sub-programmes.

Following the structure of both institutional cross-border networks are represented based on the database of the subprogrammes AAA and SFE 2007-2013. According to the database of both Interreg Sub-programmes these network structures present several particularities which are necessary to comment.

First, one of the general approaches to the study of public or policy network is based in the analysis of the formal networks. These are networks that emerge officially set up by some organism according to the membership of institutions though compulsory or incentive motive. In this case, the analysis of formal networks leaves behind important

and meaningful informal networks that emerged out of the legal frames (Isset et al., 2012). In our case, the network created from the participation in projects of Interreg programmes is based in an objective relation of partnership in a common project. And that is why all the relations between the institutions are symmetrical. There are not any other criteria for the description and visualization of these partnerships like could be the intensity of contact, type of relations, etc. However, among the project partners is distinguished those who are lead partners and those who are partners. The lead partners are those institutions who are responsible of the whole project and the budget distribution among the rest of partners.

Second, other characteristic of these cross-border networks is the presence of institutions from different fields or areas that tend to cooperate in the project forming different specialised sub-networks within the major network. The study of complete networks tends to focus in specialised fields or sectors of activity, like organizational network in the tourism sector, academy networks, or the networks between different healthy public services. These complete networks appear as a big group of more or less densely tied nodes that share some common goals. These networks can be characterised as the hypothetical star network form or as more disperse network with isolated nodes and separate subgroups, where it is possible to differentiate a centre from the periphery. However, the complete network of cross-border cooperation based on Interreg project participation conform a multispectral net of subgroups. The complete network is formed by different and not connected small sub-networks; each of them belonging to very different sectors of activity and constituting the institutional network setup for a specific project. The common goal in this network is delineated by the Interreg Programme authorities (the Managing Authorities and Joint Technical Secretariats of each Interreg Programme) who determine the admission of the projects on the basis of common benefits at both sides of the border around common priorities or strategic fields of development. Nevertheless, there are certain institutions who tend to be participant in different projects during the same Programme 2007-2013 and across different priorities of development. These institutions are those who appear also as more relevant in terms of centrality in the complete network, compared to the rest of participants.

In this Chapter, we constructed each network structure according to the criteria of institutional partnership by every project, which data is available in the websites of the

POCTEP and Central Baltic Interreg IVA Programme. The following visualisation of the cross-border networks in the Figures 13, 14, 15, and 16 reflects the nationality of the institutions by the colour of the nodes; the distinction between partners and lead partners in one or more projects (Lead partner 1, Lead partner 2, Lead partner 3, Lead partner 4, and Lead partner 5) by the shape of the nodes. Additionally the size of the node represents the centrality (Figures 13 and 14) and/or the betweenness of the institutions (Figures 15 and 16). In order to make easier the visualization of the complete networks in the Figures 13, 14, 15, and 16, we adjusted the spatial distribution of the subgroups of networks by project, avoiding the visual juxtaposition of ties that could make difficult the visualisation of both complete networks formed by nets of subgroups.

Figure 13: Network of the cross-border cooperation in Southern Finland-Estonia subprogramme 2007-2013 representing Nrm degree

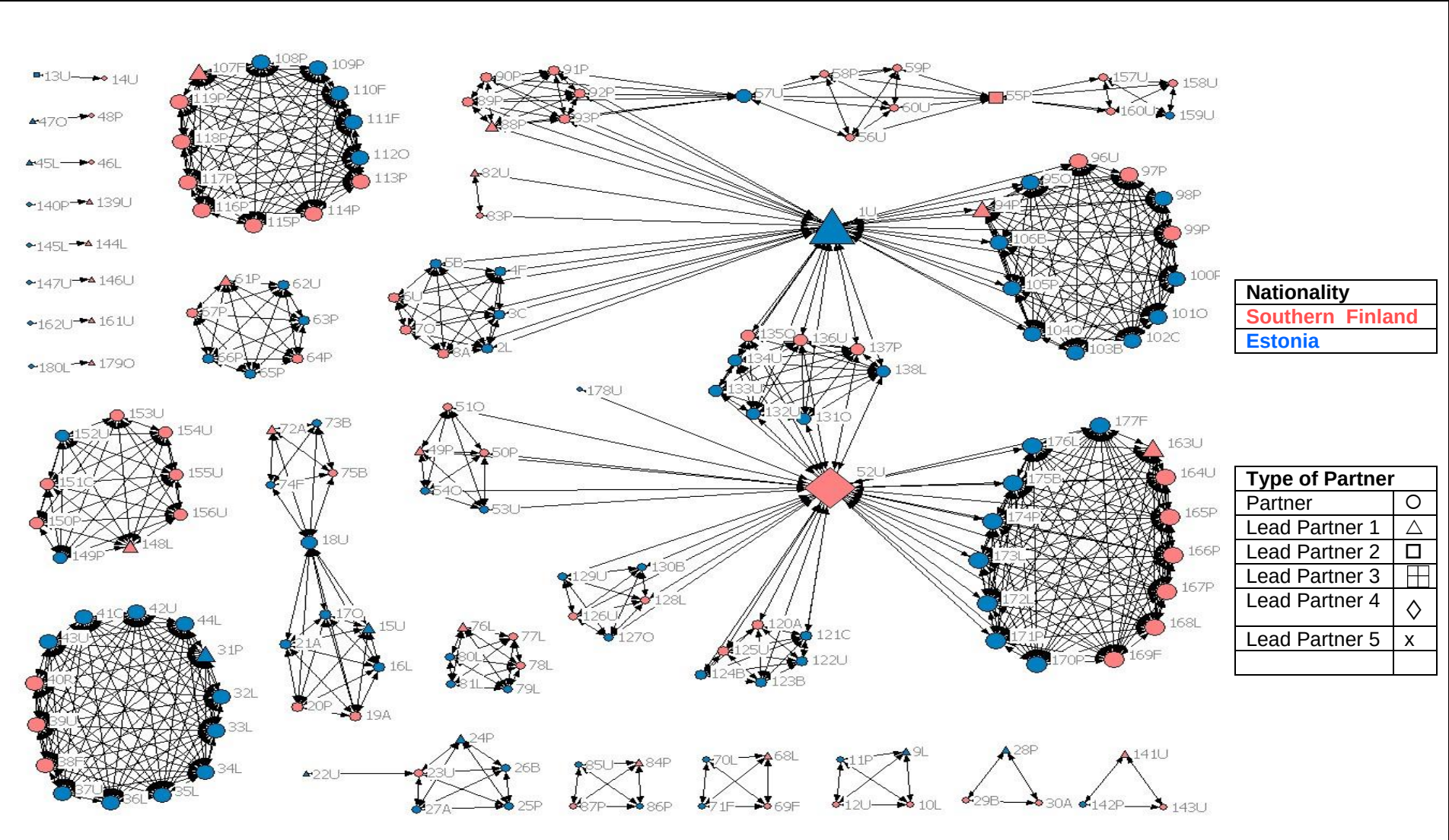
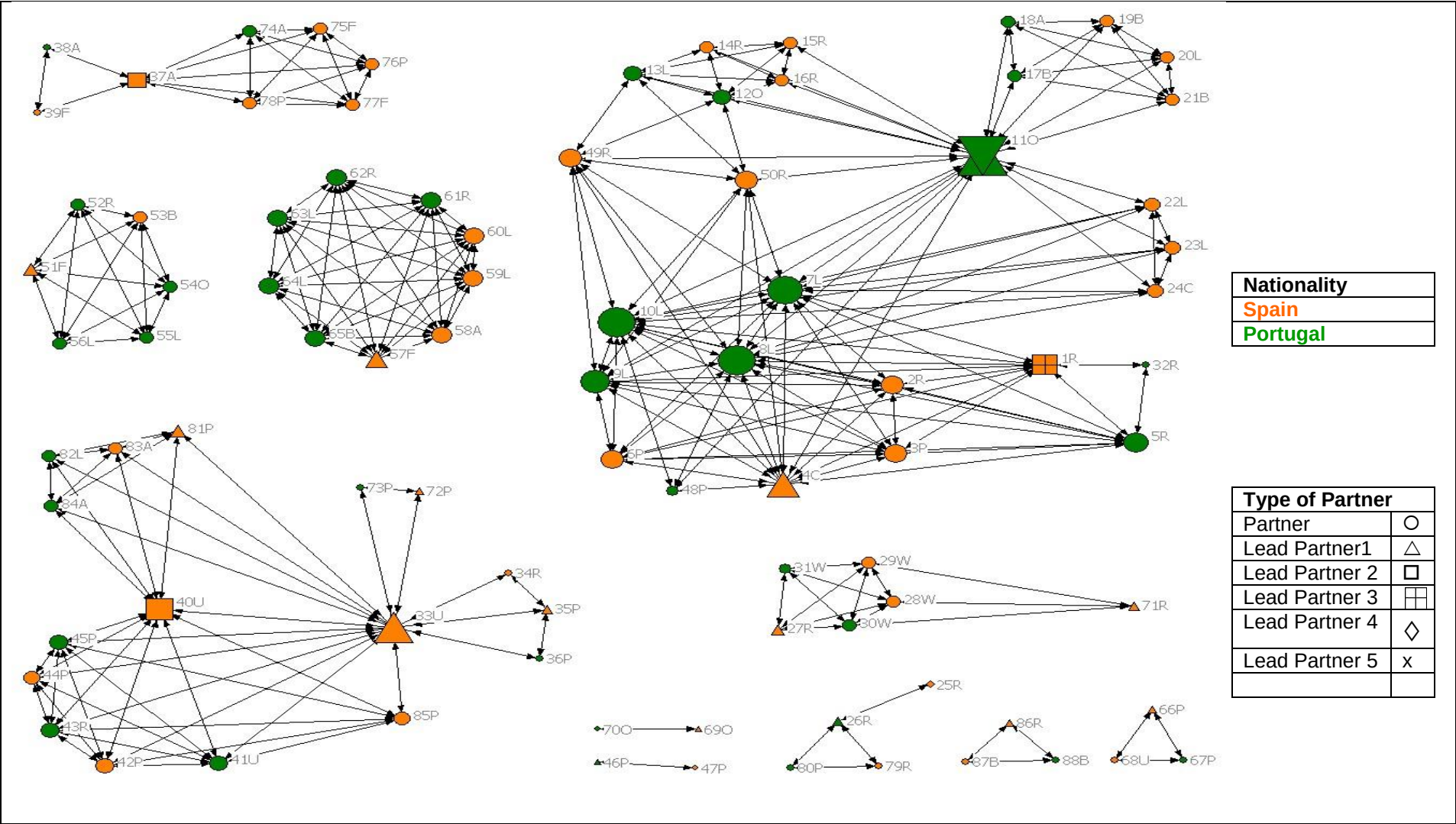


Figure 14: Network of the cross-border cooperation Alentejo-Algarve-Andalucía subprogramme 2007-2013 representing Nrm degree



Making a simple visual description of the network structure, in the Figure 13 we show the network of participant institutions in Interreg A 2007-2013 in the cross-border area SFE, with the degree centrality of each institution. As depicted in the Table 74, the number of institutions is 180, what makes the complete network very extensive. The density of the network is much dispersed and it is formed by internally connected sub-groups that are very disconnected one from another. The Figure 14 represents the network of participant institutions in the subprogramme AAA. In this network we find less number of institutions (88) doing cross-border cooperation, what makes the network less complex and with less institutional involvement. Although it is also a very disperse network, it seems more densely connected compared to the Southern Finland-Estonia network. As we can see there are disconnected sub-groups though some of them are related through certain relevant actors.

In both networks structure we detected the within-group social capital (see Chapter 2) of all the sub-groups visible in the Figures 13 and 14 and the between-group social capital, formed by these nodes connecting different subgroups. The network SFE (Figure 13) is characterized by the high number of dyads between Estonian and Finnish institutions. They represent independent small cross-border team-works among principally universities, local public institutions and non-profit organizations that might repeat their cooperation in two projects like the dyad between Tallinn Pedagogical College (13U) and the Diacona University of Applied Sciences (14U). The eleven dyads and three triads in this network reflect a broad number of autonomous and independent small groups of counterparts at both side of the border that do not relate with bigger subgroups and with those most central actors. Parallel to the small subgroups the network is formed by bigger subgroups very densely connected but again isolated one from another. However, the two most central actors connect different subgroups forming a block of internally dense subgroups connected through some bridging institutions who are those thicker nodes represented in the Figure 13.

In the network AAA (see Figure 14) we find similar characteristics as the network results very dispersed by subgroups with redundant relations between institutions but with lack of connections to other densely connected subgroups. The presence of autonomous pair of counterparts doing cross-border cooperation is significantly less with only six dyads and eight triads formed by institutions of very specialised field of

activities like non-profit organization for cancer prevention, the two regional institution responsible of the port and maritime transport, and an association of enterprises. This reflects that much of the cross-border cooperation in this cross-border area is preferable also in small subgroups of institutions from specialized fields of activity. However, there are bigger subgroups of institutions who form some blocks where certain actors have multiple comembership in different projects. It is clearly notable a big subgroup of cooperation with four or five actors who appear as very central, though especially the Association for the development of Low Guadiana, Odiána (11O).

In the Table 78 we represent different indicators of cohesion and centrality of both networks. The density of a network indicates the level of cohesion and the extent to which information flows between the actors of the network. If the networks have a low density, there are fewer opportunities for actors to be informed about what other institutions involved in cross-border cooperation do. Density also might reflect the level of social capital that actors might have (Hanneman & Riddle, 2005). In this sense, the institutional actors involved in Interreg cross-border cooperation have a high level of density (one in both networks) and therefore of social capital, understood by the capacity to reach to others or to get informed of others' activity.

However, we have to be cautious about this conclusion. As we commented above both networks are very dispersed and composed by disconnected subgroups. In this case, the indicator of density would not be appropriate to analyse the level of cohesion among institutions participants, given the high number of small sub-groups like dyads and triads present in both networks. At the same time, these networks of cross-border cooperation are formal networks that reflect ties of an official partnership. Institutions appear grouped around a certain cross-border projects. But this partnership does not necessarily and probably reflect the rest of relations that these institutional actors might have with the rest of institutions involved in Interreg projects. If other type of informal relation besides partnership would be available, we would see probably more dense networks with more connected subgroups in this network (Garcia, 2002; Provan, Harvey & De Zapien, 2005). It would be necessary to make a survey to each institutional actor about their more informal networks not only according to the criteria of partnership in a cross-border project within Interreg, but also according to information exchange, informal relations, etc.

Table78: Measures of centrality in institutional networks

Complete Network		Alentejo-Algarve-Andalucía	Southern Finland-Estonia
Density		1	1
Network Centralization		17.72	17.61
Nrm Degree	Mean	6.81	4.37
	Desv. St.	4.35	3.03
Institutions ≥ Mean Nrm Degree	Nº	36	77
	%	40.90	42.54
Betweenness	Mean	0.13	0.24
	Desv. St.	0.55	1.33
Institutions ≥ Mean Betweenness	Nº	12	18
	%	13.48	10

Source: Author's compilation.

It seems more plausible the very low network centralization that both networks have, 17.72 in AAA and 17.61 in SFE. Except certain institutional actors the rest of the institutions have a similar hierarchical position as both networks have not a high degree of inequality. In the Table 78 we see that the mean of the Nrm Degree in both networks is low, though it has a high standard deviation, what reflects that though there is little power centralization, certain actors have a high centrality compared to the rest of them. The number of institutions with a Nrm degree higher than the mean Nrm degree represent the 40.90% in AAA and the 42.54% in SFE. Among those with a high degree centrality certain actors, who have comembership in different subgroups, play a more important role in the whole network.

With the analysis of the following indicators of degree and betweenness and experts' opinions we tackle the objective 8 of the Doctoral Thesis, which is to identify those most important actors and to analyse their role in the network structure of formal cross-border cooperation in both cross-border regions. Examining the institutional actors with highest centrality, in the cross-border region Southern Finland-Estonia, the Turku University of Applied Sciences (52U) from Finland with a Nrm degree of 21.78 and the Estonian University of Applied Sciences (1U) with a Nrm degree 20.11 are the most central actors. Both institutions collaborate also together and form part of different projects within the Interregsubprogramme Southern Finland-Estonia. The Turku University of Applied Sciences (52U) have been leader in four different projects and participates in two more. The Estonian University of Applied Sciences is leader in one project and partner in four projects more. These two universities represent those with greater number of relations. In the Figure 13 we can see that they are the thicker nodes,

and the institutions who connect the biggest subgroup of the whole network, connecting very dense subgroups one with another. This confers to both universities with greater bridging social capital in the network. After these two actors and the subgroup formed by actors 164U to 177F with a Nrm degree of 8.33, the rest of institutional actors do not have a central role in the whole network. But again we can observe the centrality of other universities like the Tartu University-the Institute of Ecology and Earth Sciences (43U), and HAMK University of Applied Sciences (96U).

In the cross-border region of Alentejo-Algarve-Andalucía, the distribution of power is distributed in a bigger number of actors. Among those with higher centrality are first Portuguese institutions at the local level. The Association for the development of Low Guadiana, Odiana (11O) is the most central actor in the network with a Nrm degree 23.86. It follows the University of Algarve (33U) who is lead partner in one project and participates in four more projects. The City Councils of Mértola (10L) from the region of Alentejo and Castro Marim (8L) from Algarve, with a Nrm degree of 18.39, have the same centrality that the University of Algarve (33U). Other relevant local authority in this network is the City Council of Vila Real do Santo António (9L) with an Nrm degree of 13.7. At the Spanish side, the Province Council of Huelva (4C) is the most central actor with an Nrm degree of 14.94, followed by the University of Huelva (40U) with an Nrm degree of 12.64. This university that together with the University of Algarve, participates in four projects and is leader of two of them. The same centrality like the University of Huelva has the regional administration of Andalucía represented by the General Secretary of Foreign Action (1R). In the Figure 14 we can see how these actors are the biggest nodes. They are within the biggest subgroup of the whole network as they are partners in different projects, especially the Association from development of Low Guadiana, Odiana (11O) who is leader project in five different projects. The local actors at the Portuguese and Spanish side have higher centrality than the Regional Government of Andalucía, though this actor (1R) is leader in three projects. These most central actors are those who form the biggest and denser sub-groups. One subgroup is leaded by the University of Huelva and Algarve. Both actors have created an intensive capacity of cooperation building a community through bridging social capital with dense small subgroups connected among them. In the other biggest subgroup, we encounter a very central actor with the highest level of social capital in the whole network, who is the Association from development of Low Guadiana, Odiana (11O).

Despite that only three Portuguese institutions lead projects of cross-border cooperation; this institution leads the most with five projects.

As we commented, both networks are formed by densely connected nodes in subgroups that are disconnected one from another. The betweenness of both networks 0.13 in AAA and 0.24 in SFE, demonstrates as well the way cross-border cooperation within Interreg takes places. Projects are developed by isolates small groups from two to five institutions, or by medium size groups of more than six partners. Among them, certain actors who have comembership in different projects are those most prominent actors who have not only more practice and knowledge at doing cross-border cooperation in the border region, but also more knowledge of the network and a global perspective of the whole set of institutional actors in the cross-border regions. They are also those actors who might connect better actors within and outside their regions, being capable to find partners for the projects at the stake, and to recommend to others to the suitable partners for cooperation. Those institutions with highest betweenness represent barely the 13.48% and 10% respectively in the cross-border regions of AAA and SFE. That is, few institutions (12 in border region AAA and 18 in border region SFE) play as intermediaries and take greater control in the flow of communication and resources in the network for the development of cross-border projects.

However, they are less if considering those institutions with the highest NBetweenness, that in Figures 15 and 16 are the biggest nodes. This position makes the actors with highest bridging social capital in the network. In the cross-border region of Southern Finland-Estonia, again the two universities with highest Nrm degree are those with highest betweenness, the Estonian University of Applied Sciences (1U) with NBetweenness of 12.81, and the Turku University of Applied Sciences (52U) in Finland with NBetweenness 11.67 they are the best intermediaries or brokers in the network. After them the rest of actors do not have such a high capacity, only the Maritime Institute of Tartu University (57U) with an NBetweenness 3.95 and the Kotka Maritime Research Association (55P) with a NBetweenness of 1.98, can be considered as good bridging actors or brokers. They connect three different subgroups as we can see in the Figure 15.

In the cross-border region Alentejo-Algarve-Andalucía we find also that the group of actors who are the most central tend to be also the better connected other and who better control the network dynamic. The Association for the development of Low Guadiana, Odiana(11O) is the actor better placed in the network (NBetweenness 4.74), this institution has access to the biggest part of the network, that is, the biggest block that we can see in the Figure 16. This institution has greater capacity to connect other subgroups and actors. Again the University of Algarve (33U) with NBetweenness of 1.96 is the second actor as the best broker in the network as this institution is the bridging actor of the other second big block of the network. The City Councils of Vila Real (7L), Castro Marim (8L), Alcoutim (9L) and Mértola (10L) form a quarter of local brokers in this network structure. Other important brokers at the Spanish side are the Province Government of Huelva (4C) and the Regional Government of Andalucía (1R). We can see logically that these actors are the thicker nodes in the Figure 16.

Figure 15: Network of the cross-border cooperation in the Southern Finland-Estonia subprogramme representing NBetweenness

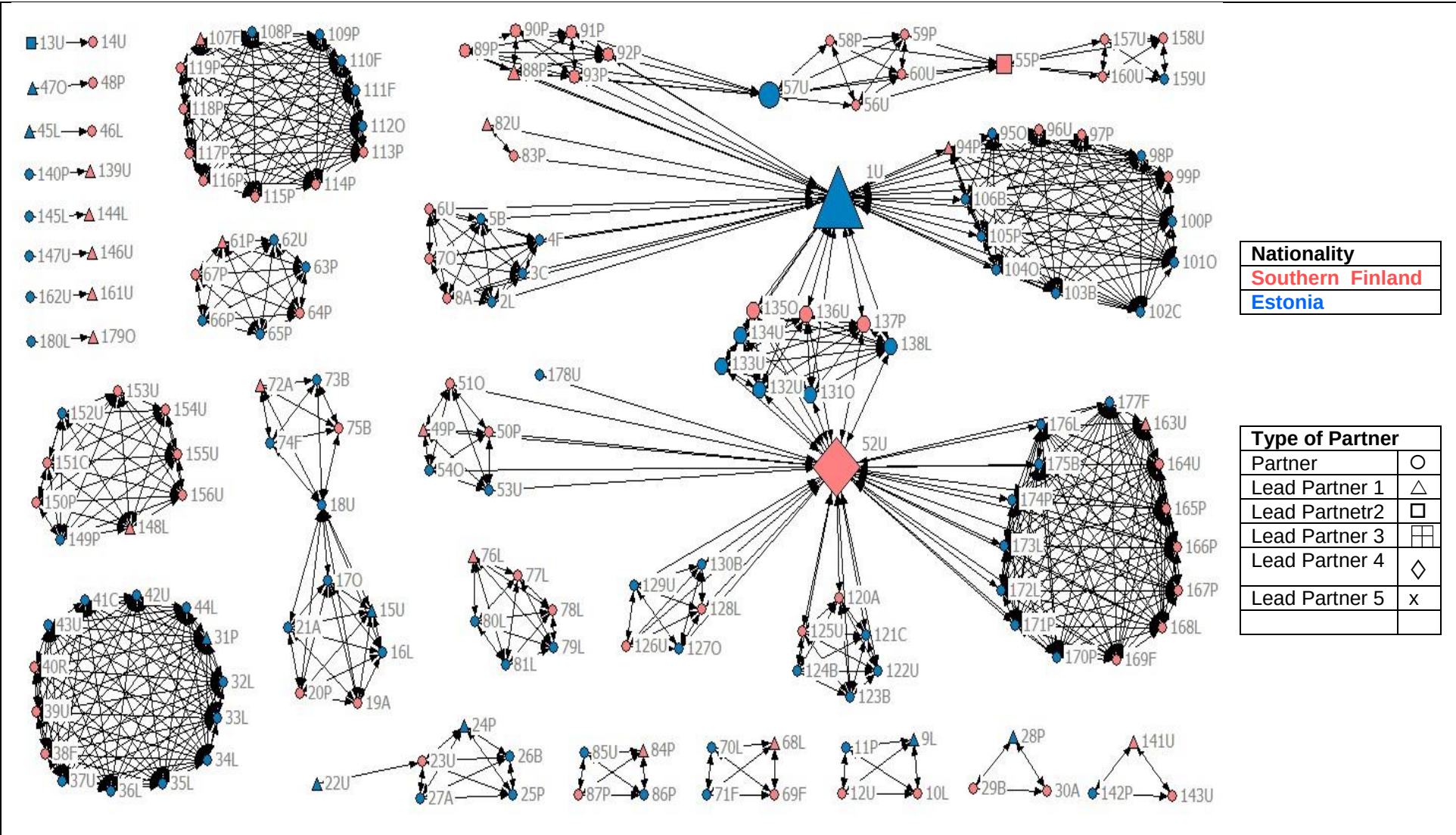
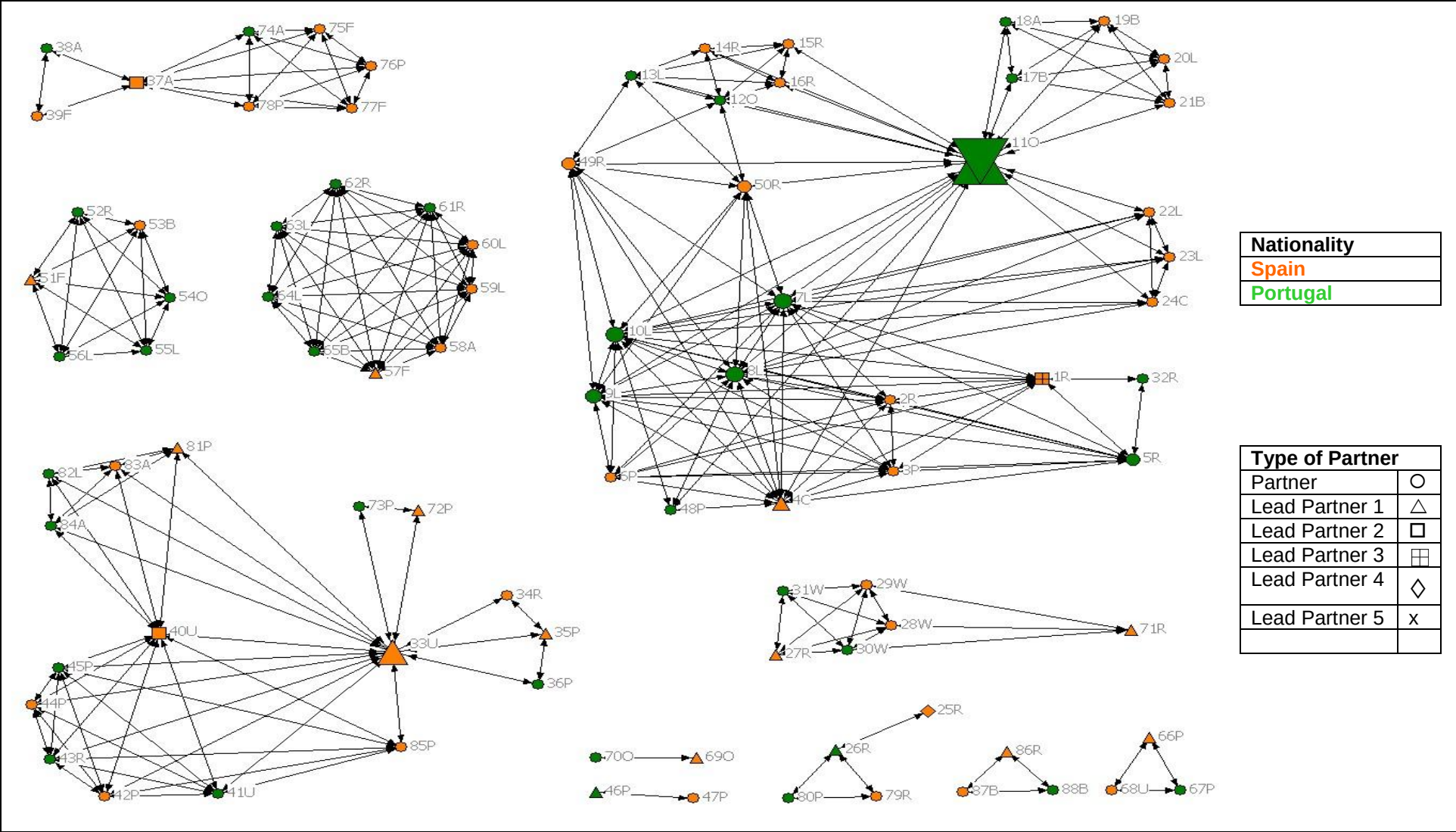


Figure 16: Network of the cross-border cooperation in Alentejo-Algarve-Andalucía subprogramme representing NBetweenness



Up to now this analysis is based in social network analysis with the official data of subprogrammes, their projects approved and the institutions participants. However, it is very interesting to report what the experts commented in the interviews and to see if their opinion is rooted in what we have showed in previous Figures 13, 14, 15, and 16. The experts were asked about their perception on who were the most active and most important actors in the official cross-border cooperation of their cross-border region. Their answers tend to support what the social network analysis detects.

In the cross-border region Southern Finland-Estonia, the experts identified several types of actors as the most relevant in their cross-border regions. They were universities, local municipalities and non profit organizations. The universities of both countries were identified as very important and dynamic actors both in the formal and informal relations of collaboration. The University of Applied Sciences in Tartu (1U), and Turku University (52U) were identified also as very important actors. Other universities that operate in different projects through their different departments and institutes do not have a high centrality and betweenness. The experts mentioned also Alto University that comprises different actors in the network structure like 23U, 38U and 60U; the Tallinn Technical University (178U), or the Helsinki University (6U, 56U, 82U, 141U, 143U) that again through different departments and institutes operated in different projects.

“I mean the most actives are definitely the universities, and then municipalities and after that ONGs” (F20, Finland, Manager, Public Institution, 2011). “I think Governments but also Universities are very important” (F22, Finland, Professor, University, 2011). “Definitely of course local municipalities, because usually all kind of administrative, all kind of permissions and city planning and general planning are made there, so they are often is not even possible to not include them, you know... but of course our universities our Finnish universities are very active. Alto University and Tallinn Technical University, Helsinki, Turku, Alto, really the cooperation between universities is very important” (F17, Estonia, Manager, Public Institution, 2011).

As we can see in the last quote, the municipalities are other of the most important actors in this cross-border region. They represent also the 20% of lead partners in both countries. In this case the most repeated cities by experts are the capital cities of each country, Helsinki and Tallinn and other important cities from the metropolitan area of both countries like Turku in Finland but also other important cities like Tartu in Estonia. Logically, the low population density and the economic activity concentrated in the

metropolitan areas of Harjumaa (Estonia) and Uusimaa (Finland) makes these cities the most competent to carry out projects of European cross-border cooperation.

“I think the local actors are very relevant and maybe the most relevant” (F20, Finland, Manager, Public Institution, 2011). “I could say, I think currently the City of Helsinki and the City of Tallinn and then, of course the regional, the correspondence regions Harjumaa and Uusimaa but this is a kind of small organizations, the Uusimaa region compared to the city of Helsinki” (F21, Finland, Manager, Public Institution, 2011).

“Actually, between Tallinn and Turku. For example we are both cultural capital now, so in this area there is much cooperation. But of course Tallinn and Helsinki are also quite connected. But also small municipalities! for example” (F17, Estonia, Manager, Public Institution, 2011).

At this respect, looking at the Figures 13 and 15, Tallinn City Government is present in actors 33L, 34L, 35L, and 36L, and the City of Helsinki is the actor 32L and 76L. They are all among the institutional actors with Nrm degree higher than the Nrm mean. Other municipalities like Lieto (168L), Alatskivi (173L) and Rõngu (172L) are those most central for being in one of the subgroups better connected through the University of Turku (52U). By last, considering the experts opinion, non profit organizations are also important actors after the local governments and universities. According to the social network analysis we can see that half of them have a high Nrm degree over the Nrm mean. In the Figure 15 we appreciate that they are members of subgroups which are interconnected again through universities, key actors 1U and 52U.

Other type of actor commented by some experts were the national Enterprise Estonia (EAS) and the cultural-educative institutions at national level of Estonian Institute and Tuglas Society (Tuglas Seura). They are not present in the Figures 13 and 15 as they do not participate in the subprogramme Southern Finland-Estonia, and do not get funding from the European Regional Policy. The EAS is a state agency that works for the promotion of business in Estonia. In this case the headquarters of EAS in Helsinki was mentioned as very good actor at promoting business relations between Estonia and Finland. In the same way, the Estonian Institute and Tuglas Society have headquarters in their respective neighbour countries to promote the cooperation and cultural relations between civil society and professionals in the general field of culture.

“For example EAS, I think they are doing a very good job, a very good job in a way that beyond their area because their role is to promote business and the way they do it, it

seems to me that they promote rather well Estonian image, they promote relationships between people” (F11, Estonia, Consultant/Analyst Freelance, 2010). “Tuglas Society, the same like the Eesti Institute, is on the boat very much, so we organize many things, we support cultural things” (F10, Estonia, Manager, Public Institution, 2010).

In the cross-border region Algarve-Alentejo-Andalucía, we detect in the interviews that the expert’s perception focus in the dichotomy of the role of local and regional actors, that is, municipalities and regional government institutions, especially in the Spanish side. For the experts who work for local administrations, inter-municipal associations or county and provincial institutions, the local actors should be the main actors of the official sub-programme Algarve-Alentejo-Andalucía. This reclaiming role does not correspond with the share of local actors in the projects of cross-border cooperation. As we can see in the Table 76, the local actors do not represent more than 10% of the Spanish institutions, though in the Portuguese side they are the 25.6%. If we consider how many of them are project leaders, we can see that none of the local actors lead a project (see Table 77). This obeys also to the lack of capacities and resources that local administrations have in this cross-border region for the development of this kind of projects. What explain that all of them participate as partners or are represented by institutions at higher level like association of municipalities at county level and provincial administrations. However, experts emphasize that if not leaders of projects, local actors of the border areas should be better represented by the regional actors. The regions on the contrary are the most numerous project leaders at both sides of the border.

“In this type of cross-border cooperation we are the real protagonist, we are the Nuts III. However, we are losing every time more this role to the benefit of the Nuts II. Here the Nuts II is the Autonomous Community and all its regional ministries. That furthermore they are getting involved in major projects” (E6, Spain, Manager, Public Institution, 2011).

The experts pointed that most of the cooperation between borders was initiated by local administrations. Among the local municipalities identified by experts as very active and important actors are the City Council of Mértola (10L), who has a high Nrm degree of 18.18 in the network and long experience working in local development. In the Figures 14 and 16 is located in the biggest subgroup connected to actors 11O and 1R. This local administration is mentioned by Spanish and Portuguese experts as very important actor in the region of Low Alentejo (Baixo Alentejo) and in the cross-border cooperation.

Vila Real do Santo António (7L) and Ayamonte (22L) are located face to face in the border and are reported as an important pair of actors in cross-border cooperation. Nevertheless, the City Council of Vila Real do Santo António (7L) is more central with a Nrm degree of 17.04, as we can see in the Figure 14.

After these local actors we find intermunicipal or provincial actors very relevant in the cross-border regions like the Association for the development of Low Guadiana Odiana, Beturia and the Province Council of Huelva. Odiana (11O) is a reference for the experts in this cross-border region that is corroborated also by the social network analysis like the most central and best intermediary. The Spanish institution Beturia (24C) is an intermunicipality association mentioned by the experts as very important at the parallel Spanish territory of Low Alentejo, the Andévalo. Beturia (24C) was created in response to the initial cooperation between some Spanish municipalities and Portuguese city councils. What reflects the role of the formers for the maximization of the Spanish municipalities' bonding and bridging social capital. The Province Council of Huelva (4C), with a high Nrm degree of 14.94 is considered not only as very important for the experts but also as the best representation of local administrations of Huelva for the cross-border cooperation. This institution is considered as a social capital maximizer of the small municipalities that otherwise could not participate in projects individually.

“To some extent the Portuguese institutions influenced in the formation of this grouping (Beturia). They had more experience in local development and European funds. So in a conference of cooperation that took place in Portugal the mayors of the Spanish municipalities attended and among other things it came out the constitution of Beturia” (E2, Spain, Manager, Public Institution, 2011). “At least the Province Council of Huelva) channels many times our voice and is the representative institution with this attitude” (E3, Spain, Manager, Public Institution, 2011)

Along the border there have been several attempts to create embryonic examples at the local and county level of what is understood currently as an Euroregion. Institutions like ATAS between the municipalities of Alcoutim and San Lucar de Guadiana; ANAS, between the municipalities at the littoral of the border regions; and Horizonte 2006, comprising municipalities in the northern part of the cross-border region, were constituted though they did not succeed in time (see also Chapter 3).

“The association ANAS is a group the municipalities from Algarve and Huelva. Indeed

it was an advance idea of an Euroregion. We really wanted to agree in many things. But I don't know if we came early to the European integration. At the same time, the European Union was a very abstract idea at that time" (E15, Spain, Politician, Public Institution, 2011).

The regional institutions like the Government of Andalucía (1R) and its regional ministries, and the CCDR (Regional Commission for Coordination and Development) of the Alentejo (32R) and Algarve (5R) regions are the main regional actors and the driving force of the recently created Euroregión AAA. The Government of Andalucía and the CCDR of Algarve are the most central regional actors, while the CCDR of Alentejo plays a minor role. There are also numerous regional actors like the regional ministries, departments, institutes, etc. that have also a high Nrm degree, like the actors 49R, 50R, 61R or 62R. They are considered by experts as very important as they are the most capable to achieve a global and integral vision for the development of this cross-border region. Despite the asymmetry between the Spanish and the Portuguese regions' competences (see Chapter 3), we find in the expert's discourse the description of the regional actor as the perfect coordinator, intermediary or broker among the rest of institutions.

"I think that the regional administrations are capable to get out of the micro perspectives and to consider the whole territory. They are more global institutions and more resourceful" (E6, Spain, Manager, Public Institution, 2011). "Many times the CCDR is required by other institutions to search partners at the Spanish side" (E21, Portugal, Manager, Public Institution, 2011)

By last, other important actor emphasised by the experts were the universities. They all referred to the cooperation between the Universities of Algarve (33U) and Huelva (40U), though there are other universities like the Polytechnical Institute of Beja (41U) and the University of Cádiz. In the Figures 14 and 16 we observe that 33U and 41U, are bridging actors in the second biggest subgroup of the network, specially the University of Algarve with a high Nrm degree and high NBetweenness. However, the experts assert more the consultative role of the Universities for research activities related to cross-border regions and cross-border cooperation, and claimed a more active role of the universities that goes beyond the researcher function without direct applicability to the cross-border cooperation.

They demand us a study or a research project, so we are more in this marginal position” (E12, Spain, Professor University, 2011). “I think the University is a fundamental actor, though still what it does is not practical for the needs of the cross-border region development”(E9, Spain, Manager, Private Company, 2011).

Alternatively we can consider who are those actors not only better connected or with higher number of ties, but also those that if remove would disconnect at the most the whole network. The analysis of cutpoints in both networks complements previous indicators, and approximates us to the notion of the structural holes present in both networks and to identify those institutions with greater bridging social capital (Burt, 2008, Crowe, 2007). In the cross-border region of Southern Finland-Estonia there are six institutions as cutpoints that represent the 3.3% of the whole networks. All the existing cutpoints in the network are universities. Again the most relevant are the Estonian University of Life Sciences (1U) in Tartu and the Turku University of Applied Sciences (52U) as they both form the biggest subgroup. These universities form a big network of both densely connect subgroups that are interconnected with others having the resources of bonding social capital and the access to bridging social capital. There are other universities that interconnect other subgroups, like the University of Tartu-Estonian Marine Institute (57U), the Kotka Maritime Research Association (55U), the Tallinn University of Technology (18U), and the Aalto University Foundation,-Aalto School of Economics, Small Business Center (23U). Without these nodes or structural holes the network of cross-border cooperation would be a map of isolated grouping satellites. In the cross-border region of Alentejo-Algarve-Andalucía, there are five institutions as cutpoints that represent the 5.6% of the whole networks. We find also that some of the most central and better bridging actors are also cutpoints, that connect at the most the whole network like the Regional Government of Andalucía (1R), the Association for development of Low Guadiana, Odiana (11O) and the University of Algarve (34U). But other actors like the Agency for Innovation and Development of Andalucía, IDEA (38A) and the Regional Administration of Health in Algarve, appear as key structural holes of the network.

Concluding, looking at the four Figures (13, 14, 15, and 16), on the one hand we observe the high number of small sub-groups disconnected one from another in the network, on the other, there are some few actors that play an important role connecting subgroups with non-redundant ties to other sub-groups. According to Crowe’s (2007)

typologies of network structures and their relation to bonding and bridging social capital in the network in both cross-border regions of Alentejo-Algarve-Andalucía and Southern Finland-Estonia we find the combination of a “factional pattern” and “coalitional pattern”. The factional structure is based on groups connected considered as forms of bonding social capital that are not connected among them, forming isolated small and medium size grouping satellites. The coalitional structure consists in dense subgroups of institutions that cooperate according to project membership, though they are connected to other subgroups by certain bridging actors. This coalitional type forms a network structure of bridging social capital. However, in the network of Alentejo-Algarve and Andalucía, we could state that there is also a bridging structure. The indicators of centrality and betweenness indicates us a less concentration of power and intermediation in the network, while these indicators in the cross-border regions of SFE are more concentrated among fewer institutions. At the same time, there are more cutpoints. Comparing the Figure 14 and 16 with the Figure 13 and 15 we appreciate more “bridging structure” in the cross-border region AAA while the cross-border region SFE show more isolated subgroups. Nevertheless, unlike in the analysis of Crowe (2007) we do not associate this type of network structure to certain pattern of socio-economic development.

Undoubtedly, the socio-economic context and the geography and spatial conditions of each cross-border region influence in the network structure (Doreian & Conti, 2012). Obviously the context of both cross-border regions described in more detail in the Chapter 3 helps to understand both network structures. We can state that the more bridging structure present in the cross-border network of AAA is associated to the higher comembership of institutions in a cross-border region that do not count with numerous institutions capable of participating in the projects of the European cross-border cooperation, unlike in the cross-border region SFE which is a metropolitan area with a intensive economic activity and cooperation between both countries. The fluidity of communication given by transport, the percentage of people residing in the neighbour countries, students and professors exchanges, etc are all relevant factors that boast the myriad of possible partnerships that later crystallized into formal projects to be funded in both sub-programmes. This greater intensity of cross-border relations in the cross-border region SFE leads to bigger amount of institutions eager for participation in the cross-border cooperation subprogramme. On the contrary, the lack of permeabilization

of the border, summed to the low density of institutions close to the border, lead to a smaller institutional community where everybody knows each other and there are old-known partners very well connected.

7.2. Nature and content of institutional relations.

This section is complementary to the previous with a more qualitative approach to the study of the institutional network of cross-border cooperation. First we have tackled the study of the network structure of the cross-border cooperation between institutions within the sub-programmes Southern Finland-Estonia, of the Central Baltic INTERREG IV Programme 2007-2013, and Alentejo-Algarve-Andalucía of the Operational Programme for Cross-border Cooperation: Spain – Portugal, 2007-2013, POCTEP. Now we want to examine the discourse that the experts have of those institutional relations between institutions participating in the sub-programmes commented. For that purpose the objective 9 is to analyse from the experts' opinions concerning the institutional relations measured in terms of intensity and quality.

Assuming social capital as the function that has to facilitate or not the realization of certain actions or interests for the actors embedded in a network (Coleman, 1988) we can estimate as relevant the qualitative assessment of the experts. That is, the extent to which the institutional relations facilitate or not the achievement of institutions interests or the common benefits as it is the case of public and policy network (Isett et al., 2012). Different approaches to social capital support the qualitative study of the relationships and networks. To consider the actors' perceptions and opinion about the relations and the network structures and also their assessment in the flow of resources and information is tackled by different scholars in the study of social capital and networks. The aim to uncover the actors' perceptions of their relations is one of the main targets of the institutional type of social capital, that is, the social capital built between citizenship and governance structures (Grix, 2001; Maloney et al. 2000). With actors' opinion is possible to ascertain the opportunities for access to resources and hence of social capital mobilization. Following Isett et al. (2011:169) scholars should consider what practitioners of public network think and experience, to know the real problems that practitioners face rather than to solve only theoretical interests.

Scholars seen in the Chapter 1 like Woolcock (2001), Fukuyama (1999; 2001), Spellerberg (2001), or Harper (2001) propose the use of quantitative and qualitative measures of social capital. With the qualitative perspective we can find the complementary tool for assessing the social capital existent in the network structure analyzed before. Following Devine and Roberts (2003), the quantitative measures cannot account for process underlying the existent and observable relations that conform the network structure of cross-border cooperation. This process is only possible to seize through the technique of “talking to people”, because it reveals the complex meaning of institutional relations and social capital.

The intensity or frequency of the relations is one of the main aspects studied in the analysis of personal networks and social capital. These characteristic remarks the need to assess mainly those durable relations in order to analyze social capital emphasized by scholars of social capital (Bourdieu, 1980, Burt, 2008). In this line, Harper (2001) includes the study of the frequency and intensity of relations in the survey matrix for the study of social capital in communities. According to this indicator we could describe the strength of institutional relations across the border. However other relevant aspect is the quality of those relations. In this case, we find that the quality of relations is measured in terms of trust or mistrust by Grix (2001) and Grix and Knowles (2002), though this notion of quality leads to the sine qua non condition of a durable relation through which only across time contextual trust has emerged. In this study, the term quality appears related to the idea of trust, but also associated directly to the idea of collective action by those who form part of the network. That is, the perception of quality that experts give is related to the use value of the institutional relations. According to this indicator we could assess the effectiveness or capacity to mobilized resources or social capital across the border. This aspect is precisely one of the most relevant value of public and policy networks (see Chapter 2). The capacity of those institutional relations to generate some form of collective action can take the form of cooperation for building a common benefit and that refers directly to the study of network governance (Provan & Milward, 2001; Kenis & Provan, 2009; Provan & Lemaire, 2012).

The questionnaire carried out to experts included a question about their opinion considering the intensity and quality of institutional relations in cross-border cooperation field. The answers were codified under the codes “good intensity”, “poor

intensity”, “good quality”, “poor quality”, by the criteria of the researcher. We will proceed with the content analysis of the quotes labelled with these codes. Nevertheless, in order to have a synthetic idea of the content analysis, we have extracted a quantitative analysis of the qualitative data. The quotations codified were processed with Spss in order to see the frequency of the four codes by experts and by country, reflected in the Table 79.

The data depicted adds value to the content analysis, though it cannot be interpreted as statistically representative. We can find in the experts’ answers from the four countries references to good intensity and good quality. However, regarding the codes of poor intensity and poor quality, there is a more significant difference by cross-border region. In general Spanish and Portuguese experts are more critical with the intensity and quality of the institutional relations in cross-border cooperation. The difference between both cross-border regions is more remarkable when considering the assessment of the quality of institutional relations. The Spanish experts commented more negative, followed by the Portuguese experts. On the contrary, in the cross-border region of Southern Finland-Estonia only three quotations were codified as poor quality, although most of these references belong to the same expert as we will see right after. More interesting is to see that among the Finnish experts were not codified any reference regarding negative or poor assessment of institutional relations.

Table 79: Experts’ number of quotes concerning institutional relations by country

Country	Experts	Good Intensity	Good Quality	Poor Intensity	Poor Quality
Spain	Total	7	10	6	25
	Average	0.64	0.91	0.55	2.27
Portugal	Total	8	6	5	13
	Average	0.73	0.55	0.45	1.18
Estonia	Total	11	10	2	3
	Average	0.92	0.83	0.17	0.25
Finland	Total	4	10	0	0
	Average	0.36	0.91	0.00	0.00

Source: Author’s compilation.

In the cross-border region Alentejo-Algarve-Andalucía the detailed analysis of the experts’ quotations with good intensity pointed to the idea that the institutional relations are improving very much in intensity. The institutional relations in this cross-border region have characterized by being not very intensive in the past, though in the recent

years they are increasing specially among the institutions at the regional level like the CCDDR of Alentejo and Algarve and the Regional Government of Andalucía. At this respect, several experts commented that the local institutions have had more relations and more intense than the regional institutions who in the last programme period 2007-2013 are increasing their contacts, more specifically since the new Eurorregión Alentejo-Algarve-Andalucía is in the making process. This good intensity of relations is assessed considering the territorial and socio-economic characteristics of the cross-border area. The weak permeability of the border in the internal areas, the poor economic capacities of the local municipalities, and their low population density are obstacles that influence considerably in the capacity for establishing and maintenance of contacts. Regarding these obstacles, even the intensity of institutional relations is bigger than the intensity of informal relations between citizens, associations, enterprises, etc.

“The intensity has improved a little from the beginning of the cooperation. We are in an interesting area but difficult also. It is a poor area, with geographical discontinuity. The Algarve connects with Andalucía, the Alentejo with Extremadura. Thus, the Low Alentejo with Andalucía are not so frequent than those with Extremadura. But in the last programme period they have improved”(E5, Portugal, Manager, Public Institution, 2011). “Every time more, I mean that there is an increasing activity among the regional institutions, between the CCDDR and the Government of Andalucía and its ministries, every time more, because they are increasing their share in this programme period 2007-2013” (E6, Spain, Manager, Public Institution, 2011). “I think that the institutional relations are stronger, independently if they are more positive or negative, but in general more than in the informal level” (E8, Spain, Manager, Public Institution, 2011).

The references regarding the code “good quality” refer mostly at the local than at the regional level. They reveal the capacity to mobilise resources in the form of bonding social capital between institutions networked that established and maintain norms of trust and reciprocity in the institutional cooperation; and in the form of bridging social capital between institutions that create new cross-border and national networks in order to get better access to resources. In general, the experts discourse reflects a good perception of the institutional relations at the local level as form of network governance.

“For a long time we have a sort of a gentlemen’s agreement. We compromised that before taking the initiative for a project we should discuss it with the Province Council of Huelva, in order to not make parallel activities in the same territory or to get broader impact of the project. For that question we created a council of municipalities, where all the villages are represented. (E6, Spain, Manager, Public Institution, 2011).

Nonetheless, we have found more references considering the institutional relations under problems of intensity and quality. Despite what we have commented before, the experts' evaluation of institutional relations is that they are not so intense as they should be. Many of these relations are "ad hoc" where the institutions cooperate project by project. However, once the projects are finished they do not continue. This adjustment to the project cycle makes the Portuguese-Spanish cross-border institutional relations to be rather temporal and tight to projects calendar than continuous in the time (González, 2012). The experts argued that the reasons that jeopardise more continuous institutional relations are the weak economic capacities of municipalities of the closest area to the border, but above all the different administrative and territorial structure of Spain and Portugal. The asymmetry of competences between Spanish and Portuguese institutions is one of the main problems commented by the experts and one of the problem that have received most scholar attention (Montero, 2008; Covas, 2009). This problem provokes that those broker institutions do not have their equal counterpart in the cross-border region. This is the case of the Province Council of Huelva (4C), or the Portuguese City Council of Mértola (10L). The institutional asymmetry makes more difficult the process of searching for the right partners, and later on to accomplish projects according to the respective institutional competences.

"No, no, they are not very intense, they depend on the projects. When there is a project, there is relation" (E20, Portugal, Manager, Public Institution, 2011). "It is very punctual and periodical, concerning only projects, there is not continuity and they depend on the projects" (E22, Portugal, Politician, Public Institution, 2011). "I think there is not much intensity, because the structures are very different. For instance, the Province Council of Huelva does not have an equivalent in the Algarve, and there is not a regional government. So they do not have a formal interlocutor in Portugal. (E10, Portugal, Manager, Development Agency, 2011).

Regarding those quotations codified as poor quality we detected among Spanish experts a more negative evaluation of institutional relations, than among Portuguese experts. Even some of the Portuguese quotations of poor quality in the institutional relations referred to their opinion about the internal Spanish institutional relations. The experts in this cross-border region showed a discourse very critical in general towards the quality of the institutional relations. This quality of the institutional relations is mainly centred on the local-regional institutional relations. In the case of Spain the gap between local and regional administrative levels are much clearer than in Portugal, what makes the

Spanish experts to be more critical than their Portuguese counterparts. One of the main symptoms of the poor quality in the institutional relations is the lack of coordination between them. This problem is manifested also in the lack of flow of information between institutions, especially from the regional to the local levels, and has given rise to parallel actions in the past. The lack of coordination and parallelism of cross-border initiative at each side of the border make that the cross-border cooperation region to be characterised by juxtaposed and inter-institutional relations rather than cross-border institutional relations from which could emerge joint actions. Besides that, it is remarkable the lack of coordination between Spanish institutions that were perceived not only by Spanish experts but also by their Portuguese counterparts.

“Up to now, perhaps we have been working in parallel” (E8, Spain, Manager, Public Institution, 2011). “We cannot tolerate that different regional ministries take initiatives in the cross-border territories without informing the General Secretary of Foreign Action (1R), I am absolutely certain of that” (E13, Spain, Professor University, 2011). “The Government of Andalucía, municipalities or the Province Council, they are not coordinated, even there is wariness among them” (E1, Spain, Manager, Public Institution, 2011). “The institutional relations here are a bit different; I have observed in a meeting with this Spanish institution, our proposal had greater impact than the proposal of other Spanish institutions. And even I have noticed a tense relation between them. I think there is less institutional scorn in Portugal than in Spain”(E19, Portugal, Manager, Public Institution, 2011).

The most serious and worrying effect of the lack of coordination for those experts is the absence or poor added value of the cross-border cooperation done. This pattern of institutional relations provokes the lack of common goals, and the possibility to create a collective action effective for achieving results and socioeconomic dynamics or synergy in this cross-border region. This lack of coordination is a problem of governance commented already by different scholars (Knippenberg, 2004, Grix & Knowles, 2002; Lepik, 2009; González, 2012) that jeopardises the maximization of the institutions social capital in this cross-border region.

“The best answer is that there are inter-institutional relations, but not cross-border. They are juxtaposed initiative that consists on doing something there, something here but they are not cross-border or joint actions. So they do not multiply the effects, they do not reproduce. When they finish, again starts a beginning” (E18, Portugal, Professor-University, 2011).

One of the reasons of the lack of coordination commented by the Spanish and the Portuguese experts is the institutional mistrust provoked at the same time by the

interests conflict which is latent between institutions and politicians that govern. Other reason that complicates a desirable coordination is a process of institutional exclusion in the creation of networks for projects or in the creation of networks like the new Eurorregión Alentejo-Algarve-Andalucía. Both aspects, the wariness and institutional exclusion are accentuated between regional and local level. More specifically the exclusion of the networks reproduces a dark side of the social capital (Portes & Landolt, 1996) between local and regional institutions. According to the experts' quotations regional institutions seem to head toward the cohesiveness of their own regional bonding social capital, exerting the exclusion of local institutions. At the same time, this exclusion manifests a symptom of poor governance in the institutional networks for cross-border cooperation. In the experts' opinion this is evident in those institutions excluded from previous and existent networks and in those institutions excluded in the creation of new networks. At this respect, the constitution of the Eurorregión reflects also a particular problem of governance in this cross-border region, though this will be analyzed in the next section.

“Politics, the politician are damaging a lot the cross-border relations in this cross-border region” (E1, Spain, Manager, Public Institution, 2011). “I give you an example. We participated in two projects in the first call of POCTEP with this regional ministry. In the second call we wanted to continue because some things were left. We asked them as they were the project leader, and they told us - no, no, you can proceed as you want, because we have already applied for ours -, I replied – why? – And they answered that they have already a new proposal with a new regional partner in Portugal breaking the network with us, this is outrageous” (E6, Spain, Manager, Public Institution, 2011).

In the cross-border region Southern Finland-Estonia, the data of the Table 79 shows that the Estonian experts have more quotations regarding the code of good intensity, though there is not difference in the content analysis of the discourse. Both Estonians and Finnish experts expressed the high intensity of the cross-border institutional relations. This intensity characterise very much this cross-border region, specially the fluid and numerous relations between the Uusimaa (Finland) and Harjumaa (Estonia) regions, which are both founding members of the Euregio Helsinki-Tallinn and form the core area of this cross-border area. Some experts commented the solid and long-term relations at the informal level, between citizens, associations, churches, companies, etc, that have work as the ground for good and intense institutional relations. Due to this

intensity and plural relations, the cross-border cooperation in this cross-border region has become a natural process of the making policy both for Finnish and Estonians.

“I think is the most intensive if you take into account all other countries, yes” (F1, Estonia, Manager, Public Institution, 2010). “I think in our programme – Southern Finland-Estonia Subprogramme- the cooperation I could say is good and again because of the long-term relationship” (F17, Estonia, Manager, Public Institution, 2011). “Yes I think they have become more everyday cooperation, so very normal and there isn’t any strategy cooperation with Estonians any more” (F21, Finland, Manager, Public Institution, 2011).

Concerning the quality of the institutional relations, again the Estonian and the Finnish experts emphasize the good quality and effectiveness of the projects and any other cross-border initiatives. In this case, not only long-term relations that have create reliable cross-border institutional relations, but also very similar cultures, similar administrative structures that facilitate the achievement of results. Equally, the well-known Estonian interest at learning from its “big brother” in different fields have worked as the ground for a cross-border cooperation that maximize the resources of institutions, and work for outputs in the cross-border region.

“I think that the formal cooperation is good. I know that the city of Helsinki who is taking a very active role in it. I have seen it with my own eyes that they are. To my understanding they do get the positive output from Tallinn, and it is reciprocal” (F8, Finland, Professor, University, 2010). “I think they do quite a lot of cooperation especially in the field of education because the Finnish model is quite efficient and Estonians try to learn from this in my mind. And of course, the universities and institutions education are doing quite a lot probably in research and things like this. I would say this is rather good quality cooperation, but is my opinion” (F18, Estonia, Manager, Private Company, 2011). “I can’t find obstacles, usually we don’t have problems, I think that we have had successful projects” (F22, Finland, Professor, University, 2011).

The references in terms of poor intensity and poor quality were minimal in this cross-border region. They refer that despite being a cross-border region characterised by multiple and intense institutional relations, at the daily work there is not such a close contact between institutions. At the same time, these comments point that many of the cross-border initiatives do not go beyond a contact and exchange phase. The institutional relations do not translate into collective initiatives that contribute to the cross-border region being not so effective these networks. Other relevant issue that jeopardise the quality of institutional relations commented by the Estonian experts were

the tension or conflict relations between local and state institutions. The difference between politicians and their interest's conflicts damage the effectiveness of the cross-border networks and cooperation. However, those negative quotations belong principally to the same expert from Estonia. Thus, though these quotations are critical they cannot be estimated as generalized in the discourse of the experts in this cross-border region.

“It is more like introducing it but I wouldn't say that something concrete follows this. There are study visits and they are very frequent but again, how would you find, there are not aspects of cooperation in this information and knowledge change but then it remains there, so nothing follows I mean, they don't adopt the system, or they don't improve the system” (F16, Estonia, Manager, Public Institution, 2011). “Well this a very long story I would say (he laughs). In general the relation between the local municipality and state level I would say is rather bad” (F18, Estonia, Manager, Private Company, 2011). “There is actually of course in Estonia and in Finland, but especially in Estonia there is this big tension and friction between the local and the national government, because they are from different parties. I think lot of problems at running the cooperation project come from that, because the national level has to approve lot of projects and where the city is involved they just don't want to approve because of the political issue and nothing else, nor the content or the relevance. I think, in some cases this is too politized, and this definitely affects to an effective cooperation” (F16, Estonia, Manager, Public Institution, 2011).

Summarising, we have encountered a cross-border region Alentejo-Algarve-Andalucía with a more bridging network structure (see section 7.1.2). However, regarding the content analysis the cross-border network structure in this area detects problems of coordination that indicates on the one hand a weak or deviated network governance, especially in the axis of local and regional institutions. On the other hand this cross-border cooperation suffers from negative forms of social capital like process of exclusion from networks and policy making of mainly local institutions. On the contrary, the cross-border cooperation between Southern Finland and Estonia presents a more factional network structure, given the numerous institutions participating in projects. By the content analysis, experts demonstrate higher satisfaction with the intensity and quality of the cross-border cooperation, which leads to more effective outputs than in the cross-border region AAA. And those negative references are attributed mostly to the particular opinion of one of the Estonian experts.

By last, we explore the possible influence that the experts' attributes of social capital and their network profile could exert in their opinion regarding the cross-border

institutional relations. We examine the relation that aspects like trust in national or European institutions could have with the experts' opinion in cross-border institutional relations. Identically we checked if those experts with more local and national identity feelings and network types could have a more negative or positive opinion on the cross-border network. None of these presumable relations were detected. Nevertheless with a bigger sample of experts this explorative objective could be interesting to analyse.

7.3. The role of the Eurorregión Alentejo-Algarve-Andalucía and the Euregio Helsinki-Tallinn.

In this section we tackle the role of the Euroregions in each cross-border region, as relevant institutions in the European regional policy for cross-border cooperation. According to the objective 10 we analyze the role that the Euroregions play in each cross-border region, by their position in the network structures of the subprogramme Southern Finland-Estonia and Alentejo-Algarve-Andalucía, and by the experts' opinion about the role of the Euroregions and their performance in their cross-border regions.

In the expertise debate we presented an institutional approach that describes the Euroregions as democratic structures of bottom-up governance in the European cohesion policy. They are structures for the promotion of cooperation between different authorities at different levels in cross-border regions. The perspective from the human geography and social sciences, based on the case-studies of different Euroregions' performance, emphasize the multiple difficulties of these structures to become in ideal types of European integration. (Knippenberg, 2004; Leibenath, 2007; Pikner, 2008; Lepik, 2009; Medeiros, 2011; Terlouw, 2012). Inserted in the social network framework, the Euroregions are a form of institutional network that based on the legislation has evolved into crystallized autonomous institutions. They are a step forward more in the evolution of networked public institutions, but also in the evolution as a new form of governance by networks.

In this study the questionnaire applied to the experts included a question about the knowledge and opinion concerning the Euroregions in each cross-border region. We used Atlas-ti software for the content analysis of the discourse related to the Eurorregión AAA or Euregio Helsinki-Tallinn. We proceeded to codify the experts'

answers with the code “Euroregion” that comprehends the general opinion of the experts concerning the Euroregions. The results discussed in this section are taken also from the indicators of degree and betweenness of the network analysis for the Eurorregión Alentejo-Algarve-Andalucía (33R, 32R, and 1R), and the Euregio Helsinki-Tallinn (31P). The content analysis of the answers and the examination of the Euroregions position in the network structure will lead us to a complete vision of the role that they play in each cross-border region.

In the Table 80 is reflected the position that both Euroregions have in their respective cross-border regions. The Euregio Helsinki-Tallinn appears in the cross-border network of the subprogramme Southern Finland-Estonia as an autonomous institution. This Euregio represents a strong relation between the City of Helsinki, City of Tallinn, the Uusimaa Regional Council, the Union of Harju Counties Municipalities and the Estonian Republic represented by Harju County Government, who are the founding member of the Euregio since 1999. Independently of their membership in the Euregio these institutions participate in the subprogramme through other projects, especially the City of Helsinki and the City of Tallinn that are key local actors in the cross-border network structure and cross-border region in general. The Euregio Helsinki-Tallinn has a high Nrm degree of 7.26 over the mean Nrm degree of 4.37 (see Table 79), although the Euregio Helsinki-Tallinn is not among the most central actors. As leader of the project H TTRANSPLAN Helsinki-Tallinn transport and planning scenarios, we can assume the significant role of the Euregio as coordinator of a big subgroup of different types of institutions like universities and local administrations. However, we can see in Figures 13 and 15, that this subgroup forms one of the isolated satellites, what reflects also the lack of NBetweenness of the Euregio in the whole cross-border network. Besides the role that play other actors, like the dominance of universities and local administrations, the Euregio Helsinki-Tallinn appears as an actor with redundant relations within-group, though with lack of access to the rest of the cross-border network.

The Eurorregión AAA does not appear as an institution in the cross-border network. Thus, we include the three regional institutions members and responsible of the Eurorregión in the analysis: the CCDR (Regional Commission for Coordination and Development) of Alentejo (32R) and Algarve (5R), and the Government of Andalucía

(1R). These three institutions have participated in the two calls for projects of the POCTEP targeted to the strengthening of the working communities Andalucía-Algarve, and Andalucía-Alentejo, and the creation of the recently formed Euroregión AAA or Euro AAA in 2010. They form a strong triad of cross-border cooperation developed in two projects that reflects the intensity of their redundant relations and bonding social capital: first, the project “GIT AAA Office of cross-border initiatives”; and second “GIT AAA Office of cross-border initiative AAA”. The data shows that the Nrm degree of the Government of Andalucía is the highest, as it participates in more projects besides these two projects with the CCDDR of Alentejo and Algarve respectively. At the same time, the Andalusian administration is the only regional actor of the Euroregión with a high NBetweenness. In the Figures 14 and 16 we can see that the triad formed by these regional institutions is placed in the biggest subgroup well interconnected to other subgroups thanks to the Government of Andalucía (1R). The indicators reflect that the Euroregión is a relevant actor in the whole network, though not the main actor, as the Association for the development of Low Guadiana, Odiana (11O).

Table 80: Euroregions’ measures of centrality

Measures of Centrality	Euroregión			Euregio Helsinki-Tallinn
	Alentejo	Algarve	Andalucía	
Mean Nrm Degree	6.69			4.37
Degree Centrality	2.27	10.22	12.50	7.26
Mean nBetweenness	0.14			0.23
NBetweenness	0	0	1.35	0

Source: Author’s compilation.

Besides the information extracted from the indicators of social network analysis, the experts were asked about their opinion on the Euroregions of their respective cross-border regions. We tackle the different arguments that the experts asserted and emphasized regarding this institutions as more or less relevant actors of cross-border cooperation. At the same time, considering the network analysis in public or policy networks (Provan & Lemaire, 2012) we analyse the experts’ arguments related to the Euroregions as a form of governance in the cross-border cooperation.

The origin of the Euregio Helsinki Tallinn has a parallel root. Just after Estonia regained its second independence in 1992, Estonia and Finland initiated a process of political and

economic rapprochement. Finnish tend to lead the relations and Estonians learnt from them, like the best mirror where to look oneself. At the same time, the integration of Finland in the European Union broadened the opportunities for cooperation with the Non-European countries. In this context of “everything to be done” the Euregio was an institutional answer to the informal relations initiated by the counties with higher level of development and high population density in both countries (see Chapter 3), Uusimaa Regional County (Finland) and Harju County (Estonia). The informal network between these institutions promoted initially by the Uusimaa Regional County encountered in the EU funds for cross-border cooperation the input to institutionalize this network.

“A deputy head of that time in Uusimaa regional county who visited Brussels with the idea recommended that why don’t you try an organized form for Finnish-Estonian cooperation. There is lot of EU finance available for that. So this was the initiative, so simply, of course the reality was something else. There wasn’t so much EU money available but the Uusimaa Regional County started” (F4, Finland, Manager, Public Institution, 2010). “At a high level of decision making someone said that it was the possibility to have extra funding if they organize as a Euroregion, and Estonian had become independent again and it was questioned that connections should be built up at that time” (F5, Finland, Manager, Public Institution, 2010).

The Euregio Helsinki-Tallinn reflected the increasing institutionalization of what was considered first informal relations between the institutions at both side of the border, and later what was considered as a network organization between these regional counties. However, the initial network at the county level was soon considered as insufficient and the city councils of the capitals joined. This network reflected better the eagerness of both countries and could build up the cooperation to benefit mutually. This institutionalization ended formally in 2001 when this institutional network constituted as an NGO in order to accomplish formally their goals and desirable formal cross-border cooperation.

“What I know is that they had their contacts anyway before and they wanted to make it more useful” (F2, Estonia, Manager, Public Institution, 2010). “We started discussions with Harju County and after all we recognized that the counties were not enough and we need to have also Tallinn and Helsinki cities involved...because they are magnetic” (F5, Finland, Manager, Public Institution, 2010). “After some years it came quite clear that in order to be able to initiate and work in cross-border project more effectively then the network should be developed as an ONG’s body. So it was established as a NGOs registered in Estonia” (F4, Finland, Manager, Public Institution, 2010).

This initial network took as reference the Euroregions created in other proximal cross-

border regions, like the cross-border cooperation between Malmo and Copenhagen. At this respect the relations between certain people demonstrates how the official cross-border cooperation is grounded in informal relations between people, like in this case.

“They looked in other experiences... and also in Malmö during one period the mayor of the city was Estonian, so during that period there were more contacts with Malmö”(F2, Estonia, Manager, Public Institution, 2010).

Like the theoretical definition that we presented in the Chapter 2, the Euregio Helsinki-Tallinn is defined as the networking institution for promoting cooperation between the metropolitan areas of both countries and it aims to serve as a platform for political discussion, the facilitator of the cross-border and inter-regional cooperation (<http://www.euregio-heltal.org>). These characteristics confer to the Euregio Helsinki-Tallinn the properties of a perfect broker with the concentration of the resources of its network members and effective governance. As a form of governance the Euregio Helsinki-Tallinn pretends to be an institution capable to build up a common understanding of development in both metropolitan regions. This is visible in the vision of the Euregio “to enhance cross-border integration between Helsinki-Uusimaa region and Harju County” (<http://www.euregio-heltal.org>) but better understood in the experts discourse when they foresee in the Euregio the ideal of common development of well coordinated and networked institutions.

“Is like Estonia and Finland are trying to make our vision, you cannot do impossible but they are trying...this common understanding” (F1, Estonia, Manager, Public Institution, 2010).

At the same time, as a form of governance the Euregio is a platform that equilibrates the position between different public institutions of different levels like government, regional counties and city councils in this case. In the Euregio all its members have the same weight for decision making, this equilibrium of power it is important when regional counties have an ambiguous role as political administrations especially in Estonia (see Chapter 3). In this line, Lepik (2009) remarks also the lack of coordination between institutions within the same country, or within the same region as a factor that rest effectiveness to the possibilities of cross-border cooperation with the neighbour in the Baltic region.

“They have also other types of questions, and that’s why we are happy that we can talk

about different topics on the same level. Because this Euregio puts us together in another way inside Estonia, and to talk in another way, is very positive” (F1, Estonia, Manager, Public Institution, 2010).

The Euregio Helsinki-Tallinn dilutes them a problem of coordination and power between administrations at different levels. However it shows the different leadership between both countries. As we commented in the Chapter 3, and as we have pointed above at the light of the Table 77, in each cross-border region the institutions of one of the two neighbours tend to lead the cross-border cooperation. In this case, though there are not differences between the institutions members, the Euregio Helsinki-Tallinn reflects the Estonian dependency towards their Finnish counterparts and the leading role of Finnish ones. The lack of resources and lack of experience are the main reasons argued to explain this small-big brother relation.

“I don’t think that there are much differences between representatives of partners, we have here different opinions, sometimes it isn’t so nice to say everything... but Finnish side... Estonian side is more depending in what the other side has said before” F1, Estonia, Manager, Public Institution, 2010). “The resources of Harju county municipalities were not at the same level as ours, and it brings automatically an unbalance as institutions” (F5, Finland, Manager, Public Institution, 2010).

The Euregio Helsinki-Tallinn forms a close group of the five public institutions members that reflects the intensity of the contact between its members, acquiring the network form of bonding social capital. On the contrary to the Euroregión AAA, this limits the Euregio Helsinki-Tallinn capacities to become in a coordinator institution of cross-border cooperation in this cross-border region. However, the participation and cooperation with other institutions is carried out through projects initiated by the Euregio to which other institutions are invited and promoted to participate. Is in this line of project participation where the Euregio acts as a coordinator of cross-border cooperation initiatives that come out from its founding members. By the project participation the Euregio extends its institutional relations with other actors, creating a network form of bridging social capital and becoming in the facilitator and broker of cross-border relations. For instance, in the subgroup formed by the Euregio reflected in the Figures 13 and 15, where universities, foundations, and other public institutions cooperate; or in HUTA project (preventing drug abuse and infectious diseases in Helsinki and Tallinn) that belongs to the Interreg IIIA, Southern Finland-Estonia.

“And with the Euregio they know me, and they said that they had this kind of idea to

have a common project connected with HIV, because it was so important for both of us. We discussed it and we found people who were interested in that. Then they organized the meeting and then all the partners met here once in Tallinn in our center with all the partners who agree to be” (F3, Estonia, Professor, University, 2010). “I mean now we are forming the partnership between similar organizations between Helsinki and Tallinn and we really need actually an introduction with rounds and meetings to know each other because to my surprise they also didn’t know, the people at all” (F16, Estonia, Manager, Public Institution, 2011).

Nevertheless, the knowledge of the Euregio Helsinki-Tallinn among the experts working in cross-border cooperation is not the desirable for an institution that takes the structural form and purpose of European Euroregions. In the Table 81 we show a synthesis of the experts’ knowledge and relevance that both Euroregions have in their cross-border areas. The results advance the content analysis of the experts’ opinion. While the Eurorregión Alentejo-Algarve-Andalucía is considered as very important by all the experts, the Euregio Helsinki-Tallinn with longer experience in cross-border cooperation has a more diffuse prominence in the cross-border region. It is particularly interesting that the Finnish experts the Euregio Helsinki-Tallinn was in general less important than for Estonian experts. Among the experts that know it, the 36% considered it as one actor more or non important actor in a cross-border region characterised by the intense economic relations, the commuting, migration and exchange of population, and the myriad of cross-border projects and initiative taking place.

“I think is a very small actor. The big things which happen here is that ten of thousand of labour force, citizens, projects, and student move between countries, and the Euregio can’t really... but they might of course do some ties” (F7, Finland, Manager, Public Institution, 2010). “In somehow maybe it seems that if I would not be involved in this program, I would never have heard about it probably. It is not visible” (F20, Finland, Manager, Public Institution, 2011).

It is particularly interesting that almost half of the Finnish experts interviewed (45.5%) working in cross-border projects and other types of cross-border relations do not know very much about the Euregio, or have hardly heard about it, for instance, the 25% of Estonian experts have also little knowledge of the Euregio Helsinki-Tallinn.

“Not much, I have heard the word sometimes but I don’t know much” (F9, Finland, Manager, Public Institution, 2010). “No, no. I have not heard about it” (F23, Finland, Professor, University, 2011). “Yes... I have heard about it and I have a book of the

Euregio” (F14, Estonia, Manager, Public Institution, 2011).

On the contrary, half of Estonian experts consider the Euregio as very important institution in the cross-border cooperation taking place in their cross-border region, and an inferior 16.7% did not consider it as a very important actor. Comparing Estonian and Finnish percentages, only the 9.1% of the Finnish experts consider it very important. It seems that the Euregio is currently more important at the Estonian side. At this respect, an expert asserted the progressively lose of interest of the Euregio Helsinki-Tallinn for Finnish politicians.

“I think that the role as a mediator is not big anymore and I think is quite may diminishing but again is depending very much on personalities and politics, although in the media appears Estonia and what Estonians are doing, but if we think at the larger foreign policy of Finland, these are actually aiming to Asia, Tokio, Shangai, elsewhere and not to Nordic countries or Baltic and I think not to Estonia. I think they have been trying to diminish the role of Euregio as well to keep the resources as much as possible because that is just not the priority right now” (F16, Estonia, Manager, Public Institution, 2011).

Table 81: Experts’ knowledge and opinion of Euregions in their cross-border region

Opinion about the Euroregion/Euregio	Spain		Portugal		Estonia		Finland	
	Nº	%	Nº	%	Nº	%	Nº	%
Very important	100	100	100	100	6	50	1	9.1
Important	0	0	0	0	1	8.3	1	9.1
Non Important	0	0	0	0	2	16.7	4	36.4
HardlyKnow	0	0	0	0	3	25	5	45.5

Source: Author’s compilation.

For those experts who know the Euregio, this institution represents a good idea and structure of cross-border cooperation. However, they put forward several reasonings that jeopardise the enhancement of the Euregio Helsinki-Tallinn to accomplish what the concept of Euroregions signify. These arguments represent in all cases limitations related to the lack of political interest, believed as the necessary input for the Euregio to become a more relevant actor in the cross-border region Southern Finland-Estonia. One of them refers to the form or legal status of the Euregio as a non governmental organization. This form seems to have influence in the perception and in the political interest that both Finnish and Estonian institutions members have of their common structure. The form of NGO seems also a reason that explains the major relevance that the Euregio Helsinki-Tallinn has for Estonians than for Finnish institutions members.

“I feel that the NGO wasn’t very wise. In Finland it has been felt like an Estonia NGO. But behind the Euregio the partners from the two counties and the Finnish partner make NGO activities possible and it makes this balance. But it has been felt like Estonia NGO and not felt as a founded mutual NGO which would bring added value to both sides. I think from this started the imbalance. If we would continue to be as a network there wouldn’t be this influence. It was like more valuable for Estonians” (F5, Finland, Manager, Public Institution, 2010). “In general I would say the Euregio is very good concept, but I am not very sure if it is efficient in this form as an NGO. I am not talking only about Helsinki-Tallinn but in general” (F17, Estonia, Manager, Public Institution, 2011).

Others experts’ claim is that the Euregio should have an added value to the institutions members and an applicability of the initiatives and cross-border project that carries out. Different experts commented that the projects of the Euregio Helsinki-Tallinn should have a more practical use and social applicability. The work known implemented by the Euregio results to be more abstract if compared to the work done by other institutions working in cross-border cooperation. The Euregio is also perceived as an intermediate organization stagnated in the project phases of exchange, knowledge and inter-connection among institutions, that does not later advance into more practical and implementation phases. The Euregio appears to them as an abstract institution not capable to carry out projects with direct application at the everyday life of citizens and companies.

“Yes it has its purpose but a... there are more talks than actions” (F6, Finland, Manager, Development Agency, 2010). “It seems that some of the ideas are likely of high appeal, so maybe, but in somehow you don’t really see it in everyday life” (F20, Finland, Manager, Public Institution, 2011). “This institution is working for developing strategies in general, general recommendations. But we, Universities we have more practical projects” (F22, Finland, Professor, University, 2011).

The main reason that the experts argue for the weak role of the Euregio Helsinki-Tallinn in the cross-border cooperation of this intensely related cross-border region is the lack of resources delivered to the Euregio for accomplishing its purposes. Although the Euregio is considered as a potential institutional actor in the cross-border region and represents a good idea of cross-border cooperation, the resources available are rather limited for the ambitious purposes that tend to remain in a planning phase. The lack of resources obeys also to the lack of political interest at this structure as a potential institutional actor capable to achieve more practical and applicable projects.

“It is very important but they need of course more people, more money” (F10, Estonia, Manager, Public Institution, 2010). “I think if we talked about the general picture is quite very small actor in fact because of the lack of all kind of resources, financial resources and personal resources, and everything” (F16, Estonia, Manager, Public Institution, 2011). “How with very little inputs you want to achieve huge outputs?... but we should invest in this bilateral cross-border cooperation” (F7, Finland, Manager, Public Institution, 2010). “I don’t know so much about it, but maybe they need more support at the national level also. It depends very much on who is actually leading them. So if something happens there, and people are inactive it is not efficient at all. But it could be very good. I think they should be more supportive, maybe a bit more formalized... but this only my opinion. (F17, Estonia, Manager, Public Institution, 2011).

In order to replace better the Euregio Helsinki-Tallinn in the map of cross-border cooperation as a more relevant institution representing the common interest of its public administrations members the experts emphasize the need to rethink about the Euregio objectives, to reinvent it, and to restructure its form of governance. Since its constitution have appeared evaluating arguments about the need to re-define the Euregio.

“Yes I think it has become more everyday, very normal and there isn’t any strategy cooperation with Estonians any more. Maybe we should find new ways, developing this Euregio, because it has also continued for 15 years” (F21, Finland, Manager, Public Institution, 2011)

On the one hand the Euregio could be a more integrative structure towards local municipalities of the metropolitan area of the cross-border region. The Euregio might be an encapsulated institution within a subgroup of strong and redundant relations between its institutions members that could adopt a more open structure towards other institutions and could be more visible, increasing the diffusion of its activities and its relations with other actors. The recommendations in this sense talk about increasing the bridging social capital that the Euregio could have.

“Because it should be an agent I mean municipalities I don’t know how even in Estonia what are the added values for municipalities” (F5, Finland, Manager, Public Institution, 2010). “I think we should know more and we could have more information, maybe more public participation. You see in this conference in somehow it was closed and very small. Not many people, it should have been more public”.

On the other hand, the new lines of its re-definition are targeted to the objectives of the Euregio. In a cross-border region with an intense level of cooperation at different levels and in different fields, to make of the Euregio a more relevant actor might start for the

specialization of the institution in a specific area of cross-border cooperation related to the socio-economic development of the cross-border region. But also, the Euregio might be targeted to the construction of structures and desirable conditions promoting cross-border relations instead of doing proposals of projects that later do not ensure a continuation.

“We have thought about the organizations filling aims dealing innovation, research and development projects. So we have tried ourselves to address in this direction. Because there are other organizations dealing with forest more or good exchange but there is actually no organization in Estonia dealing with really innovative topics and we want to bring some totally new ideas, new trends or at least new ways of thinking to Estonia and in Finland to the public sector. We felt that they don’t get it anywhere else so and if we talk about cooperation we should have some added value” (F16, Estonia, Manager, Public Institution, 2011). “It might be useful to rethink what it should do, for whom, with which resources, and things like that. The main steps may could be not from surprising individual projects but to move more to structures and procedures and things like that instead of having separated projects” (F7, Finland, Manager, Public Institution, 2010).

Contrary to the Euregio Helsinki-Tallinn in the cross-border region Alentejo-Algarve-Andalucía there is complete knowledge of the Eurorregión AAA and all the experts consider it as a very important institution for the cross-border cooperation in this border region, despite the recent constitution in 2010. Although we can distinguish clearly two discourses in the experts’ answers. On the one hand, the perspective and evaluation of local actors, whose working area is the closest to the border line. For these experts the border is not only a recent opportunity for development but also a natural, structural and historic dimension inherent to the socio-economic reality of the border territories. On the other hand, it exists a regional discourse that supports the creation of the Eurorregión AAA and for which the border becomes in a cross-shaft of the political making in every field, like education, health system, culture, economy, etc.

Starting with the experts from regional institutions (the Government of Andalucía, and CCDR of Alentejo and Algarve), the constitution of the Eurorregión AAA has implied an increasing process of institutionalization and consolidation of a previous network of formal institutional relations at the regional level. The Eurorregión has been the final stage of a continuous process of cooperation that took different phases from the initial working communities between Andalucía-Algarve and Andalucía-Alentejo and tripartite meetings between the three regions involved.

“Despite the bilateral protocols of both working communities, we coincide with naturalness and from there it started the idea” (E21, Portugal, Manager, Public Institution, 2011).

The Eurorregión AAA is considered also as the goal of a desirable stage of institutional cross-border cooperation, that brings out an extent range of opportunities for the socio-economic development of the three regions. The Eurorregión arises as a coordinator and facilitator agent for all the cross-border initiatives aimed in the three regions, and among the public and private institutional actors. It is described as a global institution capable to coordinate all the institutional actors that are carrying out cross-border projects or other initiatives.

“No, we don’t want to do everything, is not that. We want to dynamize and to facilitate the cooperation” (E21, Portugal, Manager, Public Institution, 2011). “It does not pretend to do other thing that a working frame for all those previous institutional relations in the cross-border region. We will make an effort of coordination from the regional level” (E8, Spain, Manager, Public Institution, 2011).

In the experts discourse appears also the idea that as coordinator the Eurorregión will become in a maximizer of those sectorial, isolated initiatives or not coordinated actions in cross-border cooperation. Therefore, its objective is to include all the possible actors that in somehow are involved in any field of activity that the Eurorregión can hold. Then, the Euroregion emerges as the institutional actor best connected and placed in the structure of institutional networks. It aims to be the cross-regional intermediary or broker in the cross-border region, capable to connect different institutions from both sides of the border, whether facilitating existing networks or promoting new ones.

“Our work will consist compulsory in the coordination of actors, in the coherence of the initiatives, in the impact evaluation and in this sense, I believe that there is not other way than through an instrument like the Eurorregión” (E8, Spain, Manager, Public Institution, 2011). “The idea is to coordinate all the actions that already exist in the territory” (E7, Spain, Manager, Public Institution, 2011).

Other aspect commented by the experts is that the Eurorregión can equilibrate the weight the each region as in the whole cross-border region. Specially concerning the region of Alentejo, which only one part of its territory (Baixo Alentejo) belongs to the cross-border region and Eurorregión AAA. This explains that the Alentejo regional

institution has not had up to now the same interest at cooperating, and consequently the same weight in decision making in the cross-border region AAA. On the contrary, the interest at cross-border cooperation has been targeted to its close Spanish neighbour with who share more border territory, the Extremadura region (at the north of Andalucía region). Thus, the Eurorregión encourages the political interest of Alentejo region and equilibrates the presence of the three regions.

“The Algarve is a clear partner. However, with the Alentejo the relation is more complicated, because this institution do not has the same connection with the cross-border territory. It is less linked to this territory” (E9, Spain, Manager, Private Company, 2011).

However, the role as coordinator and maximizer of the institutional relations is not only between Spanish and Portuguese partners. It is expected that it plays a role of coordinator also within each region, and solves ongoing problems of institutional lack of coordination, analyzed also in the section 7.2. This role of an institution that equilibrates and improves internal coordination appears also in the discourse of the experts in the cross-border region Southern Finland-Estonia concerning the Euregio Helsinki-Tallinn. Although in this cross-border region AAA, some experts assert that the cross-border relations between Portuguese and Spanish institutions are better than the internal relations between Spanish institutions. The Eurorregión can signify the learnt lection of the past mistakes and an opportunity to address the cross-border cooperation in this area, avoiding parallel actions committed in the past. Therefore, the Eurorregión could be the agent that minimizes the effects of the lack of coordination not only across the border but also within national territories (González & Gualda, 2010).

“Something that I didn’t like is that for instance this entity that represented others ... Our Portuguese proposals had greater impact than those of our Spanish neighbours, and it was noticeable the tense relation between these Spanish institutions compared with the relations that we had with them”(E19, Portugal, Manager, Public Institution, 2011).

For some experts exist also a double facet attributed to the Eurorregión at invigorating the cross-border cooperation. On the one hand, the Eurorregión implies an internal development inwards in the closest territories to the border and at the local level. In this type of discourse the Eurorregión arises as the institution that can strengthen the resources of local actors, and intensify their institutional relations. The Eurorregión AAA would promote a form of bonding social capital in order to impact in a micro-

development centred in the territories closest to the border. On the other hand, the Eurorregión brings out a broader development for the set of the three regions complete territory. This implies a more global and international vision for the Eurorregión AAA that presents outwards European Union a more politically and economically competitive territory for development. In this macro-perspective the Eurorregión can expand the institutional relations among actors not so close to the border. It creates a form of bridging social capital between more distant and different institutions and enterprises beyond the NUTS III in the programme areas. It might bring together the political and economic interest of actors from the adjacent NUTS, especially of Andalucía and Alentejo (See Map 3). So the territories that did not form part of the territory identified as cross-border can get an opportunity to access to new relations and resources through the Eurorregión AAA.

Is in this double mission of the Eurorregión as dynamizer inwards and outwards where the discourse between the local and regional experts starts to collide. The Eurorregión and its expanding vision is valued positively by the local actors close to the border, though is considered at the same time as an alienating process of the border and of their role in the cross-border cooperation. That is, the border stops belonging as an exclusive resource of those who live in the border and it becomes in the crossing path for new possible institutional actors distant to the border and its border reality. The coordination function at the macro level can put close the regional centres of political decision, like Seville and Lisboa, but it moves away the strictly cross-border territories and institutional actors of the NUTS III programme area. However, the majority of the experts have very positive expectatives concerning the role of the Eurorregión AAA. They expect this recent institution to become in the most important actor for the support of cross-border initiatives and for the arrangement of a bridging institutional network between public and private institutions.

“I trust in the Eurorregión, I trust pretty much, but at the moment it is all about expectative. So we the local actors are those who must get projects in future with an impact in our territories, to the people living here” (E14, Spain, Politician, Public Institution, 2011).

The local experts are conscious that up to now the Eurorregión AAA is in its initial phase of development. Its creation signifies an inflection point for the future cross-

border cooperation targeted to achieve a desirable cohesion of the cross-border territories that despite this time, maintain distant in many fields like education, health or business. Nevertheless, in face of the incipient steps taken in the decision making of the Euroregión AAA, many experts seem cautious at the time of making a final evaluation of the Euroregión AAA, and the future of the cross-border cooperation. The experts from local institutions and close to the border have a more critical discourse, compared to those experts' discourse at the regional level which is more optimistic and neutral. The critical vision is based not only in the outwards process of territorial and political expansion commented before, but also in the certain political performance as form of governance from the regional institutions since the Euroregión conformation.

The majority of experts interviewed evaluated negatively the way by which the Euroregión AAA has been constituted from its beginning. This argument appears at the Spanish and Portuguese experts and those from local and supra-municipal level. This discourse seems rather fixed in the collective opinion of local institutional actors. They argue that they just know about the Euroregión once it was already constituted. The flow of information from the regional institutions founding members of the Euroregión towards the local institutions started once the Euroregion was created. The knowledge that the local actors have about the Euroregión AAA is the result of their effort that they make to maintain the flow of information and communication with the regional institutions. This argument contradicts first the formal reality described institutionally about the Euroregión as a bottom-up structure that includes local actors of the cross-border territories (see Chapter 2) and arguments of the experts from regional institutions. Second it supports the discourse discussed in the section 7.2 of institutional exclusion of regional institutions' bonding social capital towards local institutions.

"We always try to maintain them informed of all the initiatives and they equally do the same" (E7, Spain, Manager, Public Institution, 2011).

Nevertheless, the experts from local institutions, with years of experience in the development of cross-border projects across the successive Interreg Programmes argue that being themselves the main protagonists or the key actors of the cross-border area, they have not received information. The Euroregión AAA in its initial phase has arranged a process of research about the strengths and weaknesses of the border

territories and the river Guadiana, as the main axis for the development of the cross-border region. Equally it has arranged a process of institutional contact between public and private actors from different field of activity. But many of the local institutions of the cross-border territories did not have news about a new Eurorregión and/or they have been acquainted through other means than the regional institutions.

Those experts remark that the role of the local actors has been like witnesses or passive actors, given the steps committed by the regional institutions in this initial phase of the Eurorregión. During this initial performance of the Euroregion the individual efforts of those local institutions more interested has permitted them to establish and maintain a stable institutional relation with the Eurorregión. The experts from local institutions emphasise the need to increase the political participation of the local institutions, besides their assistance to forums, conferences or meeting days organized at the regional level. This form of participation is considered as residual involvement or a form of audience once the political decisions relevant for the local institutions are taken.

Those actors in a position of analysts and observers (universities, and consulting firms) warn that for arising as the key coordinator and leader in this cross-border region the Eurorregión AAA must include the local institutions in the processes of decision making and political performance and to promote the flow of institutional information top-down.

Up to now, the construction of the Eurorregión AAA has not fulfilled this inclusion in its form of governance. This recognition of the local participation appears not only in the discourse of the experts but also in scholar contributions. Institutions like the Association of European Border Regions (AEBR, 2006) insist on the political bottom-up process in the governance of Euroregions, just like previous studies done in this cross-border region (Gualda et al. 2008). Equally, the fluid flows of information as well as the frequent interaction are conditions for the mobilization of social capital in the cross-border cooperation (Grix & Houzvicka, 2002). Therefore, the Eurorregión AAA might represent a possible political centralization of the cross-border cooperation policy for those local institutions of the closest territories to the border. The experts from these institutions show attitudes of political mistrust between local and regional levels, due to

this initial exclusion of the local actors in the design and construction of the Eurorregión.

“Nobody has contacted with us to give us some opportunity to express our opinion, to participate. You can read the Eurorregión’s regulations and it exists this possibility! We even have informed that when the different areas of the Euroregion are formed, to count with us, because we are the border” (E2, Spain, Manager, Public Institution, 2011). “I do not have much information, I just know that it has been created, but I do not know what they are doing in the Eurorregión” (E4, Portugal, Manager, Public Institution-NGO, 2011).

The negative discourse towards the role of the Eurorregión and the under-representation of the cross-border local actors is even stressed by the expansion of the Eurorregión to the whole territory of the three regions, especially in the case of Andalucía that incorporates the biggest part of territory very distant to the border, which is adjacent and out of the subprogramme AAA (See Map 3). According to the experts from the closest territories emerges a vindication of the border as an element of identity and the principal motive to back up the objectives of the Eurorregión. The discourse shows a conflict concerning even the physical location of the Euroregion headquarters. These experts claim that the Eurorregión should be located in the closest territory to the border, as well as they claim that the border and its closest territories should be the main avenue through which to articulate the Eurorregión. These opinions show the progressive self-identification of the local institutions not only as the traditional territorial periphery but also as the political periphery (González & Gualda, 2010).

“Whatever is done in the field of cross-border cooperation should be in Huelva” (E6, Spain, Manager, Public Institution, 2011). “The centre of cross-border cooperation should be in the cross-border area with Portugal” (E1, Spain, Manager, Public Institution, 2011). “The river is the main street, so we shouldn’t be any more in the periphery. If the river and the border is the main street for the Euroregion, then we stop being the periphery” (E15, Spain, Politician, Public Institution, 2011).

By last, and concluding we can remark that we have showed the Euregio Helsinki-Tallinn as a small actor not only in the network structure reflected in the Figures 13 and 15, but also through the qualitative analysis of the experts’ opinions, where we observe that the Euregio Helsinki-Tallinn has not a clear role among all the experts. Nonetheless, the experts did not show a clear negative evaluation of the Euregio Helsinki-Tallinn as a form of governance, though emphasized the need to open and

restructure its network form. On the contrary, the experts of the cross-border region AAA have clearly defined the role that the recent Euroregión AAA should have, though those representing local institutions reveal a clear local-regional conflict. The lack of communication or absence of desirable institutional relations poses doubts about this Euroregion as a governance structure bottom-up or as a networking institution.

According to experts discourse and Kenis and Provan types of governance (2009) the Euroregión AAA tends to adopt the form of a “lead organization” with a vertical relation between regional-local institutions that could flaw by its excessive centralism, at least in the beginning of its evolution. The Euregio Helsinki-Tallinn adjust its form of governance in a pseudo form between the “share governance” as all the administrations have a priori the same share for decision making, and the “network administrative form”, where the Euregio Helsinki-Tallinn acts as facilitator of new networks, though its limited resources hamper significantly this role.

Both Euroregions act equilibrating internal institutional relations and cross-border institutional relations, though in their governance performance still they lack of processes or procedure to define them as bridging social capital maximizers. It is interesting to know that the evaluation made by the experts in both cross-border regions tend to reflect aspects of institutional relations and flows of information. This is emphasized by other studies in the same and different cross-border regions. Studies like in the Euroregion Mass-Rhine (Knippenberg, 2004), Euroregion Pro Viadrina (Grix & Knowles, 2002) and in the Baltic region (Lepik, 2009) emphasize aspects like the exclusion from the process of policy decision making or the absence of a regular system for institutional communication.

CONCLUSIONES

Desde que la Unión Europea puso en marcha los primeros instrumentos financieros e institucionales para el desarrollo de programas de cooperación transfronteriza, ésta se ha convertido en uno de los temas de mayor interés. Estamos hablando de un proceso inherente a la construcción de la Unión Europea que implica distintas cuestiones relevantes para el futuro de la misma. La cooperación transfronteriza está ligada a la gobernanza multinivel con instituciones locales, regionales y estatales, y con nuevas capacidades transnacionales atribuidas bajo el paraguas de los programas Interreg. La cooperación transfronteriza implica un acercamiento no sólo físico, sino social-económico y cultural de las poblaciones fronterizas, la gestión política conjunta que conlleve a la identificación de problemas y metas comunes para afianzar el proceso de la cohesión Europea. Se trata de un proceso de acercamiento entre vecinos que se está articulando a través del surgimiento de lazos o redes de trabajo, colaboración tanto entre ciudadanos como entre todos los actores políticos y económicos interesados.

Es por ello, que en el discurso institucional, político y económico de distintos actores aparecen cada vez más las nociones de gobernanza en red, lazos sociales, redes institucionales, flujos de información, redes de cooperación, o redes transfronterizas, etc, que llevan imperiosamente a replantearse la aproximación, al menos académica, a la cooperación transfronteriza. La cooperación transfronteriza no es sólo un proceso histórico acumulativo de distintas fases de programación y financiación, que conlleva un posterior ejercicio de evaluación del impacto. La cooperación transfronteriza es también un proceso relacional y procesual entre la gran diversidad de actores cuyo conocimiento puede aportar nuevas claves sobre cómo está desarrollándose la cohesión Europea.

Para abordar esta dimensión de la cooperación transfronteriza es necesario ir más allá del uso metafórico de la cooperación transfronteriza como gobernanza en red, como conjunto de redes institucionales, o como conjunto de redes sociales entre vecinos. Esta investigación parte del marco del capital social y análisis de redes sociales como paradigma conceptual y metodológico aplicable al estudio de la cooperación transfronteriza, tanto formal e institucionalizada como la cooperación transfronteriza entre actores sociales, económicos y ciudadanía.

Para ello, esta tesis doctoral ha partido previamente de la introducción al estudio del capital social y el análisis de redes sociales. En su capítulo uno se ha discutido cómo el concepto de capital social,, a pesar de surgir y mantenerse en un terreno maleable por sus innumerables aplicaciones a distintos ámbitos de interés científico y por sus todavía abiertas fronteras conceptuales y empíricas, es uno de los conceptos que más ha atraído el interés científico social en las dos últimas décadas. El capital social ha sido estudiado como concepto conformado por distintos elementos como son la confianza y las relaciones o redes, y como concepto multifacético o con distintas dimensiones. A pesar de estar frente a un concepto que ha suscitado un gran debate social por sus múltiples acepciones y delimitaciones empíricas, no hay razón para no poder llevar a cabo una investigación usando el marco del capital social en el ámbito de la cooperación transfronteriza, sino más bien esta tarea ha significado un reto en esta investigación que pretende aportar nuevas contribuciones al estudio de la cooperación transfronteriza, de la cohesión Europea, y a cómo se construye el capital social en las regiones transfronterizas o lo que podría denominarse como capital social fronterizo, es decir, aquellas relaciones y redes de intercambio de recursos entre personas, actores sociales y/o instituciones que comparten frontera.

Dentro de esta complejidad conceptual y empírica, en este estudio el capital social ha sido aprendido en su dimensión tanto cultural o cognitiva como relacional o estructural. Esto es, capital social entendido como un conjunto de valores o normas como la confianza interpersonal, institucional, reciprocidad e incluso como identidad o actitudes que instan a la cooperación; o capital social entendido como aquel conjunto de redes que facilitan la cooperación o la acción colectiva. Igualmente se ha abordado el estudio del capital social como aquel conformado por relaciones fuertes o relaciones débiles. Es decir, como capital social de cohesión o “bonding” que se refiere a aquel que surge de relaciones sociales entre actores o grupos relativamente homogéneos, que comparten rasgos sociales como hábitos, ideología, clase social, actitudes, y que mantienen lazos fuertes de unión en su frecuencia e intensidad. Este tipo de capital social es el que surge en grupos sociales como la familia, o grupos homogéneos como un grupo de amigos, clubes sociales, etc. Y como capital social de vinculación o “bridging”, que surge entre personas o grupos más heterogéneos y distantes, cuyas relaciones son de menor interacción social y con menores expectativas de confianza y reciprocidad, pero que

implican también oportunidades de acceso a recursos y beneficios. Este tipo de capital social surge entre aquellas relaciones que en algún momento ponen en contacto a los actores sociales con recursos que de otra forma o a través de las relaciones fuertes como la familia no podrían adquirirse.

Como parte del estudio del capital social en el capítulo dos se ha introducido el análisis de redes que ha permitido operativizar el estudio de la cooperación transfronteriza a través del análisis de las relaciones tanto personales como institucionales de los actores involucrados en la cooperación transfronteriza. Por otro lado, se ha demostrado la idoneidad del estudio de la cooperación transfronteriza desde los parámetros conceptuales y analíticos del capital social y redes sociales. El análisis de redes sociales ha permitido el estudio del grado de interacción existente entre las personas de regiones fronterizas, el tipo de relaciones sociales tanto personales como institucionales que se dan entre las regiones fronterizas, así como analizar el tipo de estructura de red existente en la cooperación institucional en cada región transfronteriza.

En el capítulo tres, los resultados del análisis de fuentes secundarias con respecto a las dos regiones transfronterizas objeto de estudio nos aportan claves para entender después el nivel de relacionamiento analizado entre los expertos y la estructura de red existente entre las instituciones que participan en cooperación transfronteriza, así como del rol de ciertos actores institucionales. Analizando ambas regiones transfronterizas en cuanto a sus características demográficas, socio-económicas e institucionales la región Alentejo-Algarve-Andalucía, se caracteriza por ser una región transfronteriza con gran disparidad entre la realidad de las zonas urbanas y zonas rurales de las tres regiones fronterizas, especialmente Andalucía. No obstante, la zona más fronteriza de las tres regiones y que comprende las áreas prioritarias del programa POCTEP, presenta una despoblación y envejecimiento demográfico en las áreas internas frente al crecimiento de la población de las zonas más urbanas y costeras. Esta misma zona se caracteriza por sus altas tasas de desempleo y una economía basada en el sector turístico y agrícola principalmente, alejada de la actividad empresarial e industrial de las ciudades. Estas características inciden inevitablemente en menores oportunidades para la interconexión de las regiones fronterizas entendida tanto en términos de infraestructuras, transporte, intercambios entre grupos de población como estudiantes, profesorado y resto de población, y entre actores tanto económicos como políticos.

La región transfronteriza del Sur de Finlandia-Estonia, presenta un panorama económico y social completamente distinto. En concreto el sur de Finlandia junto con el norte de Estonia forma una zona con un crecimiento poblacional frente al descenso y también envejecimiento de la población de otras áreas. Se trata de una región transfronteriza en la que se concentra no sólo la mayor parte de la población de ambos países sino la actividad económica, siendo por tanto un región metropolitana en todo su conjunto con mayor densidad poblacional, empresarial e institucional. La actividad económica se ha orientado hacia el desarrollo de las nuevas tecnologías, telecomunicaciones, y el sector industrial y financiero, entre otros del sector terciario. Aun así esta región transfronteriza presenta una marcada asimetría entre los estándares de vida de Finlandia con respecto a Estonia, que a su vez ha incidido en una mayor intensidad de la interacción y comunicación entre las poblaciones de ambos países, sobre todo de Estonia hacia su vecino.

No obstante, ambas regiones transfronterizas presentan similitudes con respecto a aspectos claves para la interacción social e institucional como son el origen étnico-cultural y lingüística común que se cristaliza en la idea de la unión y/o civilización del Iberismo y Báltico-Finesa o Fino-húngara. Dada la similitud lingüística y cultural entre españoles y portugueses y entre finlandeses y estonios, la población residente de un país en el vecino forman comunidades bien integradas, en comparación con residentes de países terceros. Aunque el acercamiento, interés o percepción de unos hacia otros sigue una pauta asimétrica en ambas regiones transfronterizas. Esta asimetría, más perceptible entre portugueses y españoles, llega a tener su reflejo en los resultados del análisis de redes de los expertos.

Esta investigación se ha diseñado desde una perspectiva cualitativa y cuantitativa que ha aplicado una metodología multi-método. Por un lado, se diseñó una entrevista cualitativa con preguntas semi-estructuradas dirigida a los expertos en cooperación transfronteriza. Se incorporó a la entrevista un módulo para el análisis cuantitativo y visual de redes personales aplicado a los expertos en cooperación transfronteriza. Con este módulo también se recogieron distintas variables demográficas de las redes personales de los expertos, así como variables de las mismas relaciones personales. Se realizaron un total de 45 entrevistas a expertos de los cuatro países miembros de ambas

regiones transfronterizas y un total de 36 cuestionarios de análisis de redes. A partir de las entrevistas realizadas se llevó a cabo análisis de contenido cualitativo cuyos resultados complementan al análisis de redes sociales.

Por otro lado, se realizó un análisis de redes a partir de los datos de las instituciones que participan en los proyectos de los subprogramas de cooperación transfronteriza Alentejo-Algarve-Andalucía y Sur de Finlandia-Estonia de los respectivos programas Interreg 2007-2013, esto es, POCTEP (Programa Operativo de Cooperación Transfronteriza entre España y Portugal) y Programa Interreg IV del Báltico Central. Estos datos permitieron estudiar la estructura de la red de cooperación en cada región transfronteriza y analizar de forma cuantitativa el rol de cada actor institucional, información que se complementó con el análisis de contenido de las entrevistas a expertos. Una vez los resultados del trabajo de campo fueron recolectados, el análisis de los mismos para dilucidar el estudio de las relaciones sociales fronterizas y de la cooperación institucional fronteriza en cada región se han presentado en los capítulos seis y siete.

En el capítulo seis se han analizado las características de los expertos entrevistados, así como las características de sus relaciones personales y la estructura de red de estas relaciones. En el análisis de algunos parámetros sociales del perfil de estos expertos, como la experiencia de haber vivido o vivir en el país vecino y el grado de conocimiento de la lengua del país vecino, se han observado una gran diferencia con respecto a cada región transfronteriza. Entre los expertos del Sur de Finlandia-Estonia existe una mayor frecuencia de haber vivido en el país vecino. En el caso de los expertos estonios esta experiencia transfronteriza tiene una base más íntima por estar más ligada a razones personales y familiares que a razones más profesionales como en el caso de los finlandeses. Mientras que esta experiencia no se da prácticamente entre los expertos portugueses y españoles. En cuanto al conocimiento de la lengua vecina destaca la asimetría entre vecinos fronterizos. Portugueses y estonios tienen un nivel más alto de competencia lingüística del español y finés respectivamente. Aún así esta asimetría es mucho más marcada entre españoles y portugueses que entre finlandeses y estonios.

El análisis de aspectos cognitivos del capital social, como la confianza institucional y la identidad también arrojan resultados marcadamente diferenciados. La confianza de los expertos tanto españoles como portugueses en sus instituciones nacionales es con diferencia menor que la confianza de los expertos estonios y finlandeses. En cuanto a la confianza en las instituciones europeas, estas diferencias se atenúan. Portugueses y españoles confían un poco más en las instituciones europeas mientras que para finlandeses y estonios esta confianza disminuye.

Para analizar los sentimientos de pertenencia o identidad de los expertos a partir del análisis de contenido se creó una tipología de ocho identidades (local, provincial/comarcal, regional, nacional, supraregional, binacional, europea/global y fronteriza) entre las que el total de expertos fue categorizado. De esta forma, se demuestra que los expertos españoles son más localistas y se sienten más arraigados a su entorno más cercano. En el caso de los expertos portugueses presentan más una identidad regional, aunque aparece también otras identidades que se ensanchan más allá de la proximidad de territorio socio-espacial. Los expertos estonios y finlandeses destacan por manifestar sentimientos de identidad más abiertos como la identidad binacional y supraregional (refiriéndose a la identidad nórdica o escandinava), aunque los estonios son aquellos que se sienten más nacionales. Finalmente, la identidad y la competencia lingüística presentan relación con la experiencia de haber vivido en el país vecino.

Todos estos rasgos sobre el perfil de los expertos denotan que existe una mayor proximidad social, o acercamiento entre los expertos estonios y finlandeses que entre los expertos españoles y portugueses. Lo cual constituyen una base para la interacción social y por ende de las relaciones sociales transfronterizas, y en este caso una información complementaria para el análisis de las redes personales de los expertos.

En términos generales, se dan más ocurrencia de relaciones fronterizas entre los expertos estonios y finlandeses que entre los españoles y portugueses. Las relaciones fronterizas de los expertos tanto portugueses como españoles están fundamentalmente basadas en razones laborales, con independencia de que algunas de ellas posteriormente se conviertan en lazos de amistad. Mientras que en el caso de finlandeses y estonios no solamente existen relaciones por motivos profesionales sino también por motivos

personales de amistad o familia. En términos del tiempo y frecuencia de estas relaciones fronterizas también se demuestra que en la región Alentejo-Algarve-Andalucía el comportamiento relacional fronterizo o la intensidad de interacción con los contactos fronterizos es menor comparado al de los finlandeses y estonios. Éstos últimos cuentan con relaciones fronterizas más normalizadas entre sus redes de relaciones. Por tanto, mientras que el acercamiento hispano-luso es más instrumental y débil, el acercamiento fino-estonio tiende a ser tanto instrumental como afectivo y más intenso. Estos resultados demuestran dos patrones diferentes de relaciones y de capital social transfronterizo que en el caso de la región Sur de Finlandia-Estonia es más completo. Ambos tipos de relacionamiento fronterizo desvelan claves de un capital social de vinculación en la región de Alentejo-Algarve-Andalucía y de un capital social tanto de vinculación como de cohesión en la región Sur de Finlandia-Estonia. Por último, la relación analizada entre los tipos de identidad y tipos de redes personales de los expertos, también categorizadas en ocho tipos, muestra la interesante relación entre aquellos tipos de estructuras de redes más abiertas con los tipos de identidades más abiertas.

En el capítulo siete, se llevó a cabo, con el apoyo del análisis de redes sociales, el análisis de la estructura de la red de cooperación transfronteriza institucional que surge de los subprogramas Alentejo-Algarve-Andalucía (del programa operativo de cooperación transfronteriza España-Portugal, POCTEP 2007-2013) y Sur de Finlandia-Estonia (del Programa Interreg IV del Báltico Central 2007-2013). Los resultados se apoyan también con el análisis de contenido de la opinión de los expertos sobre la cooperación transfronteriza institucional y sus actores institucionales.

El análisis de redes reveló que ambas redes de cooperación transfronteriza institucional (considerando que estas estructuras se basan en la cooperación surgida a través de proyectos aprobados en el marco de los subprogramas arriba mencionados) se caracterizan por la presencia de grupos pequeños de cooperación (diadas y triadas) entre actores institucionales, cuyas relaciones son densas, pero que están aislados del resto de grupos de cooperación y de la estructura de red completa. Se trata pues de dos estructuras de cooperación completas que son dispersas, con escasa densidad de relaciones y un significativo número de grupos aislados. Aún así, la red de cooperación en Alentejo-Algarve-Andalucía presenta una mayor cohesión. Esto se debe a una menor

densidad institucional y la coparticipación de ciertas instituciones en distintos proyectos de cooperación. Mientras que la red del Sur de Finlandia-Estonia refleja mayor dispersión, dada la mayor densidad institucional en la región.

En ambas redes completas de cooperación existen también ciertos grupos de cooperación de mayor tamaño por el mayor número de instituciones que participan en un proyecto y que sí están conectados entre sí a través de ciertas instituciones que actúan de intermediarios claves en la red completa de cooperación transfronteriza. El perfil de estos actores claves son también distintos en cada región. En el Sur de Finlandia-Estonia las universidades son aquellos actores institucionales más centrales y mejores intermediarios, es decir, aquellos con más relaciones y que más conectan a otros actores. Seguidas de estas universidades como la Universidad Estonia de Ciencias Aplicadas o la Universidad de Turku de Ciencias Aplicadas, se encuentran los gobiernos locales de las ciudades más importantes de ambos países, Tallinn y Helsinki. En la región Alentejo-Algarve-Andalucía, estos actores más centrales y con mayor poder de intermediación son fundamentalmente instituciones locales o supralocales portuguesas y españolas, como son la Asociación para el desarrollo del Bajo Guadiana, Odiana en Portugal, las Cámaras Municipales de Vila Real do Santo Antonio o Castro Marím, o la Diputación de Huelva, seguida del gobierno regional andaluz, la Junta de Andalucía.

El contexto socioeconómico de ambas regiones ayuda a entender la estructura de red de cooperación de cada región. En Alentejo-Algarve-Andalucía, con menor desarrollo industrial, y el mayor peso institucional de las zonas urbanas frente a la zona rural, la red de cooperación presenta rasgos de ser una red de vinculación o “bridging”. La menor densidad institucional, y el peso y la mayor capacidad de unas instituciones frente a otras conllevan un mayor número de instituciones que participan en distintos proyectos dentro del mismo subprograma, y que por tanto tienen mayor co-presencia en la red conectando grupos de cooperación aislados. En la región de Sur de Finlandia-Estonia, como zona metropolitana, y de una mayor actividad económica, la red de cooperación tiene rasgos de una red de vinculación y también dispersa o “factional” por mayor número de pequeños grupos de cooperación aislados debido a la participación en el subprograma de un mayor número de instituciones con menor co-participación en proyectos.

Estos análisis aparecen apoyados en ambas regiones transfronterizas por el análisis de contenido sobre la opinión de los expertos. En este análisis se desvelan rasgos de la cooperación transfronteriza y las relaciones institucionales de gran interés. De esta forma en la región Alentejo-Algarve-Andalucía las relaciones institucionales presentan menor calidad e intensidad, debido fundamentalmente a la relación poco fluida entre instituciones locales y regionales o pautas de gobernanza regional que ejercen cierta exclusión sobre las instituciones locales en materia de cooperación transfronteriza y que influye en una gobernanza transfronteriza en red más débil. Comparativamente las relaciones institucionales en el Sur de Finlandia-Estonia tienen mejor opinión de los expertos en cuanto a su calidad e intensidad que genera una mayor satisfacción expresada por los expertos en cuanto a la efectividad y resultados de los proyectos de cooperación transfronteriza.

Por último, el análisis de red y de contenido desvela aspectos interesantes sobre el rol de instituciones claves como la Euroregión Alentejo-Algarve-Andalucía (Euroregión AAA) y la Euregio Helsinki-Tallinn del Sur de Finlandia-Estonia, en cuanto a estructuras de gobernanza transfronteriza y/o como actores en el conjunto de la estructura de red de cooperación transfronteriza. Las Euroregiones se definen como nuevas estructuras de gobernanza multinivel capacitadas para llevar a cabo proyectos de cooperación transfronteriza que promueven la cooperación entre instituciones y que aspiran a convertirse en un actor institucional clave en la región transfronteriza donde operan. Los resultados de esta investigación muestran que ambas Euroregiones reflejan ser actores que promueven relaciones institucionales convirtiéndose en “brokers” o intermediarios claves de instituciones de a cada lado de la frontera, y que maximizan el capital social de cada institución aumentando el acceso a otros actores y recursos. No obstante, ambas Euroregiones analizadas presentan diversos obstáculos. La Euregio Helsinki-Tallinn aparece como un actor que no llega alcanzar el peso institucional que se ha esperado de un modelo institucional de la cooperación transfronteriza en esta región. Y la Euroregión AAA adolece de problemas de coordinación interinstitucional que inciden en su valoración como actor de gobernanza transfronteriza.

Los resultados de esta investigación implican un paso adelante en el estudio del proceso de la integración europea a través de la cooperación transfronteriza. Por un lado, se ha

podido mostrar el alcance de las relaciones transfronterizas que existen entre un grupo de población determinada, comparable entre regiones distintas, que nos aporta el análisis de capital social fronterizo a nivel micro y social, de las relaciones entre aquellos ciudadanos cuyas vidas están más ligadas a la frontera (expertos). Los resultados nos presentan cómo se construye o se está construyendo el capital social transfronterizo en cada región transfronteriza, y en este caso, se podría hablar de un capital social transfronterizo más disperso, menos intenso o cohesivo, e instrumental en la región Alentejo-Algarve-Andalucía, frente a un capital social tanto instrumental como afectivo, más cohesivo e intenso en el Sur de Finlandia-Estonia. Se trata pues de la presentación de dos comunidades transfronterizas distintas que reflejan procesos diferentes de integración europea.

Por otro lado, se han aportado nuevas contribuciones al estudio de la cooperación transfronteriza institucional. Ésta aparece como proceso de integración, como un entramado de actores y sus relaciones, y como nuevas formas de gobernanza que conllevan procesos de coordinación y de decisión política entre todos los niveles institucionales implicados (local, regional y nacional). Estudiar la cooperación transfronteriza institucional a través del marco del capital social y redes sociales permite hacer valoraciones más sistemáticas sobre la gobernanza institucional en cooperación transfronteriza.

Aún así, a lo largo del análisis se ha podido constatar que esta investigación supone un paso seminal que necesita nuevas líneas de análisis. Primero, esta investigación ha partido del análisis de una muestra teórica que aporta información significativa, aunque sin hacer inferencias extrapolables a otros contextos fronterizos. Sería de gran interés poder enriquecer esta investigación con muestras más amplias, especialmente cuantitativas, que pudieran dar mayor representatividad de los resultados.

Segundo, la investigación en otras áreas fronterizas puede aportar más información sobre el desarrollo de las relaciones fronterizas a nivel informal entre la ciudadanía y no solamente entre aquellos grupos de población ligados a la cooperación transfronteriza en el marco de los programas Interreg. Igualmente, la aplicación de esta metodología basada en el capital social y análisis de redes implica un nuevo enfoque sobre el desarrollo de la cooperación transfronteriza institucional que, ampliado a

nuevas regiones fronterizas y marcos de cooperación transfronteriza europea como los programas Interreg, puede ampliar el estudio sobre el impacto, efectividad y desarrollo de la política de cohesión Europea.

Tercero, esta investigación podría continuar a partir de un análisis longitudinal que permitirá observar y analizar la cooperación transfronteriza como un proceso evolutivo de creación de relaciones formales e informales, de consolidación de esas relaciones y de la continua reestructuración de esas relaciones hacia nuevas formas de estructuras de red y por tanto de nuevas formas de capital social transfronterizo.

Por último, los análisis desarrollados y los resultados mostrados pueden ofrecer algunas luces sobre posibles líneas de actuación encaminadas a fomentar la interacción y el acercamiento entre fronteras, si esto es entendido como ingrediente de la cohesión europea desde instancias europeas. La mejora de la gobernanza institucional con mejores mecanismos de coordinación o control del funcionamiento correcto de los ya existentes, es un paso necesario que ha demostrado los resultados de esta investigación y que indudablemente conllevaría un impacto a medio y largo plazo en el desarrollo de la cooperación transfronteriza institucional. Igualmente en esta tesis doctoral hemos apreciado la forma en que se construye tanto un capital social más cohesivo y un capital social más de vinculación que generan distintos tipos de comunidades transfronterizas. A partir de aquí se puede dilucidar líneas de intervención en proyectos educativos, culturales, sanitarios, turísticos, empresariales, etc., que generen nuevos lazos de unión o conserven y transformen los ya existentes

INDEX OF TABLES AND FIGURES

Tables:

Table 1: Chronological review of authors dealing with social capital

Table 2: Social Capital different conceptualizations

Table 3: Two types of social capital

Table 4 Indicators of social capital

Table 5: Survey matrix for social capital measurement. ONS

Table 6: Elements of measurement of social capital

Table 7: Analytical frame for social capital measurement

Table 8: NUTS II, NUTS III and National Statistical territorial units of analysis

Table 9: Territory included in Cross-Border Cooperation Interreg Programmes

Table 10: Spanish and Portuguese opinion on language inclusion in compulsory education.

Table 11: Percentage of people that support the idea of an Iberian Federation

Table 12: Percentage of agreement with ‘I feel at home in ...’

Table 13: Population Density by NUTS II and NUTS III of the border regions.

Table 14: Population by Country NUTS II and NUTS III of the border Regions

Table 15: Real GDP growth by country

Table 16: Gross domestic product (GDP) at current market prices by NUTS II and NUTS III

Table 17: Employment rates of the age group 15-64 by NUTS 2 regions

Table 18: Unemployment rate by NUTS 2 regions %

Table 19: Female Unemployment rate by NUTS 2 regions %

Table 20: People at risk of poverty or social exclusion by NUTS 2 regions

Table 21: Participation of adults aged 25-64 in education and training by NUTS 2 regions

Table 22: R & D intensity, by NUTS 2 regions, 2008

Table 23: World Value Survey national scores on social trust

Table 24: Confidence in Government by Country

Table 25: Confidence: Parliament by Country

Table 26: Confidence: The Political Parties by Countries

Table 27: Confidence: The European Union

Table 28: Satisfaction with the way democracy develops

Table 29: Corruption Perception Indexes per country

Table 30: Citizens Awareness and Perception of EU Regional Policy in 2010

Table 31: Outgoing Andalusian Students by country of Destination

Table 32: Incoming Students in Andalusian institutions by country of origin

Table 33: Outgoing student mobility 2007-2010 from Estonia

Table 34: Incoming student mobility 2007-2010 in Estonia

Table E 35: Students in Estonia by Country of Citizenship and year

Table 36: Estonia Outgoing teacher mobility 2007-2010

Table 37: Estonia Incoming teacher mobility 2007-2010

Table 38: Population by Ethnic Nationality, and Year in Finland and South Finland

Table 39: Population by Ethnic Nationality and Year in NUTS III and in Estonia.

Table 40: Population by Nationality and year in Spain and Andalucía border area

Table 41: Population by Nationality and year in Portugal and Alentejo and Algarve border area

Table 42: Approved projects in INTERREG PROGRAMMES 2000-2006 and 2007-2013

Table 43: Twinning between countries

Table 44: Number Projects executed and in process and participant Institutions

Table 45: Sample distribution in border regions AAA and SFE

Table 46: Relation between the research objectives and the codes used in the content analysis

Table 47: Experts by country, sex and age.

Table 48: Experts by country, educational level and self-economic perception

Table 49: Experts experience in CBC and Interreg A projects by country

Table 50: Distribution of Experts who have lived of live in the neighbour country

Table 51: Experts' knowledge of neighbour's language by country

Table 52: Experts trust in national institutions by country

Table 53: Experts trust in European institutions by country

Table 54: Experts feeling of Identity by country

Table 55: Cross-tab between Neighbour Language Competence * Self Identity Feeling

Table 56: Cross-tab between Cross-border living and Neighbour Language Competence

Table 57: Experts' networks by origin

Table 58: Number of alters reported by origin. and expert

Table 59: Cross-tab between Cross-border Living and Cross-border Networks

Table 60: Cross-tab between Language and Border Networks

Table 61: Experts' networks by type of relation

Table 62: Number of Expert reporting types of cross-border relations in interviews and SNA

Table 63: Cross-tab between Cross-border Living and Cross-border Family

Table 64: Experts' networks by time (years)

Table 65: Experts' networks by frequency of contact

Table 66: Distributions of Experts' types of networks by country

Table 67: Cross-tab between Network Type and Self Identity Feeling

Table 68: Measures of Centrality (Degree) in Experts Personal Networks

Table 69: Measures of Centrality (Betweenness) in Experts Personal Networks

Table 70: Expert subgroups and key actors

Table 71: Typology of resources from border relations

Table 72: Experts' resources from networks. Multiplicity of support

Table 73: Experts types of support from networks

Table 74: Projects executed and in process of Interreg III and Interreg IV

Table 75: Institutions member of projects by country

Table 76: Type of institutions participating in projects

Table 77: Type of institution who is leader of Projects by Country

Table 78: Measures of Centrality in Institutional Networks

Table 79: Experts n° of quotes concerning Institutional Relations by country

Table 80: Euroregions' measures of centrality

Table 81: Experts' knowledge and opinion of Euroregions in their cross-border region

Figures:

Figure 1: Modelling a theory of social capital

Figure 2: Map of Social capital debate

Figure 3: Three component model of social capital measurement

Figure 4: Models of Interorganizational Networks

Figure 5: Local (E14, Spain, Manager, Public institution, 2011)

Figure 6: Local/Regional (E2, Spain, Manager, Public Institution, 2011)

Figure 7: Local/Regional/Border (E10, Portuguese Manager, Public Institution, 2011)

Figure 8: Local/Regional/Binational (E21, Portuguese Manager, Public Institution, 2011)

Figure 9: Cross-border (E19, Portuguese Manager, Public Institution, 2011)

Figure 10: Local/Regional/International (F6, Finland, Manager, Development Agency, 2010)

Figure 11: Cross-border/International (F2, Estonia, Manager, Public Institution, 2010)

Figure 12: Local/Regional/Border/International (F20, Finland, Manager, Public Institution, 2011)

Figure 13: Network of the cross-border cooperation in Southern Finland-Estonia subprogramme 2007-2013 representing Nrm degree

Figure 14: Network of the cross-border cooperation Alentejo-Algarve-Andalucía subprogramme 2007-2013 representing Nrm degree

Figure 15: Network of the cross-border cooperation in the Southern Finland-Estonia subprogramme representing NBetweenness

Figure 16: Network of the cross-border cooperation in Alentejo-Algarve-Andalucía subprogramme representing NBetweenness

Maps:

Map 1: Southern Finland-Estonia cross-border region by Nuts classification

Map 2: Southern Finland-Estonia cross-border region

Map 3: Alentejo-Algarve-Andalucía cross-border region by Nuts classification

REFERENCES:

- Adler, P.S., & Kwon, S-W. (2002). Social Capital: Prospects for a New Concept. *The Academy of Management Review*, 27 (1), 17-40.
- Agranoff, R., & McGuire, M. (2001). Big Questions in Public Network Management Research. *Journal of Public Administration Research and Theory*, 11 (3), 295-326.
- Alapuru, R., & Lonkila, M. (2004). Russians' and Estonians' Networks in a Tallinn Factory. In Alapuru, R., Liikanen, I. & Lonkila, M. (Eds), *Beyond Post Soviet Transitions: Micro Perspectives on Challenge and Survival in Russia and Estonia* (pp. 101-127). Saarijärvi: Gummerus Printing.
- Anderson, J., O'Dowd, L., & Wilson, T.M. (2002). Why study border now? *Regional and Federal Studies*, 12 (4), 1-12.
- APSEP (2013) Associação de Profissionais da Saúde Espanhóis em Portugal. Retrieved January, 5, 2013, from <http://apsep.org/index.php/ique-es-apsep>
- Archimedes Foundation (2012). Students and Teacher Mobility <http://archimedes.ee/en/foundation/>
- Argos, L. (2012 January 30). Repunta la emigración de médicos y enfermeras españoles. *Acta Sanitaria*, 1-2. Retrieved January, 14, 2013, from <http://www.actasanitaria.com/noticias/actualidad/articulo-repunta-la-emigracion-de-medicos-y-enfermeras-espanoles.html>
- Association of European Border Regions, AEBR (1997). The EU Initiative INTERREG and Future Developments. Gronau: AEBR.
- Association of European Border Regions, AEBR (2000). Practical Guide to Cross-border Cooperation. Gronau: AEBR.
- Association of European Border Regions, AEBR (2006). White Paper on European Border Regions, Gronau: AEBR.
- Association of European Border Regions, AEBR (2008). Cooperation between European Border Regions. Review and Perspectives. Germany: Nomos,
- Azcarate, M.V., & Borderías, M.P. (1994). La Población Portuguesa en España. Espacio, Tiempo y Forma, Serie VII. *Geografía*, 7, 21-36.
- Babbie, E. (2001). *The practice of social research*. Belmont: Wadsworth
- Bachtler, J., & Wren, C. (2006). Evaluation of European Union Cohesion Policy: Research Questions and Policy Challenges. *Regional Studies*, 40 (2), 143-153.
- Baker, W.E. (1990). Market Networks and Corporate Behaviour. *American Journal of Sociology*, 96 (3), 589-625.

- Barca, F. (2009). An Agenda for a reformed cohesion Policy. A place-base approach to meeting European Union challenges and expectations (Independent report prepared at the request of Danuta Hübner, Commissioner for Regional Policy). Rome: Ministry of Economics and Finance.
- Barnes, R., & Burkett, T. (2010). Structural Redundancy and Multiplicity in Corporate Networks. *Connections*, 30 (2), 4-20.
- Barómetro de Opinión Hispano-Luso (2009). Centro de Estudios Sociales CASUS, Universidad de Salamanca, Centro de Investigação e estudos de Sociología CIES. Retrieved March, 20, 2012, from <http://www.aelpa.org/actualidad/agosto2009/Barometro%20hispanoluso09.pdf>.
- Barómetro de Opinión Hispano-Luso (2010). Centro de Estudios Sociales CASUS, Universidad de Salamanca, Centro de Investigação e estudos de Sociología CIES. Retrieved March, 20, 2012, from www.poramoralisboa.com/assets/files/ppt/apresent_madrid10.ppt.
- Barómetro de Opinión Hispano-Luso (2011). Centro de Estudios Sociales CASUS, Universidad de Salamanca, Centro de Investigação e estudos de Sociología CIES. Retrieved March, 20, 2012, from http://www.usal.es/webusal/files/Barometro_Hispano_Luso_BOHL_2011_.pdf.
- Barrera, M.Jr; (1980). A Method for the Assessment of Social Support Networks in Community Survey Research. *Connections*, 3 (3), 8-13.
- Bastani, S. (2007) Family comes first: Men's and women's personal networks in Tehran, *Social Networks*, 29 (3), 357-374.
- Beltrán, M. (2000). Cinco Vías de Acceso a la Realidad Social. In García Ferrando, M., Ibáñez, J., & Alvira, F. (Eds.), *El Análisis de la Realidad Social. Métodos y Técnicas de Investigación* (pp. 15-55). Madrid: Alianza Editorial.
- Benner, T., Reinicke, W.H., & Witte, J.M. (2004). Multisectoral Networks in Global Governance: Towards a Pluralistic System of Accountability. *Government and Opposition*, 39 (2), 191-210.
- Berg, E. (2000). Border crossing in manifest perceptions and actual needs. In Van Der Velde, M. & VanHoutum, H. (Eds.), *Border, Regions and People* (pp. 151-165). London: Pion Limited.
- Berg, E. (2002). Local Resistance, National Identity and Global Swings in Post-Soviet Estonia, *Europe-Asia Studies*, 54 (1), 109-122.
- Bergs, R. (2012). Cross-border Cooperation, Regional Disparities and Integration of Markets in the EU, *Journal of Borderlands Studies*, 27, (3), 345-363.
- Biernacki, P., & Waldorf, D. (1981). Snowball Sampling: Problems and Techniques of Chain Referral Sampling. *Sociological Methods & Research November*, 10 (2), 141-163.

- Bjørnskov, C. (2006). The multiple facets of social capital. *European Journal of Political Economy*, 22, 22-40.
- Blau, P.M. (1964). *Exchange and Power in Social Life*. New York: John Wiley & Sons.
- Blaxter, M. (2004). Questions and their Meaning in Social Capital Surveys. In Morgan, A., & Swann, C. (Eds.), *Social Capital for Health: Issues of definition, Measurement and Links to Health* (pp. 7-24). London: Health Development Agency.
- Blomberg, J., & Okk, G. (2008). Opportunities for Cooperation between Finland and Estonia. Finland: Prime Minister Publications.
- BOE, Boletín Oficial del Estado, (2010). Convenio de Cooperacion Transfronteriza para la Constitución de la Comunidad de Trabajo “Eurorregion Alentejo-Algarve-Andalucia” Nº 166, Viernes 9 de julio de 2010 Sec. III, pp. 60545- 60552. Retrieved November, 15, 2012, from <http://www.euroaaa.org/site/index.php?module=ContentExpress&func=display&ceid=26>.
- Bolivar, M. (2011). Las asociaciones en las redes personales. ¿Mecanismo de integración de la población inmigrante? *REDES, Revista Hispana para el Análisis de Redes Sociales*, 20 (1), 161-187.
- Borgatti, S.P., & Foster, P.C. (2003). The Network Paradigm in Organizational Research. *Journal of Management*, 29 (6), 991-1013.
- Börzel, T.A., & Heard-Lauréote, K. (2009). Networks in EU Multi-level Governance: Concepts and Contributions. *Journal of Public Policy*, 29 (2), 135-152.
- Bott, E. (1955). Urban Families. Conjugal Roles and Social Networks. *Human Relations*, 3, 345-384.
- Boudon, R., & Lazarsfeld, P. (1985). *Metodología de las ciencias sociales*. Barcelona: Editorial Laia.
- Bourdieu, P. (1980). Le capital social. Notes provisoires. *Actes de la recherché en sciences sociales*, 31, 2-3.
- Bourdieu, P. (1986). The forms of Social Capital. In Richardson, J.G. (Ed.), *Handbook of theory and Research in for the sociology of Education* (pp. 241-258). New York: Greenwood Press.
- Brass, D. J., Galaskiewicz, J., Greve, H.R., & Tsai, W. (2004). Taking Stock of Networks and Organizations: A Multilevel Perspective. *Academy of Management Journal*, 47 (6), 795-817.
- Breiger, R. L. (2004). The Analysis of Social Networks. In Hardy, M., Bryman, A. (Eds.), *Handbook of Data Analysis* (pp.505-526). London: Sage Publication.

- Brewer, J. & Hunter, A. ((1989). *Multimethod research. A synthesis of styles*. California: Sage.
- Brunet-Jailly, E. (2006) NAFTA and Cross-Border Relation in Niagara, Detroit and Vancouver. *Journal of Borderland Studies*, 21 (2), 1-19.
- Brym, M. (2011). The enduring importance of national identity in cooperative European Union Borderlands: Polish university students' perceptions on cross-border cooperation in the Pomerania euro-region. *National Identities*, 13 (3), 305-323.
- Bryman, A. (1995). *Quantity and Quality in social research*. New York: Routledge.
- Bullen, P., & Onyx, J. (2005). *Measuring Social Capital in Five Communities in NSW. A Practitioner's Guide*. Coogee NSW: Management Alternatives Pty Ltd.
- Burnard, P. (1991). A method of analysing interview transcripts in qualitative research. *Nurse Education Today*, 11, 461-466.
- Burt, R.S. (1992). *Structural holes*. Cambridge: Cambridge University Press.
- Burt, R.S. (1997a). The Contingent value of Social Capital. *Administrative Science Quarterly*, 42, (2): 339-365.
- Burt, R.S. (1997b). A note on Social capital and network Content. *Social networks*, 19 (4), 355-373.
- Burt, R.S. (2000). The Network Structure of Social Capital. In Sutton, R.I. & Staw B.R. (Eds.), *Research in Organizational Behavior* (pp. 345-423). Greenwich, CT: JAI Press.
- Burt, R. S. (2008). Structural Holes versus Network Closure as Social Capital. In Lin, N., Cook, K., & Burt, R.S. (Eds), *Social Capital. Theory and Research* (pp. 31-56). New Brunswick, New Jersey: Aldine Transaction.
- Cabero, V. (2002). *Iberismo y Cooperación. Pasado y Futuro de la Pensinsula Ibérica*. Salamanca: Europa Artes Gráficas.
- Caïs, J. (1997). Metodología del Análisis Comparativo. *Cuadernos Metodológicos*, 21. Madrid: CIS.
- Çarkoğlu, A., & Cenker, C: I. (2011). Learning from name generator/interpreters in mass surveys: Findings from Turkey. *Procedia - Social and Behavioral Sciences*, 10, 160-171.
- Castiglione D., Van Deth J. W., & Wolleb G. (2008). Introduction: Conceptual issues in social capital theory. In Castiglioni, D., Van Deth, J.W., & Wolleb, G. (Eds.), *The handbook of Social Capital* (pp.13-21). Oxford: Oxford University Press.
- Cazallo, A.M. (2011). Políticas de Transporte entre Andalucía y Portugal. El Transporte de Viajeros en Autobús. In Márquez, J.A. (Ed.), *Cooperación Transfronteriza*

Andalucía-Algarve-Alentejo. XI Congreso de Ciencia Regional de Andalucía 2009 (pp. 65 -76). Huelva: Biblioteca Universitaria.

- Cea, M. A. (1996). *Metodología Cuantitativa. Estrategias y técnicas de investigación social*. Madrid: Editorial Síntesis, S.A.
- Central Baltic INTERREG IV A Programme 2007-2013 (2007). Cross-border Cooperation Programme under the European Territorial Cooperation Objective. Final Approved version, 2007. Retrieved February, 2, 2010, from <http://www.centralbaltic.eu/programme/programme-documents>
- Central Baltic INTERREG IV A Programme 2007-2013 (2011) Cross-border Cooperation Programme under the European Territorial Cooperation objective. Final updated DRAFT revised version. Retrieved February, 2, 2010, from <http://www.centralbaltic.eu/programme/programme-documents>
- Church, A., & Reid, P. (1996). Urban Power, International Networks and Competition: The Example of Cross-border Cooperation. *Urban Studies*, 33 (8), 1297-1318.
- Coleman, J. (1988). Social capital in the creation of human capital. *American Journal of Sociology*, 94, 95-120.
- Coleman, J. (1990). *Foundations of Social Theory*. London: Belknap Press of Harvard University Press.
- Comte, A. (1973). *Curso de filosofía positiva*. Buenos Aires: Aguilar.
- Cook, K. S. (1977). Exchange and Power in Networks of Interorganizational Relations. *The Sociological Quarterly*, 18, 62-82.
- Cook, K.S., & Whitmeyer, J.M. (1992). Two Approaches to Social Structure. Exchange Theory and Network Analysis. *Annual Review of Sociology*, 18, 109-27
- Cote, S., & Healy, T. (2001). *The Wellbeing of Nations. The Role of Human and Social capital*. Paris: Organization for Economic Co-operation and Development, OECD.
- Covas, A. (2009). *Integração Europeia Relações Ibéricas e Política de Regionalização. Coesão, Diversidades e Cooperação Territorial na União Europeia*. Lisboa: Edições Colibri.
- Creswell, J.W. (2009). *Research design: Qualitative, quantitative, and mixed methods approaches*. London: Sage Publications, Inc.
- Crowe, J. (2007). In Search of a Happy Medium: How the Structure of Interorganizational networks influence community economic development strategies. *Social Networks*, 29, 4, 469-488.
- Da Silva, C.A., & Palula, M.G. (2012). Replantear la Cooperación Transfronteriza y los Dilemas de la Acción Colectiva. *Cuadernos de Cooperación Territorial Europea*, 2, 14-23.

- Das, R.J. (2006). Putting Social Capital in its place. *Capital and Class*, 30, 65-92.
- Devine, F., & Roberts, J.M. (2003). Alternative approaches to researching social capital: a comment on van Deth's measurement social capital. *Social Research methodology*, 6 (1), 93-100.
- DG. Directorate General Regional Policy (2009). Ex-Post Evaluation of INTERREG 2000-2006 (No. 2008.CE.16.0.AT.016) 1st INTERIM REPORT TO THE EUROPEAN COMMISSION, Panteia and Partners.
- DG. Directorate General Regional Policy (2010a). Ex-Post Evaluation of INTERREG 2000-2006 (No. 2008.CE.16.0.AT.016) 2nd INTERIM REPORT TO THE EUROPEAN COMMISSION, Panteia and Partners.
- DG. Directorate General Regional Policy (2010b). INTERREG III Community Initiative (2000-2006) Ex-Post Evaluation (No. 2008.CE.16.0.AT.016) FINAL REPORT, Panteia and Partners.
- DG. Directorate General Regional Policy (2010c). Ex Post Evaluation of INTERREG 2000-2006. TASK 5: IN-DEPTH ANALYSIS OF A REPRESENTATIVE SAMPLE OF PROGRAMMES Programme: INTERREG III A FINLAND-ESTONIA. EVALUATION REPORT.
- Downs, W. (2002). Regionalism in the European Union: Key Concepts and Project Overview. *European Integration*, 24 (3), 171–177.
- DR, Diário da República (2010). Convenção entre a República Portuguesa e o Reino de Espanha sobre Cooperação Transfronteiriça entre Instâncias e Entidades Territoriais. 2.^a série, N.º 110, 8 de Junho de 2010, Despacho n.º 9643/2010, pp.31401-31406. Retrieved November, 15, 2012, from <http://www.euroaaa.org/site/index.php?module=ContentExpress&func=display&ceid=26>.
- DR, Diário da República (2001). Associação Transfronteiriça de Municípios HORIZONTE 2006. 2.^a série, N.º 288, 14 de Dezembro de 2001, pp. 26790 - 26790.
- Drăgan, I.M., & Isaic-Mamiau, A (2012). Snowball Sampling Developments used in Marketing Research. *International Journal of Arts and Commerce*, 1 (6), 214-223.
- Durkheim, E. (1985). *La división del trabajo social*. Barcelona: Planeta-Agostini.
- Durston, J. (2002). *El capital social campesino en la gestión del desarrollo rural. Diadas, equipos, puentes y escaleras*. Chile: Comisión Económica para América Latina y el Caribe (CEPAL).
- Eesti.ee/Gateway to Estonia (2013). Retrieved April, 15, 2013, from https://www.eesti.ee/eng/topics/citizen/riik/eesti_vabariik_2/eesti_humn.

- Ehlers, N., & Buursink, J. (2000). Binational cities: People, institutions and structures, In: Van Der Velde, M., & Van Houtum, H. (Eds.), *Border, Regions and People* (pp. 182–201). London: Pion Limited.
- Eisenhardt, K. M. (1989). Building Theories from Case Study Research. *Academy of Management Review*, 14 (4), 532-550.
- Eisenhardt, K.M. (1991). Better stories and better constructs: the case for rigor and comparative logic. *Academy of Management Review*, 16 (3), 620-627.
- Elorie, F. (2009). El Papel de las Redes Sociales en la Actividad Económica: El Caso de los Restauradores de Lille. *REDES, Revista Hispana para el análisis de Redes Sociales*, 16 (8), 204-227.
- Embajada de Finlandia en Madrid, (2013). Retrieved April, 16, 2013, from <http://www.finlandia.es/public/default.aspx?nodeid=36864&contentlan=9&culture=es-ES>
- Enokido, K., (2007). Searching for Partners Across Borders: A literature Review on Cross-Border Cooperation. *Journal Tourism Sciences*, 1 March.
- Erickson, B.H. (2008). Good Networks and Good Jobs: The Value of Social Capital to Employers and Employees. In Lin, N, Cook, K., & Burt, R.S. (Eds.), *Social capital. Theory and Research* (pp. 127-158), New Brunswick, New Jersey: Aldine Transactions.
- Esparza, D. (2010). National identity and the Other: imagining the EU from the Czech Lands. *Nationalities Papers*, 38 (3), 413-436.
- Estonia Statistical Year Book (2011). Statistic Estonia. Tallinn.
- Estonian Embassy in Helsinki (2012). Estonia and Finland. Educational and Research Cooperation. Retrieved September, 25, 2012, from http://www.estemb.fi/eng/estonia_and_finland.
- Estonian Embassy in Helsinki (2013). Estonia and Finland. Cooperation. Retrieved February, 10, 2013 from http://www.estemb.fi/eng/estonia_and_finland#cooperation.
- Estonia Ministry of Education and Knowledge (2012). Retrieved February, 15, 2013, from <http://www.hm.ee/>.
- Euregio. (2006). Annual Activity Report. Strategic Documents. Retrieved June, 19, 2012, from <http://www.euregio-heltal.org/about-2/strategic-documents/activity-reports/>.
- Eurobarometer 70 (2008). Public Opinion in the European Union. Autumn. National Report. Executive Summary. Estonia 2008. European Commission. Retrieved August, 9, 2012, from http://ec.europa.eu/public_opinion/index_en.htm.
- Eurobarometer (2010). Citizens' Awareness and Perception of EU Regional Policy. Analitical Report 2010. Flash EB Series #298. The Gallup Organization. European Commission. Retrieved August, 9, 2012, from

http://ec.europa.eu/public_opinion/index_en.htm.

- Eurostat. (2011). Nomenclature of Territorial units for Statistics. Retrieved May, 13, 2010, from http://epp.eurostat.ec.europa.eu/portal/page/portal/nuts_nomenclature/introduction.
- Eurostat Statistics (2012a). Statistics. Population and Social Conditions. Population. Database. Demography. Regional Data. Retrieved October, 20, 2012 from <http://epp.eurostat.ec.europa.eu/portal/page/portal/population/data/database>
http://epp.eurostat.ec.europa.eu/portal/page/portal/region_cities/regional_statistics/data/main_tables.
- Eurostat Statistics (2012b). Statistics. Economy and Finance. National Accounts. Database Retrieved October, 02, 2012, from http://epp.eurostat.ec.europa.eu/portal/page/portal/national_accounts/data/database.
- Eurostat Statistics (2012c). Statistics. General and Regional Statistics. Regions and Cities. Database. Regional Statistic by Nuts Classification. Regional Labour Market Statistics. Retrieved October, 2, 2012, from http://epp.eurostat.ec.europa.eu/portal/page/portal/region_cities/regional_statistics/data/database.
- Eurostat Statistics (2012d). Statistics. General and Regional Statistics. Regions and Cities. Database. Regional Statistic by Nuts Classification. Regional poverty and social exclusion statistics. Retrieved October, 5, 2012, from http://epp.eurostat.ec.europa.eu/portal/page/portal/region_cities/regional_statistics/data/database.
- Eurostat Statistics (2012e). Statistics. General and Regional Statistics. Regions and Cities. Database. Regional Statistic by Nuts Classification. Regional education statistics. Retrieved October, 5, 2012, from http://epp.eurostat.ec.europa.eu/portal/page/portal/region_cities/regional_statistics/data/database.
- Eurostat Statistics (2013). Statistics. Database. Tables by Themes. Research and Development. Statistics on research and development. Retrieved October, 25, 2013 from <http://epp.eurostat.ec.europa.eu/tgm/table.do?tab=table&init=1&language=en&pcode=ts00042&plugin=1>
http://epp.eurostat.ec.europa.eu/portal/page/portal/statistics/search_database.
- Eurostat Regional Book Population (2011). Eurostat
- Eurostat Regional Book Labour Market (2011). Eurostat.
- Eurostat Regional Yearbook Education (2010). Eurostat.
- Farr, J. (2004). Social capital: A Conceptual History. *Political Theory*, 32 (1), 6-33.

- Farrel, C. (2007). Thinking Critically about Social Capital. *Irish Journal of Sociology*, 16 (2), 27-49.
- Fatima-Amante, M. (2013). Recovering the Paradox of the Border: Identity and (Un)familiarity Across the Portuguese–Spanish Border. *European Planning Studies*, 21 (1), 24-41.
- Favell, A. (2006). The Sociology of EU Politics. In Jorgensen, K. E., Pollack M. A., & Rosamon, B. (Eds), *Handbook of European Union Politics* (pp. 122-137). London: Sage Publications.
- FEMP (2011). Federación Española de Municipios y Provincias. (2011). Listado de Corporaciones Locales Españolas Hermanadas con Europa.
- Fernández, P.A (2008). *La Asimetría institucional entre España y Portugal en el marco de la Cooperación Transfronteriza (Andalucía, Algarbe, y Alentejo)*. Barcelona: Atelier Internacional.
- Field, J. (2004). *Social Capital*. London and New York: Routledge.
- Finland Embassy in Estonia (2012). Finland in Estonia. Retrieved January, 11, 2011, from www.finland.ee.
- Flap, H., & Boxman, E. (2008). Getting Started: The Influence of Social Capital on the Start of the Occupational Career. In Lin, N, Cook, K., & Burt, R.S. (Eds.), *Social capital. Theory and Research* (pp.159-181). New Brunswick, New Jersey: Aldine Transactions.
- Foley, M. W., & Edwards, B. (1996). The Paradox of Civil Society. *Journal of Democracy*, 7 (3), 38-52.
- Foley, M. W., & Edwards, B. (1999). Is it Time to Disinvest in Social Capital? *Journal of Public Policy*, 19 (2), 141-173.
- Foley, M. W., & Edwards, B. (2001). Much Ado about Social Capital. *Contemporary Sociology*, 30 (3), 227-230.
- Gualda, E., Gualda, J.M., Barrera, N., Lucio-Villegas, E., Figueira, E. & Ramalho, A. (2008). Redes sociales y participación social en el area transfronteriza. In Gualda, E. (Ed.), *Realidad Social en Andalucía, Algarbe y Alentejo* (163-176). Huelva: Universidad de Huelva.
- Fragoso, A. Gualda, E., Lucio-Villegas, E., Martins, V., Gualda, J.M., & González, T. (2011). Desarrollo y identidades en la cooperación transfronteriza: la complejidad de las relaciones España-Portugal. In Márquez, J.A. (Ed.), *Cooperación Transfrotneriza Andalucía-Algarve-Alentejo. XI Congreso de Ciencia Regional de Andalucía 2009* (pp. 397-409). Huelva: Universidad de Huelva.
- Freeman, L.C. (2000). La Centralidad en las Redes Sociales. Clarificación Conceptual. *Política y Sociedad*, 33, 131-148.

- Freeman, L.C. (2004). *The Development of Social Networks Analysis. A study in the Sociology of Science*. Vancouver, BC. Canada: Empirical Press.
- Fu, Y. (2005). Measuring Personal Networks with Daily Contacts: A Single-item survey Question and the Contact Diary. *Social Networks*, 27 (3), 169-186.
- Fukuyama, F. (1999). *Social capital and Civil Society*. Paper presented at the International Monetary Fund Conference on Second Generation Reforms, October.
- Fukuyama, F. (2001). Social capital, Civil Society and Development. *Third World Quarterly*, 22 (1), 7-20.
- Fürst, D.; Schubert, H.; Rudolph, A., & Spieckermann, H. (2001). Regional Actors Networks between Social Capital and Regional Governance. *Connections*, 24 (1), 42-67.
- Fürst, D., & Kilper, H. (1995). The Innovative Power of Regional Policy Networks: A Comparison of two Approaches to Political Modernization in North Rhine-Westphalia. *European Planning Studies*, 3 (3), 287-304.
- Gabbe, J. (2005). Governance and Cross-border Cooperation. Speech on the occasion of the RFO Annual Conference in Joensuu, North Karelia, Finland.
- Gabbe, J., Von Malchus, V.F., Stumm, T., Pandary, C., Perou, M-L., & Winkler, A. (2006). White Paper on European Border Regions Final Version. Gronau, Germany: Association of European Border Regions (AEBR).
- Gabbe J., & Ramirez MG (2013). *AEBR and EGTC - a long way to success, in Legal setup for cooperation: EGTC and more, Newsletter INTERACT, AEBR*. Retrieved June, 1, 2013, from http://www.interacteu.net/downloads/7685/Newsletter_INTERACT_Winter_2013_legal_setup_for_cooperation_EGTC_and_more.pdf.
- García, A. (2002). Redes Sociales y “clusters” empresariales. *REDES, Revista Hispana para el análisis de las Redes Sociales*, 1 (6), 1-20.
- García, P., Millet, M., & Casanova, M.E. (2009). La Nueva Cooperación Territorial Transfronteriza y sus implicaciones para España. *Revista de Derecho comunitario Europeo*, 3, 121-150.
- Garrido, F., & Moyano, E. (2002). Capital Social y Desarrollo en Zonas Rurales. Un Análisis de los programas Leader II y Proder en Andalucía. *Revista Internacional de Sociología*, 33, 67-96. .
- Glaser, B.G., & Strauss, A. (1967). *The discovery of grounded theory: Strategies for qualitative research*. Chicago, IL: Aldine.
- Goldberg, E. (1996). Thinking about how Democracy Works. *Politics Society*, 24 (1), 7-18.

- Goodman, L.A. (1961) Snowball sampling. *Annals of Mathematical Statistics*, 32 (1), 148–170. doi:10.1214/aoms/1177705148.
- González, T. (2010). Values through Hofstede's Framework. The Case of Zara-Inditex. Huelva: Universidad de Huelva.
- González, T., & Gualda, E. (2010). *Citizens' local perceptions of Cross-border Cooperation in the southern Portugal-Spain area. A contribution to the bottom-up political process*. Paper presented at the ESA Mid-term conference, Citizenship and Democracy: Memberships, forms of participation, within and across European territories. Research Network 32 Political Sociology, November, Lille, France.
- González, T., Gualda, J.M., Martins, V., Fragoso, A., Lucio-Villegas, E., & Gualda, E. (2011). *Biografía, identidad fronteriza-europea y sentidos de pertenencia territorial en Ayamonte y Vila Real de Santo António*. In Márquez, J.A. (Ed.), *Cooperación Transfronteriza Andalucía-Algarve-Alentejo. XI Congreso de Ciencia Regional de Andalucía 2009* (pp. 422-438). Huelva: Universidad de Huelva.
- González, T. (2012). *Symptoms of an Affected Cross-Border Cooperation: A Comparative Case Study from Discourse Perspective of Border Regions Andalusia-Algarve-Alentejo and South Finland-Estonia*. Paper presented at Borders and Borderlands. Today's Challenges and Tomorrow Prospects, September, Lisbon, Portugal.
- González, T. & Gualda, E. (2012). *Eurorregión Alentejo-Algarve-Andalucía: Viabilidad y Expectativas de Futuro desde la Perspectiva del Discurso*. In Agudo, M.J., & Vázquez, E. (Eds.), *I Congreso Europeo de Cooperación Territorial Europea y de Vecindad. Libro de Actas*, (pp. 301-318). Sevilla: Consejería de la Presidencia e Igualdad. Junta de Andalucía.
- González, T., & Gualda, E. (2013). *Cross-border Networks in Informal and Formal Cooperation in the border regions of Andalusia-Algarve-Alentejo and South Finland-Estonia. European Planning Studies*. DOI:10.1080/09654313.2013.789487.
- González, X., Guimerá, A., & Perkmann M. (2010). Las Regiones Transfronterizas: Balance de la Regionalización de la Cooperación Transfronteriza en Europa (1958-2007). *Documents d'anàlisi geogràfica*, 56 (1), 21-40.
- Granovetter, M. (1973). The Strength of Weak Ties. *The American Journal of Sociology*, 78 (6), 1360-1380.
- Grim-Feinberg, K. (2007). Strengthening Social Capital through Bilingual Competence in a Transnational Migrant Community: Mexicans in upstate New York. *International Migration*, 45 (1), 177-208.
- Griñan, J.A. (2010). Speech by Andalusia Government President in the Cooperation Protocol sign for the Alentejo, Algarve, Andalusía Euroregion. Retrieved September, 10, 2010, from

<http://www.juntadeandalucia.es/presidencia/portavoz/resources/files/2010/9/30/1273735017581discurso%20grinan%20eurorregion-05%20may%202010.pdf>.

- Grix, J. (2001). Towards a Theoretical Approach to the Study of Cross-Border Cooperation. *Perspectives: Central European Review of International Affairs*, 17, 5-9.
- Grix, J., & Houžvička, V. (2002). Cross-border Cooperation in Theory and Practice. The Case of Czech-German Borderland. *Actas Universitatis Carolinae Geographica*, 37 (1), 61-77.
- Grix, J., & Knowles, V. (2002). The Euroregion and the Maximization of Social Capital: Pro Europa Viadrina. *Regional and Federal Studies*, 12 (4), 154-176.
- Grootaert, C. (2001). Social capital. The Missing Link? In Dekker, P., & Uslaner, E.M. (Eds.), *Social Capital and Participation in Everyday life* (pp.9-29). London: Routledge, ECPR Studies in European Political Sciences.
- Grootaert, C., & Van Bastelaer, T. (2002). Understanding and Measuring Social capital. A Synthesis of Findings and Recommendations from the Social Capital Initiative. Washington, D.C. Forum Series on the Role of Institutions in Promoting Economic Growth. Forum 1. The Institutional Approach to Donor-Facilitated Economic Development. Session on Social Capital. Washington D.C.: Iris Center.
- Grootaert, C., Narayan, D., Nyhan J. V. & Woolcock, M. (2003). Integrated Questionnaire for the Measurement of Social Capital (SC-IQ). Social Capital Thematic Group. The World Bank.
- Grosseti, M. (2009). ¿Qué es una Relacional Social? Un Conjunto de Mediaciones Diádicas. *REDES, Revista Hispana para el Analisis de Redes Sociales*, 6, (2), 44-62.
- Grosseti, M., Barthe, J.F., & Chauvac, N. (2011). Studying Relational Chains from Narrative Material. *Bulletin de Méthodologie Sociologique*, 110, 11-25.
- Guerrero, J. (2011, August 23). El grupo transfronterizo proyecta unir Sanlúcar y Alcoutim con un teleférico. Los técnicos estudian tres posibilidades para cruzar el río. *Huelva Información*, Retrieved August, 25, 2011, from <http://www.huelvainformacion.es/article/provincia/1047931/teleferico/para/unir/sanluca/r/y/alcoutim.html>.
- Gunter, A. (2004, October 20). 'Talsinki' - a 21st Century Metropolis. *The Baltic Times*. Retrieved December, 12, 2011, from <http://www.baltictimes.com/news/articles/11129/>.
- Gualda, E. (2008). *Realidad Social en Andalucía, Algarbe y Alentejo*. Huelva: Universidad de Huelva.
- Gualda, E., Gualda, J.M., Barrera, N., Lucio-Villegas, E., Figueira, E. & Ramalho, A. (2008). Redes sociales y participación social en el area transfronteriza. In Gualda, E. (Ed.), *Realidad Social en Andalucía, Algarbe y Alentejo* (163-176). Huelva: Universidad de Huelva.

- Gualda, E., Lucio-Villegas, E., Martins, V., González-Gómez, T., Gualda, J.M. & Fragoso, A. (2011). Learning contexts of *the others*: Identity building processes in southern Europe. *European Journal for the research on the Education and Learning of Adults*, RELA, 2 (2), 151-163.
- Gualda, E., & González, T. (2010). Gobernance, Crossborder Cooperation and Social Networks in the Southern Portugal – Spain area. Paper presented at the ESA Mid-term conference of ESA, Institutions and Social Change (s) in Southern European Societies. Research Network 27, October, Cascais.
- Gualda, E., Fragoso, A., & Lucio, E. (2013). The border, the people and the river: development of the cross-border area between southern Spain and Portugal. *Community Development Journal*, 48 (1), 23-39.
- Gulati, R. (1995b). Does Familiarity Breeds Trust? The Implications of Repeated Ties infor Contractual Choice in Alliances. *Academy of Management Journal*, 38 (1), 85-112.
- Gulati, R., & Gargiulo, M. (1999). Where Do Interorganizational Networks Come From? *American Journal of Sociology*, 104 (5), 1439-1493.
- Gulati, R., & Sych, M. (2008). Does Familiarity Breeds Trust? Revisiting the Antecedents of Trust. *Managerial and Decision Economics*, 29, 165-190.
- Gummesson, E. (2000). *Qualitative Methods in Management Research*. London: Thousand Oaks. Sage publications.
- Hall, P. (2008). Opportunities for Democracy in Cross-border Regions? Lessons from the Oresund Region. *Regional Studies*, 42 (3), 423-435.
- Halonen, T. (1997). Soome, Eesti ja Euroopa Integratsioon. Aulaloeng, 21 oktoobril, Tartu: Tartu Ülikooli Kirjastuse trikikoda.
- Hampton, L.A., & Duncan, E.M. (2011). Identities and inequalities: an examination of the role of racial identity in the formation of social capital inside a voluntary youth organization. *Social Identities*, 17 (4), 477-500.
- Hanifan, L.J. (1916). The rural school community center. *Annual of the American Academy of Political and Social Science*, 67,130-138.
- Hanneman, R.A., & Riddle, M. (2005) *Introduction to Social Network Methods*,Riverside, CA: University of California, Riverside.
- Harper, R. (2001). *Social capital: A review of the literature*. United Kingdom: Office for National Statistics.
- Harper, R. (2002). *The Measurement of Social Capital in the United Kingdom*. United Kingdom: Office for National Statistics.

- Harpham, T., Grant, E., & Thomas, E. (2002). Measuring Social Capital within Health Surveys: Key Issues. *Health policy and Planning*, 17 (1), 106-111.
- Hawe, P., Webster, C., & Shiell, A. (2004). A Glossary of terms for navigating the field of social networks analysis. *Journal of Epidemiol Community*, 58, 971-975.
- Heckathorn D.D. (1997). Respondent-Driven Sampling: A New Approach to the Study of Hidden Populations. *Social Problems* 44 (2), 174–199.
DOI:10.1525/sp.1997.44.2.03x0221m.
- Heider, F. (1946). Attitudes and Cognitive Organization. *Journal of Psychology*, 21, 107-112.
- Henning, M. (2007). Re-evaluating the Community Question from a German Perspective. *Social Networks*, 29 (3), 375-390.
- Herederos, M. I., & Olmedilla, B. (2010). La Cooperación Territorial Europea como Instrumento para el Desarrollo Equilibrado. Paper presented at the International Conference World Economy Meeting XII, May, Santiago de Compostela, Spain.
- Herreros, F. (2004). *The problem of forming social capital: Why trust?* New York: Palgrave Macmillan.
- Hofstede, G. (1994). *Cultures and organizations. The Software of the Mind Intercultural Cooperation and its Importance for Survival*. London: Harper Collins.
- Hollstein, B. (2011). Qualitative Approaches. In Scott, J., & Carrington P.J. (Eds.), *Sage Handbook of Social Networks Analysis* (pp. 404-416). London/New Delhi: Sage.
- Holt, B. (2012). Identity Matters: The Centrality of "Conferred **Identity**" as Symbolic Power and Social Capital in Higher Education Mobility. *International Journal of Inclusive Education*, 16 (9), 929-940.
- Homans, G.C. (1950). *The Human Group*. New York: Harcourt Brace and Company.
- Hospers, G.J. (2006). Borders, Bridges and Branding: The Transformation of the Öresund Region into an Imagined Space. *European Planning Studies*, 14 (8), 1015-1033.
- Hummon, N., & Carley, K. (1993). Social Networks: As Normal Science. *Social Networks*, 15 (1), 71 - 106.
- Hyvönen, H. (2008). The Strength of Native Ties: Social Networks of Finnish Immigrants in Estonia. *Trames*, 12 (62/57), 4, 421-440.
- Ingegerd, J. (1997). Clique Networks Structure in School Class Data. *Social networks*, 19 (3), 285-301.
- Inkeles, A. (2000). Measuring Social Capital and its Consequences. *Policy Sciences*, 33, 245-268.

- Imperial, M. (2005). Using Collaboration as a Governance Strategy. *Administration & Society*, 37, 281-320.
- Instituto de Comercio Exterior (2013). Países. Estonia. Retrieved March, 15, 2013, from http://www.oficinascomerciales.es/icex/cda/controller/pageOfecomes/0,,5280449_5282899_5283038_0_EE,00.html
- Instituto Nacional de Estadística (2012). Padrón. Población por Municipios. Principales Series de Población desde 1998. Población por comunidades y provincias, nacionalidad, edad (grupos quinquenales) y sexo. Retrieved October, 6, 2012, from <http://www.ine.es/jaxi/menu.do?type=pcaxis&path=/t20/e245/p08/&file=pcaxis>.
- Instituto Nacional de Estatistica (2012). Retrieved October, 10, 2012, from http://www.ine.pt/xportal/xmain?xpid=INE&xpgid=ine_princindic..
- INTERREG III A Southern Finland-Estonia 2000-2006 (2008). Bridging Borders, through Integration, Innovation and an Integrated Environment. Retrieved May, 20, 2011, from http://www.interreg-finest.net/failid/Varsinais_Suomen_Liitto_2008_11_12_u.pdf.
- INTERREG III A Southern Finland-Estonia 2000-2006 (2012). Projects. Retrieved August, 7, 2012, from <http://www.interreg-finest.net/?id=1191>.
- Isett, K.R., & Provan, K.G. (2005). The Evolution of Dyadic Interorganizational Relationships in a Network of Publicly Funded Nonprofit Agencies. *Journal of Public Administration Research and Theory*, 15 (1), 149-165.
- Isett, K.R., Mergel, I.A., LeRoux, K., Mischen, P. A., & Rethemeyerpp, R. K. (2011). Networks in Public Administration Scholarship: Understanding Where We Are and Where We Need to Go. *Journal of Public Administration Research and Theory*, 21 (SUPPL.1), 157-173.
- Jackman, R. W., & Miller, R.A. (1998). Social Capital and Politics. *Annual Reviews*, 1, 47-73.
- Jasinskaja-Lahti, I., Liebkind, K., Jaakkola, M., & Reuter, A. (2006). Perceived Discrimination, Social Support Networks, and Psychological Well-being among Three Immigrant Groups. *Journal of Cross-Cultural Psychology*, 37, 293-311.
- Junta de Andalucía (2010/2011). Junta de Andalucía. Consejería de Educación, Cultura y Deporte. Inicio. Estadísticas. Alumnado Escolarizado en el Sistema Educativo Andaluz. Retrieved September, 29, 2012, from <http://www.juntadeandalucia.es/educacion/webportal/web/estadisticas/alumnado-escolarizado-en-el-sistema-educativo-andaluz/-/libre/detalle/EGb8/estadisticas-de-alumnado-curso-2010-2011-enseanzas-de-regimen-especial>.
- Junta de Andalucía (2012). Retrieved Novemeber, 12, 2012 from <http://www.juntadeandalucia.es/organismos/presidencia/areas/accion-exterior/cooperacion/paginas/git-algarve.html>.

- Jurkynas, M. (2004). Brotherhood Reconsidered: Region-Building in the Baltics. *Journal of Baltic Studies*, 35 (1), 1-31.
- Kazak, A.E., & Marvin, R.S. (1984). Differences, difficulties and adaptation: Stress and social networks in families with a handicapped child. *Family Relations*, 33 (1), 67-77.
- Kenis, P., & Provan, K. G. (2009). Towards an Exogenous Theory of Public Network Performance. *Public Administration*, 87 (3), 440-456.
- Kettunen, P., & Kungla, T. (2005). Europeanization of Sub-national Governance in Unitary States: Estonia and Finland. *Regional and Federal Studies*, 15 (3), 353–378.
- Killworth, P.D., Johnsen, E.C., Bernard, H.R., Shelley, G.A., & McCarth, C. (1990). Estimating the Size of Personal Networks. *Social Networks*, 12 (4), 289-312.
- Kirch, M. (1999). Changing identities and Estonia's accession to the European Union. In Vetik, R. (Ed.), *Estonian Human Development Report 1999* (pp. 26-29). Tallinn.
- Knippenberg, H. (2004). The Maas-Rhine Euroregion: A Laboratory for European Integration? *Geopolitics*, 9 (3), 608-626.
- Knoke, D. (2011). Policy Networks. In Scott, J., & Carrington, P.J. (Eds.), *The Sage Handbook of Social Networks Analysis* (pp. 210-222). London, England: SAGE Publications Ltd.
- Klatt, M., & Herrmann, H. (2011). Half Empty or Half Full? Over 30 Years of Regional Cross-Border Cooperation within the EU: Experiences at the Dutch–German and Danish–German Border. *Journal of Borderland Studies*, 26 (1), 65-87.
- Kleinhans, E.R., Priemus H., & Engbersen G. (2007). Understanding Social Capital in Recently Restructured Urban Neighbourhoods: Two Case Studies in Rotterdam. *Urban Studies*, 44 (5 y 6), 1069– 1090.
- Knack, S., & Keefer, P. (1997). Does Social Capital Have an Economic Payoff? A Cross-Country Investigation. *The Quarterly Journal of Economic*, 112 (4), 1251-1288.
- Knack, E. (2002). Social Capital and the Quality of Government: Evidence from the States. *American Journal of Political Science*, 46 (4), 772-785.
- Kohalike Omavalitsuste Portaali (2011a). Eesti omavalitsuste partnerid. Eesti-Soome. Retrieved October, 19, 2011, from <http://portaal.ell.ee/4130>
- Kohalike Omavalitsuste Portaali (2011b). Eesti omavalitsuste partnerid. Partnersuhete arv Euroopas 2003. Retrieved, October, 19, 2011, from <http://portaal.ell.ee/4130>.
- Kohlbacher, F. (2006). The Use of Qualitative Content Analysis in Case Study Research. *Forum Qualitative Social Research*, 7, 1 (21): 1-31.

- Koopmans, R. (1999). Political. Opportunity Structure. Some Splitting to Balance the Lumping. *Sociological Forum*, 14 (1), 93-206.
- Kratke, S. (1998). Problems of cross-border regional integration: The case of the German–Polish border area. *European Urban and Regional Studies*, 5 (3), 249–262.
- Krempel, L. (2011). Network Visualization. In Scott, J., & Carrington, P.J. (Eds.), *The Sage Handbook of Social Network Analysis*. London: Sage Publications Ltd.
- Krishna, A., & Shrader, E. (2000). Cross-Cultural Measures of Social Capital. A Tool and Results from India and Panama. World Bank Social Capital Initiative. *Working papers*, 21: 130. Retrieved March, 07, 2011, from <http://siteresources.worldbank.org/INTRANETSOCIALDEVELOPMENT/882042-1111750197177/20502292/SCI-WPS-21-paper.pdf>.
- Kröger, A.; Mokka, R; Riala, M.; Åman, P.; Neuvonen, A.; Vassinen, S.; Kaskinen, T., & Kuittinen, O. (2009). *Talsinki/Hellinna. Kasiklindlased on Kasvav Muutust esile Kutsuv Jõud Uhekoos on nad aluseks selles aastatuhande Linnaliidule*. Finland: Demos Helsinki. Retrieved Septemeber, 20, 2012, from <http://www.both.fi/2010/talsinki-book>.
- Lauristin, M., & Vihalemm, P. (1995). Regional Space: framework for transition. In Lauristin, M.; Vihalemm, P.; Rosengren, K.E., & Weibull, L. (Eds.), *Return to the Western World. Perspectives on the Estonian Postcommunist transition* (pp. 129-162). Tartu: Tartu University Press.
- Lauristin, M., & Vihalemm, P. (1998) Social Space as a Factor of European Integration. In Heidmets, M., Loogma, K., Raudma, T., Toomel, K. & Viik, L. (Eds.), *Estonian Human Development Report* (pp. 68-72). Tallinn: Eesti Koostöökogu.
- Lauristin, M., & Vihalemm, P. (2011). Satisfaction with Outcomes of Baltic Transition in Spring 2011. In *Estonian Human Development Report, Baltic Way(s) of Human Development, Twenty years on* (pp.19-21). Tallinn: Eesti Koostöökogu.
- Lehti, M. (2003). Possesing a Baltic Europe: Retold National Narratives in the European North. In Smith, D., & Lehti, M. (Eds.), *Post Cold War Identity Politics. Northerm and Baltic Experiences* (pp. 11-43). London: Frank Cass Publishers.
- Leibenath, M. (2007). Europeanisation of cross-border governance? A case study on the cause, form and consequences of a co-operation project in the German–Polish–Czech border triangle. *Space and Polity*, 11 (2), 151–167.
- Lepik, K.L. (2009). Eurorregions as Mechanism for Strengthening Cross-Border Cooperation in the Baltic Sea Region. *Trames*, 13 (3), 265-284.
- Levi, M. (1996). Social and Unsocial Capital: A Review Essay of Robert Putnam's Making Democracy Work. *Politics and Society* 24 (1), 45-55.
- Lewin, K. (1936). *Principles of Topological Psychology*. New York: McGraw-Hill.

- Lillbacka, R. (2006). Measuring Social Capital: Assessing Construct Stability of Various Operationalizations of Social Capital in a Finnish Sample. *Acta Sociologica*, 49, 201-220.
- Lisakka, L. (2006). *Social Capital in Finland. Statistical Review. Statistics Finland*. Helsinki: Edita Prima Oy. Helsingfors.
- Lin, N., Walter, M. E., & Vaughn, J.C. (1981). Social Resources and Strength of Ties: Structural Factors in Occupational Status Attainment. *American Sociological Review*, 46: 393-405.
- Lin, N., & Dumin, M. (1986). Access to occupations through social ties. *Social Networks*, 8 (4), 365-385.
- Lin, N. (1999). Social networks and status attainment. *Annual Review of Sociology*, 25: 467-487.
- Lin, N. (2001). *Social Capital. A Theory of Social Structure and Action*. Cambridge: Cambridge University Press.
- Lin, N. (2003). *Social Capital. A Theory of Social Structure and Action*. Cambridge University Press.
- Lin, N. (2008). Building a Network Theory of Social Capital. In Lin, N, Cook, K., & Burt, R.S. (Eds.), *Social capital. Theory and Research* (pp. 3 -29), New Brunswick, New Jersey: Aldine Transactions.
- Lin, N., & Erickson, B.H. (2010). Theory, Measurement, and the Research Enterprise on Social Capital. In Lin, N., & Erickson, B.H. (Eds.), *Social capital. An international research program* (pp. 1- 24). Oxford: Oxford University Press.
- Löfgren, O. (2008). Regionauts: the Transformation of Cross-Border Regions in Scandinavia. *European Urban and Regional Studies*, 15 (3), 195-209.
- Lonkila, M. (2010). The Importance of Work-Related Social Ties in Post-Soviet Russia: The Role of Co-workers in Personal Support Networks in St. Petersburg and Helsinki. *Connection*, 30 (1), 46-56.
- López, E. (2000). El Análisis de contenido tradicional. In García, M., Ibañez, J., & Alvira, F. (Eds.), *El análisis de la realidad social. Métodos y Técnicas de investigación* (pp. 556-574). Madrid: Alianza Editorial.
- López, C. (2009). *Técnicas de análisis de datos con SPSS 15*. Madrid: Pearson Prentice Hall.
- López, L. (1997). Portugueses en España. Ámbitos de Trabajo y de Residencia. *Boletín de la A.G.E.*, 25, 41-48.
- Lowndes, V., & Wilson, D. (2001). Social Capital and Local Governance: Exploring the Institutional Design Variable. *Political Studies*, 49 (4), 629-647.

- Lozares, C. (1996). La Teoría de Redes Sociales. *Papers*, 48, 103-126.
- Lozares, C., & Sala, M. (2011). Capital Social, Cohesión social y uso de la lengua. *REDES: Revista Hispana para el Análisis de Redes Sociales*, 20 (1), 204-231.
- Lozares, C., López, P., Verd, J.M., Marti., J., & Molina, J.L. (2011). Cohesión, Vinculacion e Integracion Sociales en el Marco del Capital Social. *REDES, Revista Hispana para el Analisis de Redes Sociales*, 20 (1), 1-28.
- Lozares, C., & Verd, J.M. (2011). De la Homofilia a la Cohesión social y viceversa. *REDES, Revista Hispana para el Análisis de Redes Sociales*, 20 (1), 29-50.
- Lubbers, M.J., Molina, J.L., & McCarthy, C.M. (2007). Personal Networks and Ethnic Identifications. The Case of Migrants in Spain. *International Sociology*, 22, 721-741.
- Lundén, T. (1973). Interacction Across an “Open” International Boundary: Norway-Swed0en. In Lundén, T. (Ed.), *Boundaries and Regions* (pp. 147-160). Trieste: Instituto di Sociología Internazionale.
- Lundén, T. (2004). *On the Boundary. About Human at the End of Territory*. Huddinge: Södertörns högskola.
- Maciejewski, W. (2002). *The Baltic Sea Region: cultures, politics, societies*. Uppsala: Baltic University Press.
- Maloney, W., Smith,G., & Stoker, G. (2000). Social Capital and Urban Governance: Adding a More Contextualized “Top-Down” Perspective. *Political Studies*, 48 (4), 802-820.
- Maripuu, M. (2003). *Helsinki-Tallinn Euregio. The Finnish Estonian cross-border cooperation network*. Tallinn: Grafica Malan.
- Márquez, J.A. (2011). Deconstrucción y Articulación Territorial de la Frontera Luso-Andaluza. *Cuadernos Geográficos*, 47 (2010-2), 297-316.
- Marsden, P.V. (1990). Networks Data and Measurement. *Annual Review of Sociology*, 16, 435-463.
- Marsden P. V. (2008). Interpersonal Ties, Social capital, and Employer Staffing Practices. In Lin, N., Cook, K., & Burt, R.S. (Eds.), *Social capital. Theory and Research* (pp.105-125). New Brunswick, New Jersey: Aldine Transactions.
- Masso, I.A. (2010). Talking about each other or to each other? Paper presented at Helsinki-Tallinn Capital Regions Common Info Space, Helsinki-Tallinn Euregio 7th Forum, September, Tallinn.
- Marx, K. (2010). *El capital: critica de la económica política libro primero: el proceso de producción del capital*. Vol. III. Madrid: Siglo XXI de España Editores, S.A.

- Maya, I. (2004). Sentido de comunidad y potenciación comunitaria. *Apuntes de Psicología*, 22 (2), 187-211.
- Maya, I. (2002). Tipos de Redes Personales de los Inmigrantes y Adaptación Psicológica. *REDES, Revista Hispana para el Análisis de Redes Sociales*, 1 (4).
- Mayo, E. (1933). *The Human Problems of an Industrial Civilization*. New York: Mcmillan.
- Mckether, W.L., Gluesing, J.C., & Riopelle, K. (2009). From Interviews to Social Network Analysis: An approach for Revealing Social Networks Embedded in Narrative Data. *Field Methods*, 21, 154-180.
- McPherson, M., Popielarz, P.A., & Drobnic, S. (1992). Social Networks and Organizational Dynamics. *American Sociological Review*, 57,(2), 153-170.
- Medeiros, E. (2011). (Re)Defining the Euroregion Concept. *European Planning Studies*, 19 (1), 141-158.
- Miettinen, A. (1991). *Estonia, Finland and Europe: Towards New Commitments*. Lappeenranta: Lappeenranta University of Technology.
- Mikkola, J. (2011). Director of International Affairs in Uusimaa Regional Council, Finland. Interview on September, 20, 2011.
- Milgran, S. (1967). The Small World Problem. *Psychology Today*, 1, 61-67.
- Milward, H.B., & Provan, K.G. (2001). Do Networks Really Works? A Framework for Evaluating Public-Sector Organizational Networks. *Public Administration Review*, 61 (4), 414-423.
- Milyo, J., & Leininger, L. (2004). Estimating the Spillover Effects of Social Capital" Paper presented at the annual meeting of the The Midwest Political Science Association, Palmer House Hilton, Chicago, Illinois<Not Available>.2009-05-26 from http://www.allacademic.com/meta/p83126_index.html.
- Mirwaldt, K (2012). The Small Projects Fund and Social Capital Formation in the Polish-German Border Region: An Initial Appraisal. *Regional Studies*, 46 (2), 259-272.
- Mitchel, J.C: (1969). Social Network in Urban Situations: Analysis of Personal Relationships in Central African Towns. Manchester: Published for the Institute for Social Research University of Zambia by Manchester University.
- Mizruchi, M.S., & Galaskiewicz, J. (1993). Network of Interorganizational Relations. *Sociological Methods & Research*, 22 (1), 46-70.
- Mizruchi, M.S., & Marquis, C. (2006). Egocentric, Sociocentric, or Dyadic? Identifying the Appropriate Level of Analysis Study of Organizational Networks. *Social networks*, 28 (3), 187-208.

- Mokken, R.J., & Stokman, F.N. (1978/79). Corporate-Governmental Networks in the Netherlands. *Social Networks*, 1 (3), 333-358.
- Molina, J.L., & Aguilar, C. (2004). Identidades étnicas y redes personales de jóvenes de Sarajevo. *REDES, Revista Hispana para el Anàlisis de Redes Sociales*, 7 (6), 1-15.
- Molina, J.L. (2005). El Estudio de las Redes Personales: Contribuciones, Métodos, y Perspectivas. *EMPIRIA, Revista de Metodología de Ciencias Sociales*, Julio-Diciembre, 10, 71-106.
- Molina, J.L., Ruiz, A.A., & Teves, L. (2005). Localizando geográficamente las redes personales. *REDES- Revista hispana para el análisis de redes sociales*, 8, 1-21.
- Molina, J.L. (2001). *El Análisis de Redes Sociales. Una Introducción*. Barcelona: Edicions Bellaterra.
- Molina, J.L., Bolívar, M., & Cruz, I. (2011). La dispersión geográfica de las redes personales: cálculo y significado. *REDES, Revista Hispana para el Análisis de Redes Sociales*, 20 (5), 113-131.
- Molina, J.L., Lubbers M., & Lozares, C. (2012). The Geographical Distribution of the Personal Networks of People Living in Catalonia: a dual society. *Grafo Working Papers*, 1, 1-19.
- Montero, C.M. (2008). Estudio Comparativo de las Estructuras Administrativas en las regiones del Algarve y Alentejo y Comunidad Autónoma de Andalucía a nivel regional, local y asociativo. En Fernández, P.A. (Ed.), *La asimetría institucional entre España y Portugal en el marco de la cooperación transfronteriza (Andalucía, Algarve y Alentejo)* (pp.153-181), Barcelona, Spain: Atelier Libros.
- Morales, J.M. (2008). La Perspectiva Constitucional de la Cooperación Transfronteriza entre Andalucía, Algarve, y Alentejo. En Fernández Sánchez, P.A. (Dir.), *La Asimetría institucional entre España y Portugal en el marco de la Cooperación Transfronteriza (Andalucía, Algarbe, y Alentejo)* (pp. 133-152), Barcelona, Spain: Atelier Internacional.
- Morata, F (2010). Euroregions and European integration. *Documents d'Analisi Geogràfica*, 56, 41-56.
- Moreno, J.L. (1972). *Fundamentos de la sociometría*. Buenos Aires, Paidós.
- Morgan, D. L., Neal, M. B., & Carder, P. (1996). The Stability of Core and Peripheral networks over time. *Social Networks*, 19 (1), 9-25.
- Morgan, A., & Swann, C. (2004). Where Next for Social Capital Research? In Morgan, A., & Swann, C. *Social Capital for Health: Issues of definition, Measurement and Links to Health*. Health Development Agency (pp.187-192). Retrieved March, 2, 2010, from http://www.nice.org.uk/niceMedia/documents/socialcapital_issues.pdf
- Morris, P., & Montero, C. (1999). *Territorio, competitividad sistémica y desarrollo endógeno Metodología para el estudio de los Sistemas Regionales de Innovación*. Paper

presented at the International Seminar Instituciones y actores del desarrollo territorial en el marco de la globalización, January, Concepción.

- Moynihan, D. (2009). The Network Governance of Crisis Response: Case Studies of Incident Command Systems. *Journal of Public Administration Research and Theory*, 19 (4), 895-915.
- Muhr, T. (1991). ATLAS/ti - A prototype for the support of text interpretation. *Qualitative Sociology*, 14 (4), 349-371.
- Muñoz, J. (2005). Análisis Cualitativo de datos textuales con ATLAS.ti 5. Barcelona: Creative Commons.
- Nadalutti, E. (2011). Old and New Identities in the upper Adriatic: is a Cross-Border Kind of Citizenship Emerging in Cross-Border Regions? *Eurotimes; supplement*, 451-472.
- Nawyn, S.J., Gjokaj, L., Agbényiga, D.L., & Grace, B. (2012). Linguistic Isolation, Social Capital, and Immigrant Belonging. *Journal of Contemporary Ethnography*, 41 (3), 255-282.
- Newton, K. (1999). Social Capital and democracy in modern Europe. In Van Deth, J.W., Maraffi, M., Newton, K., & Whitley, P. (Eds.), *Social Capital in European Democracy* (pp. 3-249). London and New York: Routledge.
- Newton, K. (2006). Political Support: Social Capital, Civil Society and Political and Economic Performance. *Political Studies*, 54 (4), 846-864.
- Nurmi, R., & Üksvää, R. (1994). *Estonia and Finland: Culture and Management, A Conjectural Presentation*. Tartu: Tartu School of Economic and Business Administrations.
- OAPEE Organismo Autónomo Programas Educativos Europeos (2012). <http://www.oapee.es>) Consulted in 12/10/2012.
- OECD Organization for Economic Co-operation and Development. (2001). The Well – being of nations: The role of human and social capital. Education and Skills. Paris: OECD. Retrieved November, 10, 2010, from <http://www.oecd.org/site/worldforum/33703702.pdf>.
- Oliver, C. (1990). Determinants of interorganizational relations: integration and future directions. *Academy of Management Review*, 15 (2), 241-265.
- Oliveira, J.P, (2009). *Historia de la civilización ibérica*. Pamplona: Urgoiti Editores.
- Onyebuchi. E. (2011). The politics of being a human being in Soweto: Identity as a social capital ‘Everything not forbidden is compulsory’ (T.H. White). *Journal of Contemporary African Studies*, 29 (3), 299-313.

- Onyx, J., & Bullen, P. (2000). Measuring Social Capital in Five Communities. *Journal of Applied Behavioural Science*, 36: 23- 42.
- Oorschot, W. V., Arts, W., & Gelissen, J. (2006). Social Capital in Europe. Measurement and Social and Regional Distribution of Multifaceted Phenomenon. *Acta Sociológica*, 49, 149-167.
- O'Toole, L. (1997). Treating Networks Seriously: Practical and Research Based Agendas in Public Administration. *Public Administration Review*, 57 (1), 45-52.
- Parlamento Europeo. (2005). *Proyecto de Informe sobre la Función de las Eurorregiones en el Desarrollo de la Política Regional*. (2004/2257(INI)). Comisión de Desarrollo Regional. Retrieved May, 21, 2011 from <http://www.europarl.europa.eu/sides/getDoc.do?pubRef=-//EP//TEXT+REPORT+A6-2005-0311+0+DOC+XML+V0//ES>
- Paasi, A. (2001). Europe as a Social Process and Discourse: Consideration of Place, Boundaries and Identity. *European Urban and Regional Studies*, 8 (1), 7-28.
- Paulson, S. K. (1985). A Paradigm for the Analysis of Interorganizational Networks. *Social Networks*, 7 (2), 105-126.
- Paxton, P. (1999). Is Social Capital Declining in the United States? A Multifaceted Indicator Assessment. *The American Journal of Sociology*, 105 (1), 88-127.
- Pérez, J.A. & Monago, J. (2011). Aplicación de un Modelo de Indicadores para el Estudio del Capital Social y los Cambios sobre las Percepciones en la Raya de Extremadura. *ALMENARA, Revista Extremeña de Ciencias Sociales*, 3, 10-31.
- Perkmann, M. (2002). Euroregions. Institutional Entrepreneurship in the European Union. In Perkmann, M. & Sum, N.-L. (Eds.), *Globalization, Regionalization and Cross-border Regions* (pp.103-124). Houndsmills, New York: Palgrave.
- Perkmann, M., & Sum, N.-L. (2002). Globalization, Regionalization and Cross-Border Regions. In Perkmann, M., & Sum, N.-L. (Eds.), *Globalization, Regionalization and Cross-border Regions* (pp. 3-24). Houndsmills, New York: Palgrave.
- Perkmann, M. (2003). The rise of the Euroregion. A bird's eye perspective on European cross-border co-operation. On-line papers. Lancaster: Department of Sociology, Lancaster University. Retrieved 13, March, 2010 from <http://www.comp.lancs.ac.uk/sociology/papers/Perkmann-Rise-of-Euroregion.pdf>.
- Pikner, T. (2008). Reorganizing Cross-border Governance Capacity: The Case of the Helsinki Tallinn Euregio. *European Urban and Regional Studies*, 15 (3), 211-227.
- POCTEP 2007-2013 (2011). Programa Operativo de Cooperación Transfronteriza España Portugal 2007-2013. Documento Final para la Aprobación por la Comisión Europea. Dirección General de Fondos Comunitarios, España. Dirección General de Desarrollo Regional, Portugal. Retrieved September, 2, 2010, from

http://poctep.eu/index.php?id_documento=81&modulo=publicacion&pagina=documentos.php&busqueda=&busquedagral=&origen=&tipo=34&padre_anterior=0&categoria_anterior=0&padre=0&categoria=34.

- POCTEP (2012). Programa Cooperación Transfronteriza España-Portugal. Proyectos Aprobados. Retrieved May, 13, 2012 from http://www.poctep.eu/index.php?modulo=proyectos_aprobados
- Podolny, J.M., & Baron, J.N. (1997). Resources and Relationships: Social Networks and Mobility in the Workplace. *American Sociological Review*, 62, 673-693.
- Podolny, J.M., & Page, K. L. (1998). Network Forms of Organization. *Annual Review of Sociology*, 24, 57-76.
- Pool, I.S., & Cochen, M. (1978). Contacts and Influence, *Social Network*, 1 (1), 5-51.
- Popierlarz, P. (1999). Organizational Constraints on Personal Network Formation. *Research in the Sociology of Organization*, 16, 263-281.
- Portes, A., & Landolt, P. (1996). The Downside of Social Capital. *The American prospect*, 26, 18-21.
- Portes, A. (1998). Social capital: its origins and applications in modern sociology. *Annual Review of Sociology*, 24, 1-24.
- Portes, A. (2000). The two meanings of social capital. *Sociological Forum*, 15 (1), 1-12.
- Portes, A. (2010). *Economic Sociology. A Systematic Inquiry*. New Jersey: Princeton University Press.
- Powel, W.W. (1990). Neither Market nor Hierarchy. *Network Forms of Organization. Research in Organizational Behavior*, 12, 295-336.
- Preciado, P., Snijders, T, Burk, W. J., Stattin, H., & Kerr, M. (2012). Does proximity matter? Distance dependence of adolescent friendships. *Social Networks*, 34 (1), 18-31.
- PROALV (2007/2008). Agencia Nacional. Programa Aprendizagem ao Longo da Vida. O Palv em Portugal: Dois anos de Actividade. Retrieved December, 19, 2012, from <http://www.proalv.pt/public/PortalRender.aspx?PageID=442c4e7c-6daa-4b8e-babb-143c5090fc27>.
- Prokkola, E. K. (2008). Resources and barriers in tourism development: cross-border cooperation, regionalization and destination building at the Finnish-Swedish border. *FENNIA International Journal of Geography*, 186 (1), 31-46.
- Prokkola, E-K, Zimmerbauer, K., & Jakola, F. (2012). Performance of regional identity in the implementation of European cross-border initiatives. *European Urban and Regional Studies*. DOI: 10.1177/0969776412465629. Retrieved February, 20, 2013, from <http://eur.sagepub.com/content/early/2012/11/22/0969776412465629>.

- Provan, K.G., Harvey, J., & De Zapien, J.G. (2005). Network Structure and Attitudes toward Collaboration in a Community Partnership for Diabetes control on the US-Mexican Border. *Journal of Health, Organization and Management*, 19 (6), 504-518.
- Provan, K.G., Fish, A., & Sydow, G. (2007). Interorganizational Networks at the Network Level: A Review of the Empirical Literature on Whole Networks. *Journal of Management*, 33 (3), 479-516.
- Provan, K.G., & Lemaire, R.H. (2012). Core Concepts and Key Ideas for Understanding Public Sector Organizational Networks: Using Research to Inform Scholarship and Practice. *Public Administration Review*, 72 (5), 638-648.
- Provan, K.G., & Milward, H.B. (2001). Do Networks Really Work? A Framework for Evaluating Public-Sector Organizational Networks. *Public Administration Review*, 61 (4), 414-423.
- Putnam, R.D. (1994). *Making democracy Work: Civic Traditions in Modern Italy*. Princeton, NJ, USA: Princeton University Press.
- Putnam, R.D. (1995a). Bowling Alone: America's Declining Social Capital. *Journal of Democracy*, 6 (1): 65-78.
- Putnam, R.D. (1995b). Tuning in, Tuning out: The Strange Disappearance of Social Capital in America. *Political Sciences and Politics*, 28 (4), 664-683.
- Putnam, R.D. (2003). *El declive del capital social. Un estudio internacional sobre las sociedades y el sentido comunitario*. Barcelona: Galaxia Gutemberg.
- Quiroga, A. (2003). *Introducción al análisis de datos reticulares. Prácticas con Ucinet 6 y NetDraw 1*. Universidad Pompeu Fabra. Retrieved April, 10, 2013, from <http://es.scribd.com/doc/37358840/10/Redes-dentro-de-redes-cliques#page=4>.
- Radcliffe-Brown, A.R. (1974). *Estructura y función en la sociedad primitiva*. Barcelona: Península.
- Radvilavicius, S. (2004). Cross-border Cooperation in Baltic Countries and North-West Russia. Vilnius: Nordic Council of Ministers Information Office in Lithuania. Retrieved December, 2, 2012, from <http://ec.europa.eu/ourcoast/download.cfm?fileID=988>.
- Ramos, I. (2012). Sentido de Comunidad, Participación Comunitaria y Redes Organizativas en la Industria Cultural en Andalucía. Unpublished Doctoral Thesis, Departament of Social Psychology, University of Sevilla.
- Raun, T. U. (1991). *Estonia and the Estonians*. Stanford, California: Hoover Press Publications.
- Rausmaa, H. (2008). *Tuglase Leek Loidab. Tuglase Seltsi ja Soome-Eesti suhete ajalugu*. Tallinn: Eesti Keele Sihtasutus.

- REDSEP (2013). Red de Sanitarios Españoles en Portugal. Retrieved 11, January, 2013 from <http://www.redsep.org>.
- Regional Policy–InfoREGIO (2012). European Territorial Cooperation. Cooperation across borders Retrieved June, 11, 2012, from http://ec.europa.eu/regional_policy/cooperate/index_en.cfm).
- Requena, F. (1989). El Concepto de Red Social. *Revista Española de Investigaciones Sociales*, 48, 137-152.
- Requena, F. (2008). *Redes Sociales y Sociedad Civil*. Madrid: Centro de Investigaciones Sociológicas.
- Ritzer, G. (1996). *Teoría Sociológica Clásica*. Madrid: Mc Graw-Hill.
- Roche, M. (2004). Social Policy and Social Capital: A Clear Case of Putting Merit before Method? *Social Policy & Society*, 3 (2), 97-111.
- Rodríguez, A. (2011). *Cooperación Transfronteriza España-Portugal 2000-2006*. In Márquez, J.A. (Ed.), *Cooperación Transfronteriza Andalucía-Algarve-Alentejo. XI Congreso de Ciencia Regional de Andalucía 2009* (pp. 349-387). Huelva: Biblioteca Universitaria.
- Rodrigo, B. (2009), Se buscan profesores de español. ABC. Retrieved March, 20, 2013, from <http://www.abc.es/20090407/nacional-sociedad/buscan-profesores-espanol-20090407.html>
- Rojo A., & Varela E. J. (2010). Las Eurorregiones como Motores de la Refundación Europea: una Aproximación Política. *Razón y Palabra*, 74, 1-17.
- Rojo, A. (2011). Las Consecuencias de la Cooperación Transfronteriza: ¿Vamos hacia la Refundación del Europa? *Revista de Estudios Políticos*, 152, 49-74.
- Rüütel, A. (2002). *The Priorities of Estonia. The President of the Republic of Estonia Address to the Tuglas Society and the Paasikivi Society*. Helsinki, January, 24.
- Ryttilä, P. (1999). LACE PHARE CBC. Draft Assessment Report. Estonia. Retrieved May, 15, 2010, from http://www.aebr.eu/files/publications/AR_Est.en.pdf.
- Sabec, K. (2007). Ethnic, Regional and National Identities in the Context of European Cross Border Cooperation Opportunities: A Case Study of Italian Ethnic Community in Slovene Istria. *Two Homelands*, 25, 249-270.
- Sanz, L. (2003). Análisis de Redes Sociales: O Cómo Representar las Estructuras Sociales Subyacentes. *Apuntes de Ciencia y Tecnología*, 7, 21-29.
- Savander, J., & Alaniit, H. (2007). *Strateg Developing Helsinki and Tallinn Metropolitan region Helsinki-Tallinn*: Uusimaa Regional Council.

- Seep, V., & Veemaa, J. (2010). The reproduction of Estonian provinces in the context of transitional administrative reform. *European Urban and Regional Studies*, 17 (4), 417–432.
- Schneider, G., Plumper, T., & Baumann, S. (2000). Bringing Putnam to the European regions on the relevance of social capital for economic growth. *European Urban and Regional Studies*, 7, 307-317.
- Shen, J. (2003). Cross.Border Connection Between Hong Kong and Mainland China under Two Systems before and beyond 1997. *Geografiska Annaler, Series B: Human Geography*, 85 (1), 1-17.
- Sillaste, J. (1998). Estonian Local Governments in Europe. In Heidmets, M., Loogma, K., Raudma, T., Toomel, K., & Viik, L. (Eds.), *Estonian Human Development Report1998* (pp. 95-97). Tallinn: Eesti Koostöö Kogu.
- Simmel, G. (2003). *Filosofia del dinero*. Granada: Comares.
- Simonsen, K. (2004). 'Europe', National Identities and Multiple Others. *European Urban and Regional Studies*, 11, 357-362.
- Smith, A. D. (1991). *National Identity*. Reno, NV: University of Nevada Press.
- Scott, J. (1987). *Social Networks Analysis*. London: Sage Publications.
- Scott, J. (1991). *Social network analysis: A handbook*. Newbury Park, CA: Sage Publications.
- Scott, J. (2002). 'Inducing Cooperation: Can Euroregions Function as Bridges between Complex Boundaries?' Retrieved September, 6, 2010, from http://www.indepsocres.spb.ru/scott_e.htm.
- Sildaway, J.D. (2001). Rebuilding bridges: a critical geopolitics of Iberian transfrontier cooperation in a European context. *Environment and Planning D: Society and Space*, 19 (6), 743-778.
- Simmel, G. (1994). "Bridge and Door." Translated by Mark Ritter. *Theory, Culture & Society*. 11: 5-10. 1909.
- Soeters, J.L. (1993). Managing Euroregional Network. *Organization Studies*, 14 (5), 639-656.
- Song, L., & Lin, N. (2009). Social capital and health inequality: Evidence from Taiwan. *Journal of Health and Social Behavior*, 50 (2), 149-163.
- Sousa, L. (2012). Understanding European Cross-border Cooperation: A framework for Analysis. *Journal of European Integration*. DOI:10.1080/07036337.2012.711827.
- Spellerberg, A. (2001). Framework for the Measurement of Social Capital in New Zealand. Statistic New Zealand. Research and Analytical Report, 14, 1- 46.

- Statistical Year Book of Estonia (2011). Tallinn: Statistics Estonia.
- Statistics Estonia (2012a). Subject Areas. Education. Statistical Database Retrieved October, 4, 2012, from http://pub.stat.ee/px-web.2001/I_Databas/Social_Life/02Education/08Higher_education/08Higher_education.asp.
- Statistics Estonia (2012b). Subject Areas. Population. Population Indicators and Composition. Statistical Database. Population figure and composition. Retrieved September, 15, 2012, from http://pub.stat.ee/px-web.2001/I_Databas/Population/01Population_indicators_and_composition/04Population_figure_and_composition/04Population_figure_and_composition.asp.
- Statistics Finland (2012). Statistics. Population. Population Structure. Tables. Nationality according to age and sex by region 1990 – 2012. Retrieved August, 10, 2012 from http://193.166.171.75/database/StatFin/vrm/vaerak/vaerak_en.asp.
- Statistics Finland (2013). Statistics. Transport and Tourism. Border Interview Survey2011. Retrieved August, 10, 2012 from http://www.stat.fi/til/rajat/2011/rajat_2011_2012-06-13_tie_001_en.html.
- Stewart-Weeks, M., & Richardson, C. (1998). Social Capital Stories. How 12 Australian Households Live their Lives. Policy Monograph, 42. The Centre for Independent Studies. Smithfield, NSW. Australia: Alken press.
- Stone, W. (2001). Measuring Social Capital. Towards a Theoretically Informed Measurement Framework for Researching Social Capital in Family and Community Life. *Research Paper*, 24, 1-38.
- Suhonen, P. (1995). Finnish Views on Estonia and Other Neighbours. In Lauristin, M.; Vihalemm, P.; Rosengren, K.E., & Weibull, L. (Eds.), *Return to the Western World. Perspectives on the Estonian Postcommunist transition* (pp. 185-193). Tartu. Tartu University Press.
- Suitor, J.J., Wellman, B., & Morgan, D. L. (1997). It's About Time, How, Why, and When Networks Change. *Social Networks*, 19 (1), 1-7.
- Sungsoo, H., & Il-Chul, M. (2009). Are We Treating Networks Seriously? The Growth of Network Research in Public Administration and Public Policy. *Connection*, 29 (2), 4-17.
- Talvet, J., (2003). Kalevapoig: A great European Epic. In Estonian Writers' Union (eds.), *Estonian Literary Magazine*, 17. Tallinn. Retrieved, January, 10, 2012, from <http://elm.estinst.ee/issue/17/kalevipoeg-great-european-epic/>.

- Terlouw K. (2012). Border Surfers and Euroregions: Unplanned Cross-Border Behaviour and Planned Territorial Structures of Cross-Border Governance. *Planning Practice and Research* 27 (3), 351-366.■
- Tarrow, S. (1996). Making Social Science Work across Space and Time: A Critical Reflection on Robert Putnam's Making Democracy Work. *The American Political Science Review*, 90 (2), 389-397.
- Terk, E. (2011). The dynamics of the Economic Integration of Estonia, Latvia and Lithuania. In Lauristin, M. (Ed.), *Estonian Human Development Report 2011* (pp. 172-176). Tallinn: Eesti Koostöö Kogu.
- Tocqueville, A. (1985). *La Democracia en América*. Madrid: Alianza.
- Tönnies, F. (1979). *Comunidad y Asociación: el comunismo y socialismo como formas de vida social*. Barcelona, Península.
- Torpe, L. (2003). Social Capital in Denmark: A Deviant Case? *Scandinavian Political Studies*, 26 (1), 27-48.
- Transparency International. The global coalition agent corruption (2013). What We Do. Corruption by Country. Retrieved October, 28, 2013 from <http://www.transparency.org/country>.
- Turivia (2012). Atas Asociación Transfronteriza Alcoutim San Lucar de Guadiana. Retrieved March, 20, 2012, from <http://www.turivia.com/v/Huelva/Sanl%C3%BACar+de+Guadiana/Atas+Asociacion+Transfronteriza+Alcoutim+Sanlucar+de+Guadiana/405731/>.
- Uphoff, N. (1996). Learning from Gal Oya: *Possibilities for Participatory Development and Post-Newtonian Social Science*. London: Intermediate Technology Publications.
- Uphoff, N. (2000). Understanding Social Capital: Learning from the Analysis and Experience of Participation. In Dasgupta, P. & Serageldin, I. (Eds.), *Social Capital: A Multifaceted Perspective* (pp. 215-249). Washington: World Bank.
- Uphoff, N., & Wijayaratna, C.M. (2000). Demosntrated Benefits from Social capital. The Productivity of Farmer Organizations in Gal Oya, Sri Lanka. *World Development*, 28 (11), 1875-1890.
- Uzzi, B. (1997). Social Structure and Competition in Interfirm Networks: The Paradox of Embeddeness. *Administrative Science Quarterly*, 42 (1), 35-67.
- Valles, M. S. (1997). *Técnicas Cualitativas de investigación Social. Reflexión Metodológica y Práctica Profesional*. Madrid: Editorial Síntesis.
- Valles, M. S. (2000). La grounded theory y el análisis cualitativo asistido por ordenador. In García, M., Ibañez, J., & Alvira, F. (Eds.), *El análisis de la realidad social. Métodos y Técnicas de investigación* (pp. 575-603). Madrid: Alianza Editorial.

- Vallejos, A.F., Ortí, M., & Agudo, Y. (2007). *Métodos y Técnicas de Investigación Social*. Madrid. Editorial Centro de Estudios Ramón Areces, S.A.
- Van Der Velde, M. & VanHoutum, H. (2000). *Border, Regions and People*. London: Pion Limited.
- Van Deth, J.W., Maraffi, M., Newton, K., & Whiteley, P. (1999). *Social Capital and European Democracy*. London and New York: Routledge.
- Van Deth, J.W. (2008). Measuring Social Capital. In Castiglioni, D., Van Deth, J.W., & Wolleb, G. (Eds.), *The handbook of Social Capital* (pp. 150-176). Oxford: Oxford University Press.
- Van Houtum, H. (2000) An Overview of European Geographical Research on Borders and Border Regions. *Journal of Borderlands Studies*, 15 (1), 57-83.
- Van Houtum, H., & Struver, A. (2002). Border, Strangers, Doors and Bridges. *Space & Polity*, 6 (2), 141–146.
- Vihalemm, P. (1995). Changing National Spaces in the Baltic Area. In Lauristin, M.; Vihalemm, P.; Rosengren, K.E., & Weibull, L. (Eds.), *Return to the Western World. Perspectives on the Estonian Postcommunist Transition* (pp. 125-162). Tartu: Tartu University Press.
- Vihalemm, P. Senior Researcher at the Institute of Journalism, Communication and Information Studies, Faculty of Social Sciences and Education, University of Tartu. Interview on September, 2nd, 2010.
- Virkunen, J. (2010). Senior Researcher at the Karelian Institute, University of Joensuu. Finland. Interview on July, 19, 2010.
- Viry, G. (2012). Residential mobility and the spatial dispersion of personal networks: Effects on social support. *Social Networks*, 34 (1), 59-72.
- Vujadinovic, D. (2011). On European identity. *Synthesis Philosophica*, 26 (1), 117-132.
- Walliman, N. (2006). *Social Research Methods*. London. Sage Publications.
- Walther, W., & Reither, B. (2012). Cross-border policy networks in the trinational region of Basel, CEPS Instead Working Papers.
- Wasserman, S., & Faust, K. (1994). *Social Network Analysis: Methods and Applications*. Cambridge: Cambridge University Press.
- Weber, M. (1995). *La ética protestante y el espíritu del capitalismo*. Barcelona: Península.
- Wellman, B. (1988). Structural Analysis: from Method and Metaphor to Theory and Substance. In Wellman, B., & Berkowitz, S.D. (Eds.), *Social Structure. A Networks Approach* (pp. 19-60). Cambridge: Cambridge University Press.

- Wellman, B., & Leighton, B. (1979). Networks, neighbourhoods and communities: approaches to the study of the community question. *Urban Affairs Quarterly* 14 (3), 360–390.
- Wellman, B. (1979). The Community Question. The intimate networks of East Yorkers. *American Journal of Sociology*, 84, 1201–1231.
- Wellman, B., Wong, R.Y.L., Tindall, D., & Nazer, N. (1997). A decade of network change: turnover, persistence and stability in personal communities. *Social Networks*, 19 (1), 27-50.
- Wellman, B. (2001). Physical Place and Cyber Place: The Rise of Personalized Networking. *International Journal of Urban and Regional Research*, 25 (2), 227-252
- Wellman, B. (2007). Challenges in Collecting Personal Network Data: The Nature of personal Network Analysis. *Field Methods*, 19, 111-115.
- White, L., & Christopoulos, D.C. (2011). The Public Sector as Broker: an Interim Report. *Procedia. Social and Behavioral Sciences*, 10, 132-139.
- Winter, I. (2000). Towards a Theorised Understanding of Family Life and Social Capital. *Australian Institute of Family Studies. Working Paper*, 21, 1-18.
- Wolf, U., Holleder, A. & Brand, H. (2006). Cross-border cooperation in Europe: what are Euregios? *Gesundheitswesen* 68 (11), 667-73.
- Woolcock, M. (1998). Social capital and Economic development: Towards a theoretical synthesis and policy framework. *Theory and Society*, 27, 151-208.
- Woolcock, M. (2001). *The place of social capital in understanding social and economic outcomes*. Retrieved April, 14, 2010, from <http://www.oecd.org/dataoecd/5/13/1824913.pdf>.
- World Bank. (2010) Topics. Social Development, Social Capital. Retrieved November, 11, 2010, from <http://web.worldbank.org/WBSITE/EXTERNAL/TOPICS/EXTSOCIALDEVELOPMENT/EXTTSOCIALCAPITAL/0,,menuPK:401021~pagePK:149018~piPK:149093~theSitePK:401015,00.html>.
- World Values Survey (2012). Online Data Analysis. Four-wave Aggregate of the Values Studies, corresponding to the combined file of the four waves carried out by both the EVS and WVS. Retrieved October, 10, 2012 from <http://www.wvsevsdb.com/wvs/WVSAalyzeStudy.jsp>.
- Zhurzhenko, T. (2004). Cross-Border Cooperation and Transformation of Regional Identities in the Ukrainian-Russian Borderlands: Towards a Euroregion "Slobozhanshchyna"? Part 2. *Nationalities Papers*, 32 (2), 497-514.

- Zillmer, S. (2005). Chances for German-Polish Cooperation. A German Point of View. IRS Working Paper, Erkner, Leibniz-Institut für Regionalentwicklung und Strukturplanung.
- Zmerli, S., Newton, K., & Montero, J.R. (2007). Trust in people, Confidence in Political Institutions and Satisfaction with Democracy. In Van Deth, J.W., Montero, J.R., & Westholm, A. (Eds.), *Citizenship and Involvement in European Democracy* (pp. 35-66). NewYork: Routledge.
- Zivkovic, J. (2009). National Minorities from Bulgaria, Serbia and Macedonia towards Regionalism and the cultural Autonomy. *Facta Universitatis: Series Philosophy, Sociology, Psychology and History*, 8 (1), 37-53.

ANNEXES

ANNEX 1

Interviews to experts related to cross-border cooperation.

Date: ____/____/2011

Questionnaire nº:

DATASHEET:

NAME AND SURNAME:
AGE:
CONTACT:
OCCUPATION/WOK SITUATION :

0. SOCODEMOGRAPHIC DATA

1. Educative level and other degrees.
2. Personal/Working experience related to this research.
3. Knowledge level of the neighbouring language, and others.
4. Perception about self economic situation:
Very Good/Excellent - Good - Regular - Bad - Very Bad

1. VERTICAL TRUST (BRIEFLY ANSWERED)

1. Trust in institutions of your country.
2. Trust in European institutions.
3. Trust in your (Finnish/Estonians) neighbours.
4. Trust in institutions of neighbouring country.

2. PERSONAL AND FAMILIY MIGRATION EXPERIENCE – TRANSNACIONAL NETWORKS AND PRACTICES:

1. Birth Origin and Family Origin (country, region, and municipality).
2. Residence place.
3. Self migration and family migration: reasons.

3. KNOWLEDGE OF THE NEIGHBOURING COUNTRY AND SENSE OF BELONGING TO THE BORDER/REGIONAL/LOCAL COMMUNITY

1. Relations and degree of knowledge on the neighbouring country (Visited places, reasons, frequency, etc.).
2. Your life links to the bordering area.
3. Opinion about the cross-border area: main characteristics and needs.
4. Belonging feeling and identity: From where you do feel?
5. Opinion about their neighbours.
6. Infrastructural factors/aspects which affect to relations and cooperation (transport, communications).

4. "FORMAL" WORK IN THE NEIGHBOURING COUNTRY

1. Working Experience in the other side of the border: Time, reasons, satisfaction.

2. Motivation/Interest for working in the neighbouring country.

5. “FORMAL” PARTICIPATION IN SOCIAL AND PERSONAL NETWORKS (locals and bordering)/ “INFORMALS” PRACTICES OF COOPERATION/ COLLABORATION

1. Participation in some organization/association, club or group, and relations within your country.
2. Trans-national experiences, practices and participation/support to organizations, clubs, etc.
3. Relationships with friends from the neighbouring country: How did you meet them? Frequency and way of contact.

6. INSTITUTIONAL CROSS-BORDER COOPERATION:

1. In what consist for you the Cross-border Cooperation? What it should be?
2. How has developed the Cross-border Cooperation? Way of working, kind of projects, expected results. Was it really cooperation...?
3. Possible advantages/disadvantages that the Cross-border Cooperation implies for you?
4. Opinion about degree of cross-border cooperation in this area at institutional LOCAL/REGIONAL/NACIONAL LEVEL, INTENSITY AND QUALITY
5. Do you think there is a good information flow between institutions in the institutional Cross-border Cooperation?
6. Which role has the institution where you work in the Cross-border Cooperation in this area?
7. With which institutions from neighbouring country you use to work? Possible advantages/disadvantages have brought out the relations with these institutions?
8. From your own experience: How it started the relations with these other institutions and how these relations are?
9. Degree of satisfaction on how is being developing the Cross-border Cooperation in the area. And satisfaction from your our experience in the project/s involved.
10. Opinion about **institutional relations within your country** in relation to Cross-border Cooperation:.. INTENSITY AND QUALITY.
11. To what extent the **institutional/political structure/context** favours or promotes the relations of cross-border cooperation?

7. KNOWLEDGE AND RELATION WITH EUROREGION

1. Degree of knowledge about the Euroregion.
2. Degree of conformity/agreement with the Euroregion activities and objectives.
3. Which role do you think Euroregion has and must have in the area.

8. INFORMAL BORDER RELATIONS

1. How do you think are the border relations at informal and local level in the border region: Association, Business, citizens, etc. ? INTENSITY AND QUALITY.

9. INTEGRATION OF RELATIONS BETWEEN LOCAL AND REGIONAL/NATIONAL LEVEL

1. Which role do you think have the local actors who make cross-border cooperation in this region within the Euroregion/Regional/National Institutions?
2. Relations among local and informal actors with institutional actors. INTENSITY AND QUALITY. Nature of these relations (opened, hierarchical, favouritisms ...)

10. FUTURE PERSPECTIVES.

1. Perspectives about the relations of cooperation and Cross-Border Cooperation in the future.

ANNEX 2

LIST OF CODES AND FAMILY CODES

EXPERT PROFILE

Socio-Economic Profile:

Education: Level of education

Bachelor
Master
Doctor

Working Experience: Period of working experience in cross-border cooperation

Interreg participation: If the Expert has direct experience in projects funded with Interreg A

Yes
No

Self economic situation: Expert self-perception of economic situation

Very Good
Good
Regular

Language competence: Expert self-perception with linguistic competence with the language of neighbour country

Very Good/Excellent
Good
Regular
Low

Experts' Trust and other data:

Trust in institutions: trust in national institutions, governments

Very high
High
Medium
Low
Very low

Trust in EU: Trust in European Institutions

Very high
High
Medium
Low
Very low

Identity: Identity feeling: Experts' feeling of Identity

Cross-border
Global/European
Supra-Regional: Latin, Mediterranean, South-European , Baltic,
Scandinavian, Nordic,
Bi-National
National
Regional
County/Province
Local

EXPERTS'S BORDER NETWORKS

Cross-border Relations:

Border Family: Experts' personal-family relations which are not friends or colleagues. Like parents, brothers, sisters, relatives living in the neighbour country

Yes
No

Border friends: Experts's close friends, friends and colleagues from neighbour country

Yes
No

Border workmates: Experts's work relations, work-friends from neighbour country

Yes
No

Resources:

Instrumental:

Brokering: references to the bridging potential of the experts cross-border personal networks

Information: reference to the access to information that experts get from their cross-border personal networks

Expressive:

Consolidation: references to the experts cross-border personal networks that permits to secure resources.

EXPERTS' BORDER ENTAILMENT

Border relation: Expert's general relational behaviour with neighbour country

Border living: If Experts have been living some period or live in the neighbour country

Yes

No

Social proximity: Experts feeling of belonging to the border region, neighbour country

Neighbour opinion: General opinion about the people from neighbour country

Brotherhood Feeling: Personal reference to similarity between neighbours, culture, history, feeling of brotherhood

Finno-Baltic: References to Finno-Ugric or Finno-Baltic common roots

Iberian: References to the Iberism roots

EXPERTS' OPINION OF CROSS-BORDER COOPERATION

Cooperation: Experts' opinion about the evolution and development of cross-border cooperation in their region.

Satisfactory: Positive references to the cross-border cooperation

Improving: Positive references with conditions, some negative aspects

Unsatisfactory: Negative references to the development of cross-border cooperation

Mirror Projects: references to the mirror projects, parallel projects without common Outputs

YES

NO

Hidden Agenda: References to the cooperation where institutional actors bring their own institutional agenda

YES
NO

Dependency: references to the dependency of EU funds to cooperation and the lack of initiative to cooperate without Interreg projects

YES
NO

Border Development: Experts general opinion about cross-border cooperation

Poor Common Development: When Experts perceived that there is lack of a common strategy of development in the border area

Common Development: When Experts perceived that there is a common strategy of development in the border area

Political Commitment: Experts references to the type or nature of political commitment in institutions for doing cross-border cooperation and common development across the border

YES
NO

Synergy: Experts references to common outputs in respective regions from the cross-border cooperation. References to the sustainability of cross-border cooperation

YES
NO

Big-Small Brother References to the Finnish Estonian Cooperation based in the help of Finnish institutions, people, etc, to Estonian ones

Future:

Positive future: Experts positive opinion about the future development of CBC in the current context

Negative future: Experts negative opinion about the future development of CBC in the current context

EXPERTS' OPINION OF INSTITUTIONAL RELATIONS

Institutional Relations: References to the nature and development of institutional relations for cross-border cooperation

Intensity:

Good Intensity: When Experts describe institutional relations as intensive, frequent, continuous

Poor Intensity: When Experts describe institutional relations as poor developed, sporadic, punctual

Quality:

Good Quality: When expert describe institutional relations as very good, productive, without conflict or misunderstandings

Poor Quality: When expert describe institutional relations as ineffective difficult, with interest conflict or misunderstandings

Asymetry AAA: References to the political marginalization of the institutional actors of territorial areas closest to the border area. Mainly local actors against regional actors that hoard EU funding for CBC

AsymetrySFE: References in the border area SFE to the concentration of cross-border cooperation in certain groups of institutional actors, in the urban metropolitan areas to the detriment of the rest of areas

Actor's Role: References to the role that an specific institution has in the development of the cross-border cooperation in the cross-border region

University Actor: Referentes to the rol of Universities in the cross-border cooperation

Enterprise Actor: Referentes to the rol of enterprises in the cross-border cooperation

Local Actor: References to the rol of local municipalities, public agencies of development in the cross-border cooperation

Region Actor: Referentes to the rol of regional governments in the cross-border cooperation

Government: Referentes to the rol of national governments in the cross-border cooperation

Euroregions: Experts' referentes to the role of Euroregion in the cross-border region, and in the cross-border cooperation

Important
Non important
Do not know

ANNEX 3

SOCIAL NETWORK ANALYSIS Personal Support Network

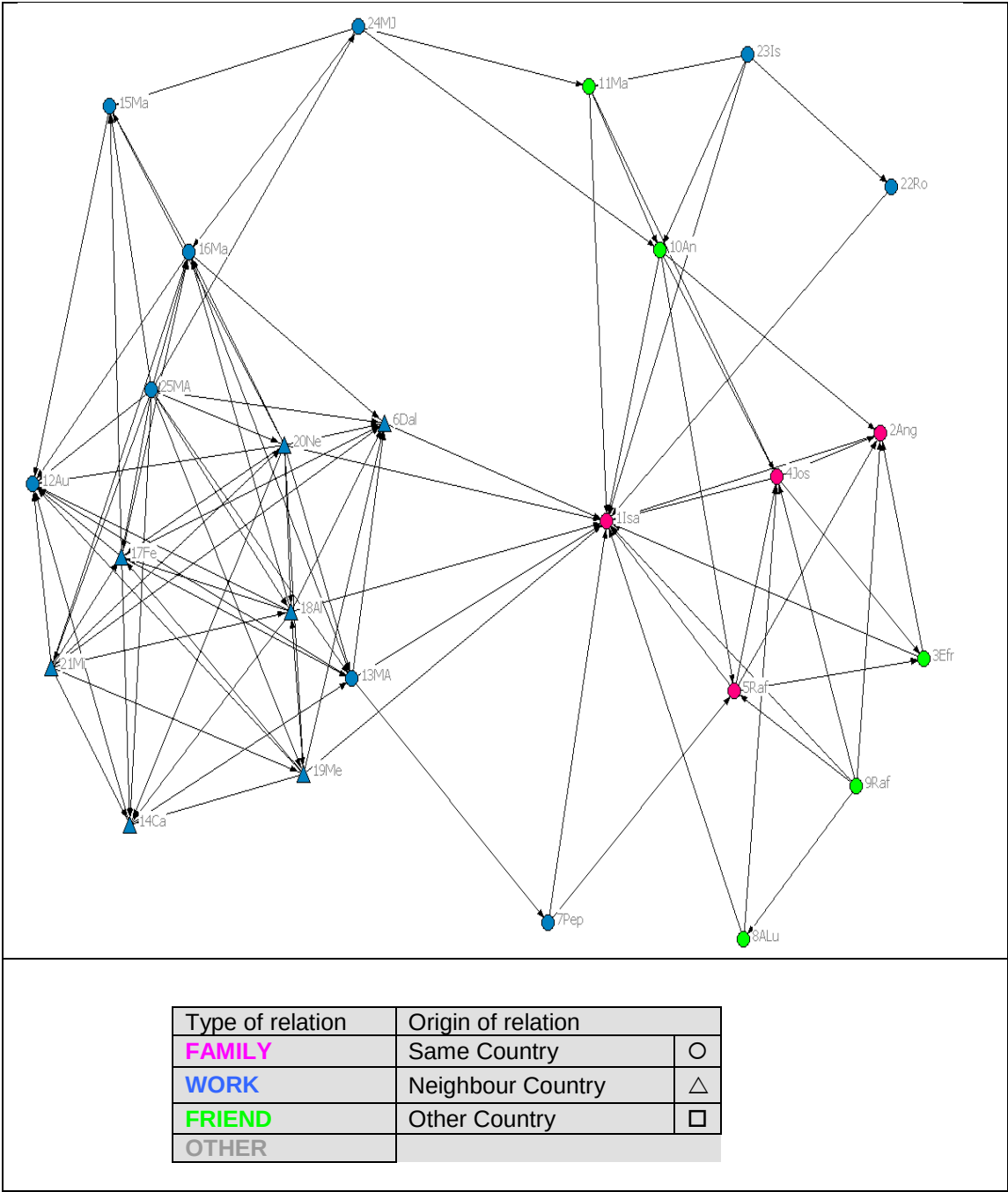
Name/quote a list of 25 people with who you maintain relationship normally. Write down the name or pseudonym. You can mention people who may do not live in your city/village. Please indicate (a) the place where he/she lives, (b) For how long you know him/her?, (c) How often you contact him/her?, (d) How did you meet him/her?, (e) What kind of relation do you have with him/her?

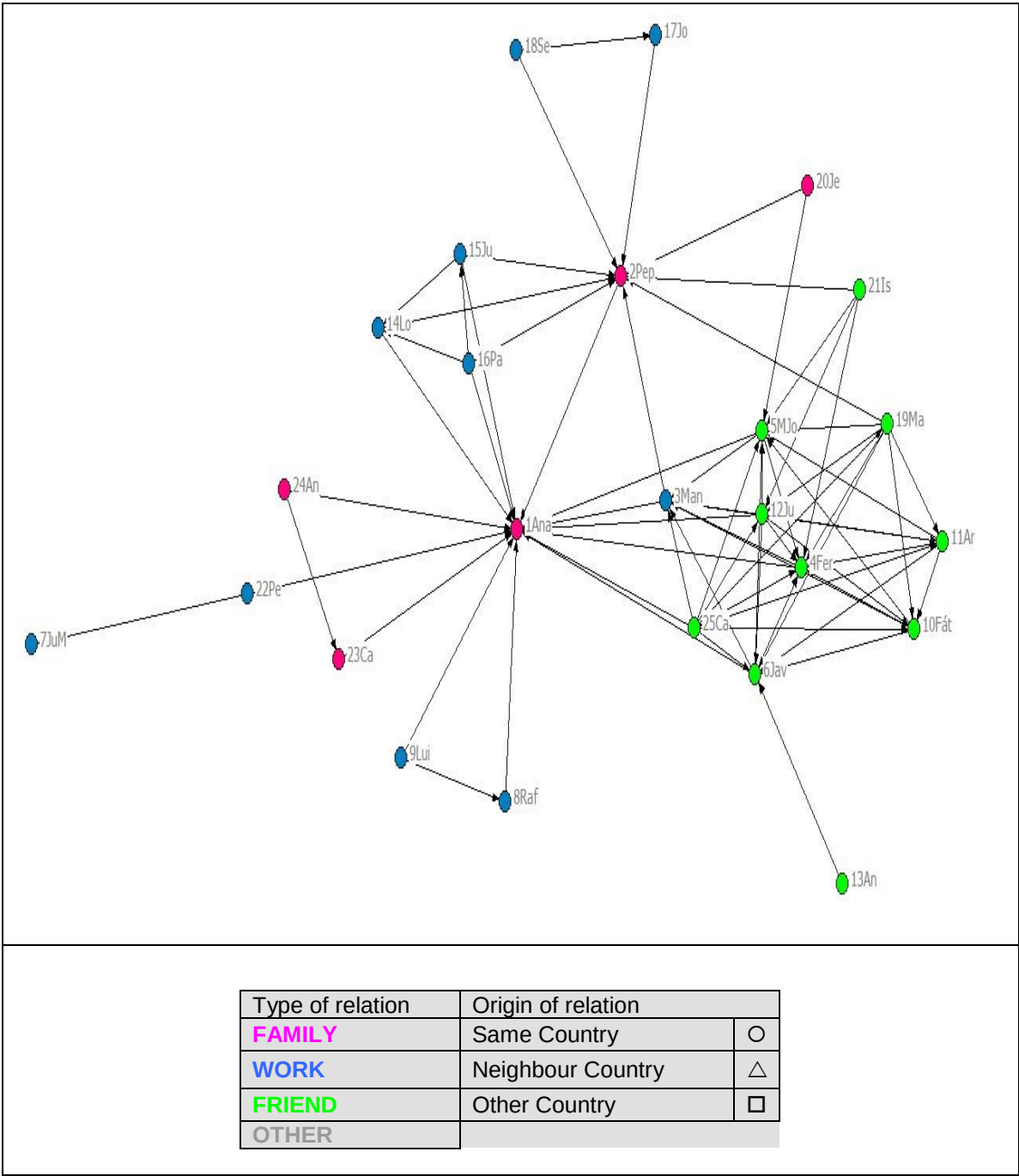
	Name or Pseudonym The same person can be quoted only once	Place/City where he/she lives	For how long you know him/her? (Years or months approximately)	How often you contact him/her? 1. Never 2. Hardly ever 3. Some times 4. Once in a month 5. Weekly 6. Daily	How did you meet him/her? (open question)	What kind of relation do you have with him/her? (Example: friend, boss, partner, son,father...) 1. Friendship 2. Family 3. Work 4. known 5. Neighbourhood 6. Others: _____	Kind of support 1.Personal 2. Material, 3. Helping in some tasks 4. Diversion, 5.Positive Feedback 6. Negative Feedback 7. Difficult situations 8. Reciprocity
Example	Mari	Tallinn	3 y. or 5 m	1	Pub/school...	1.friend	1, 2, 5
1							
2							
3							
4							
5							
6							
7							
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							
21							
22							
23							
24							
25							

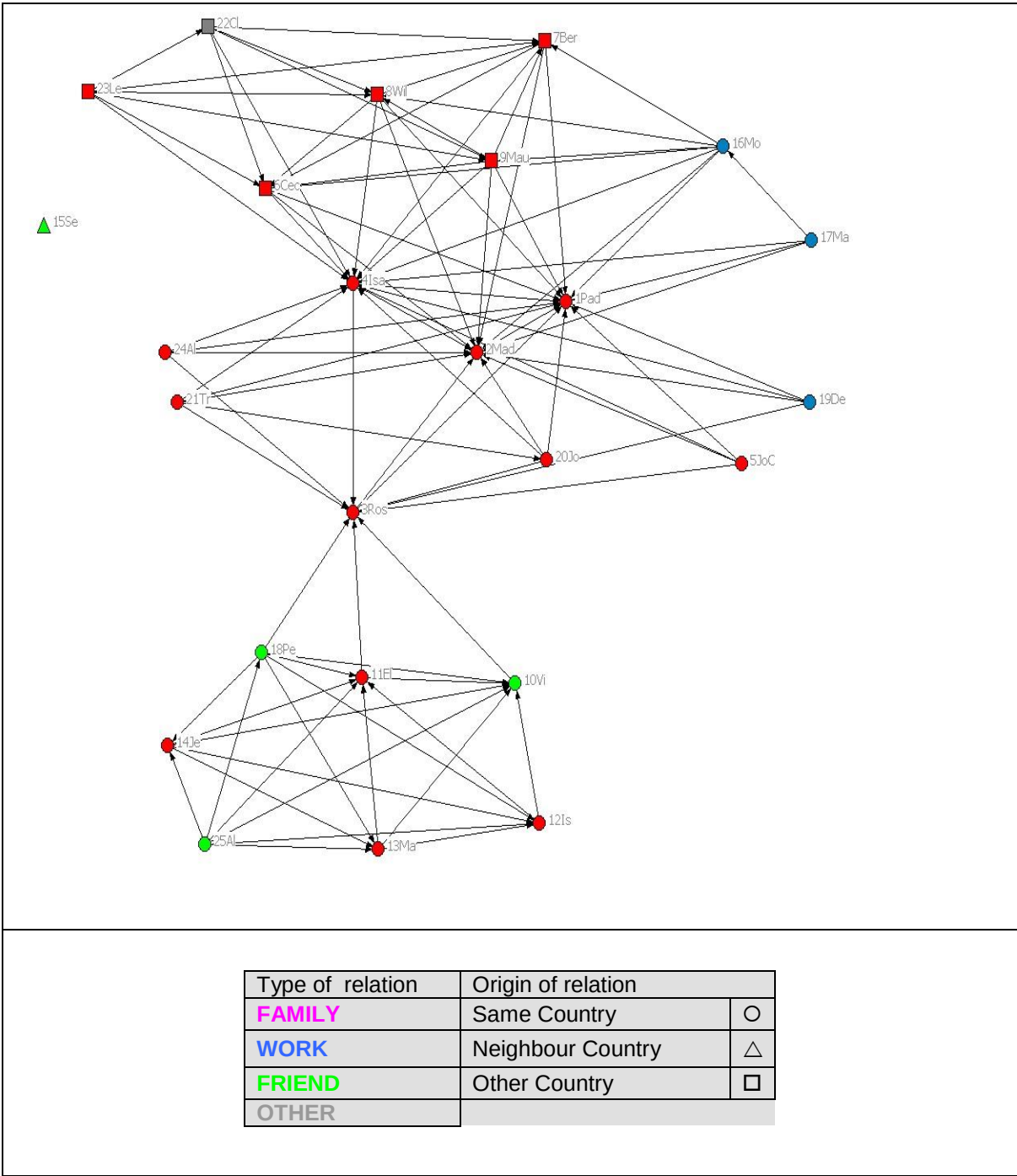
Who from the quoted people above have NORMALLY relations among them along the year? INDICATE IT WITH A CROSS

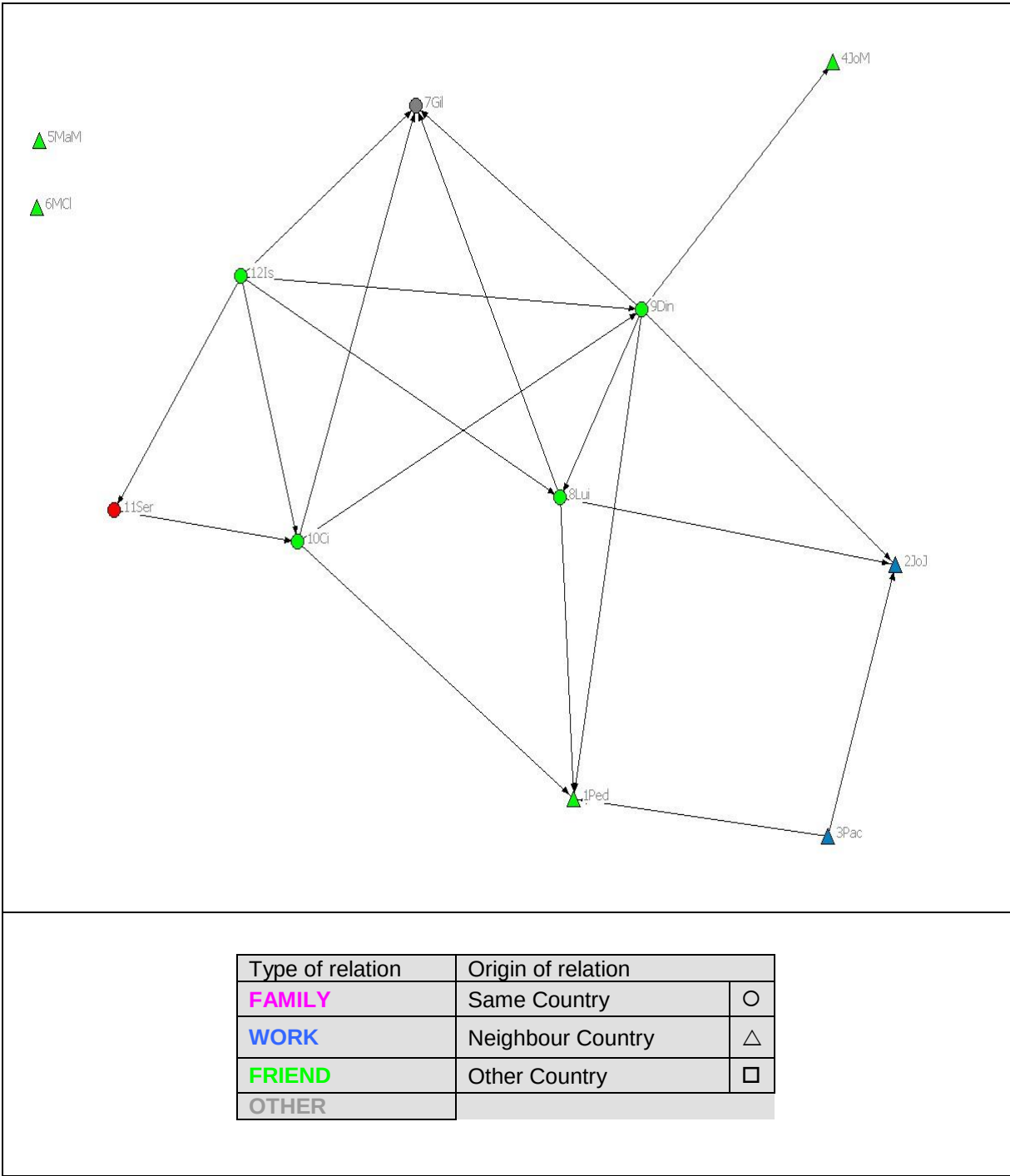
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25
1																									
2																									
3																									
4																									
5																									
6																									
7																									
8																									
9																									
10																									
11																									
12																									
13																									
14																									
15																									
16																									
17																									
18																									
19																									
20																									
21																									
22																									
23																									
24																									
25																									

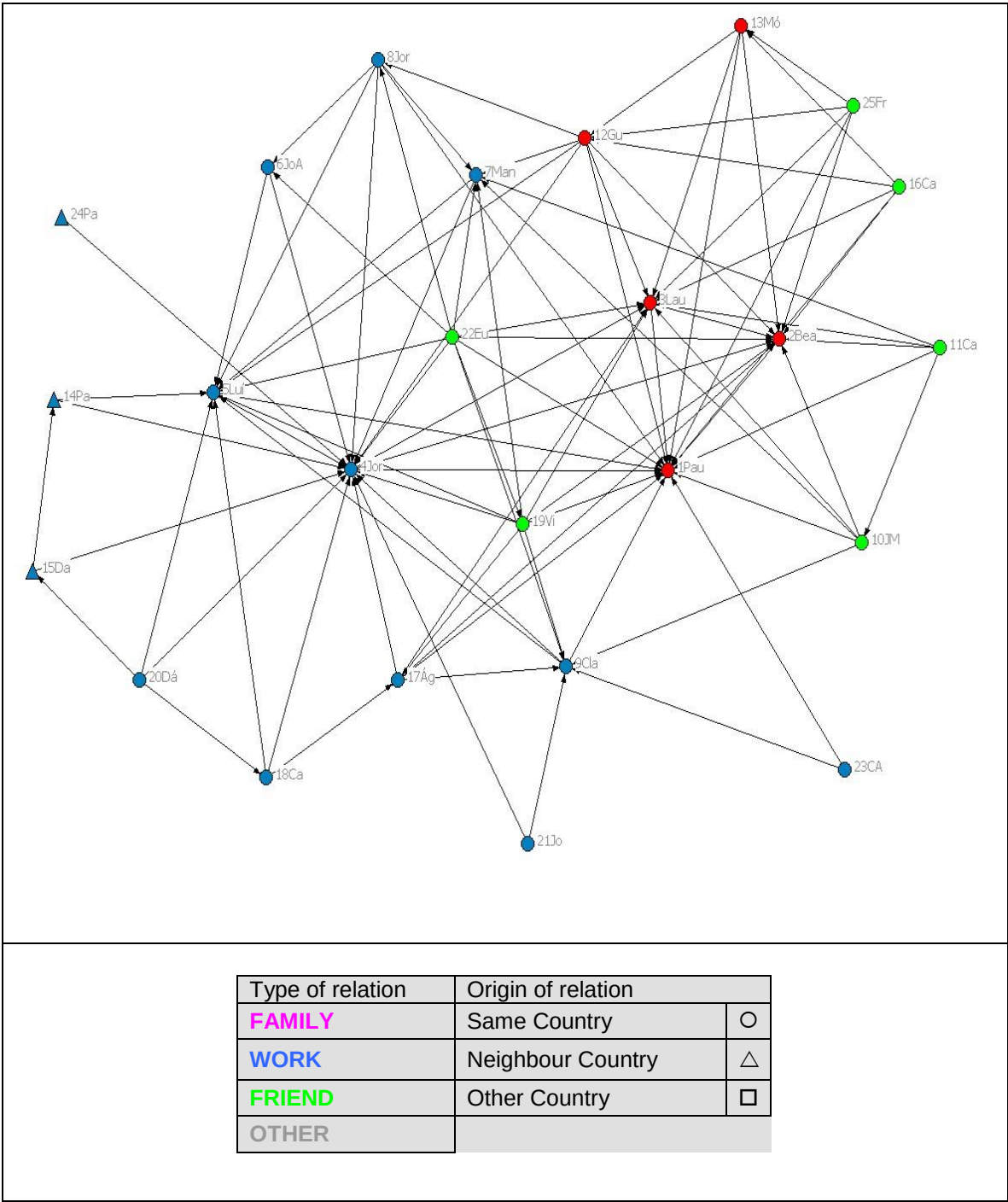
ANNEX 4



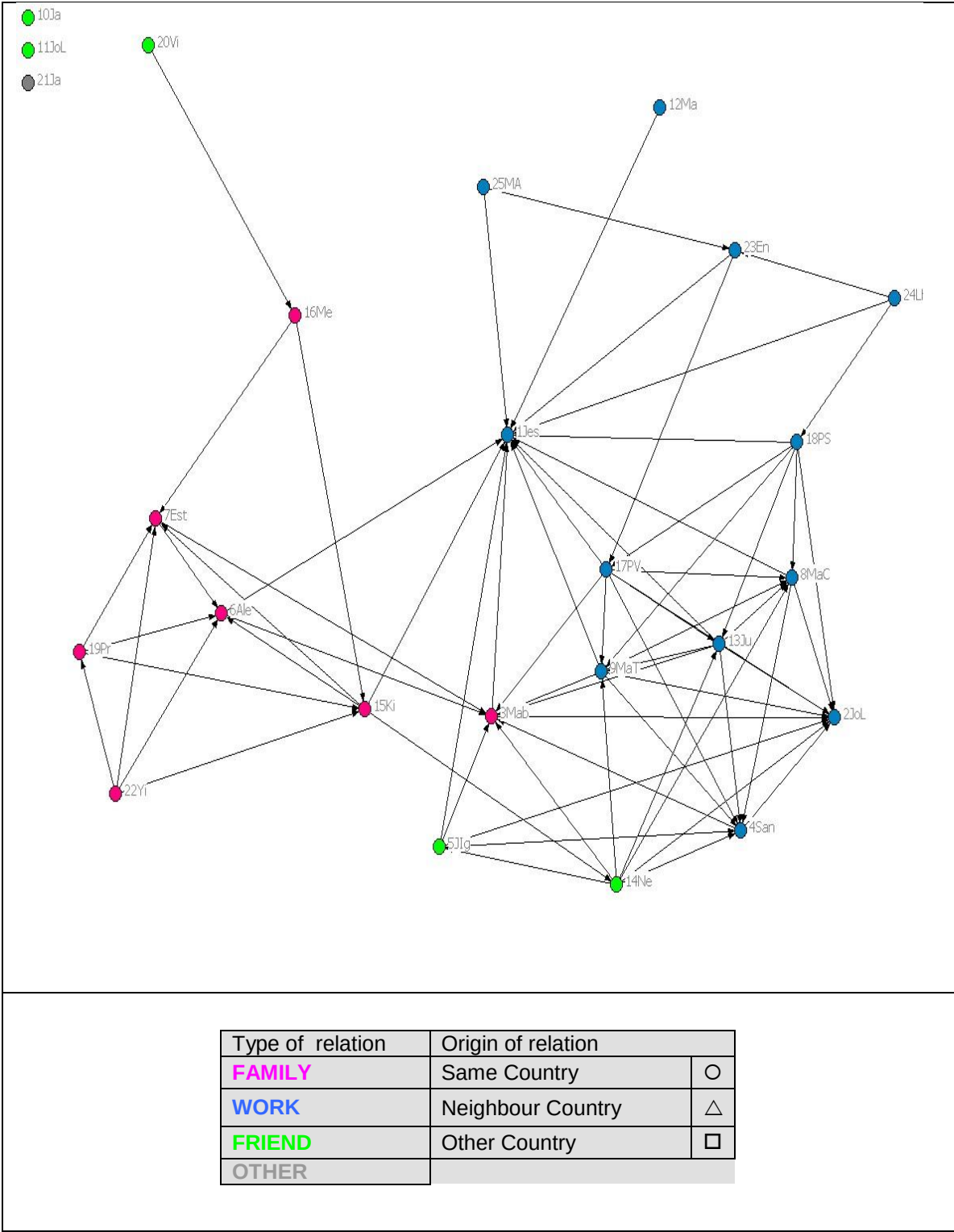


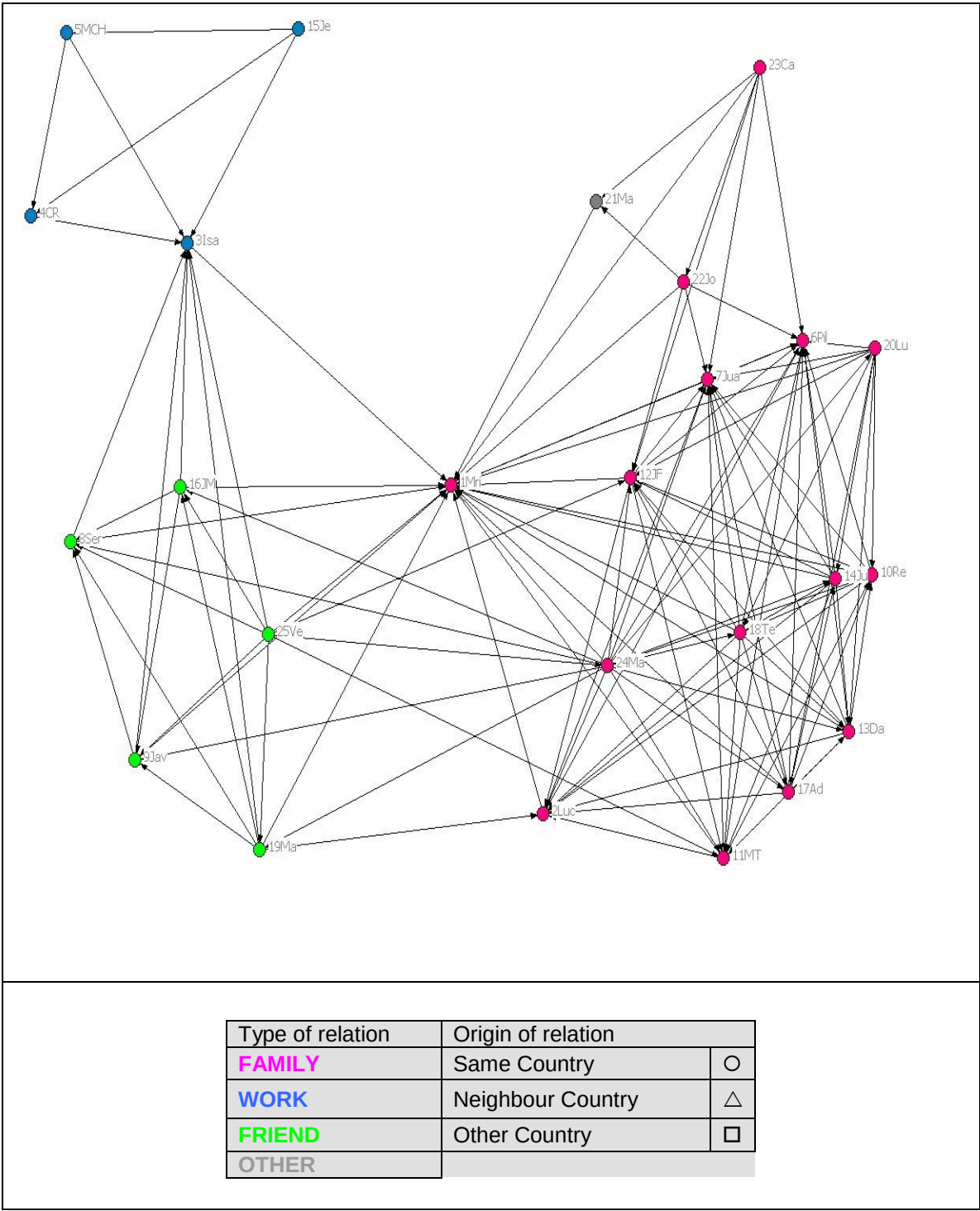


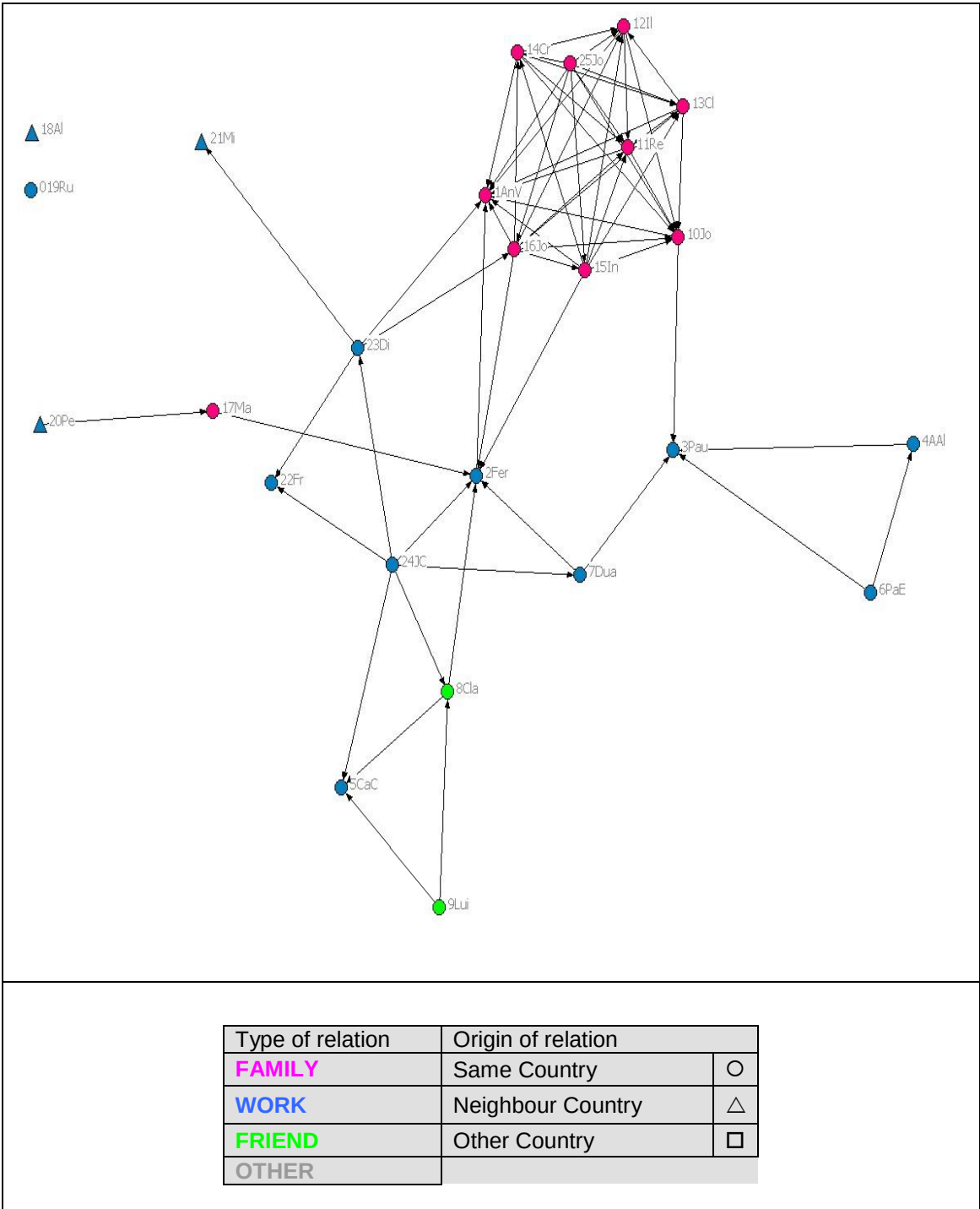




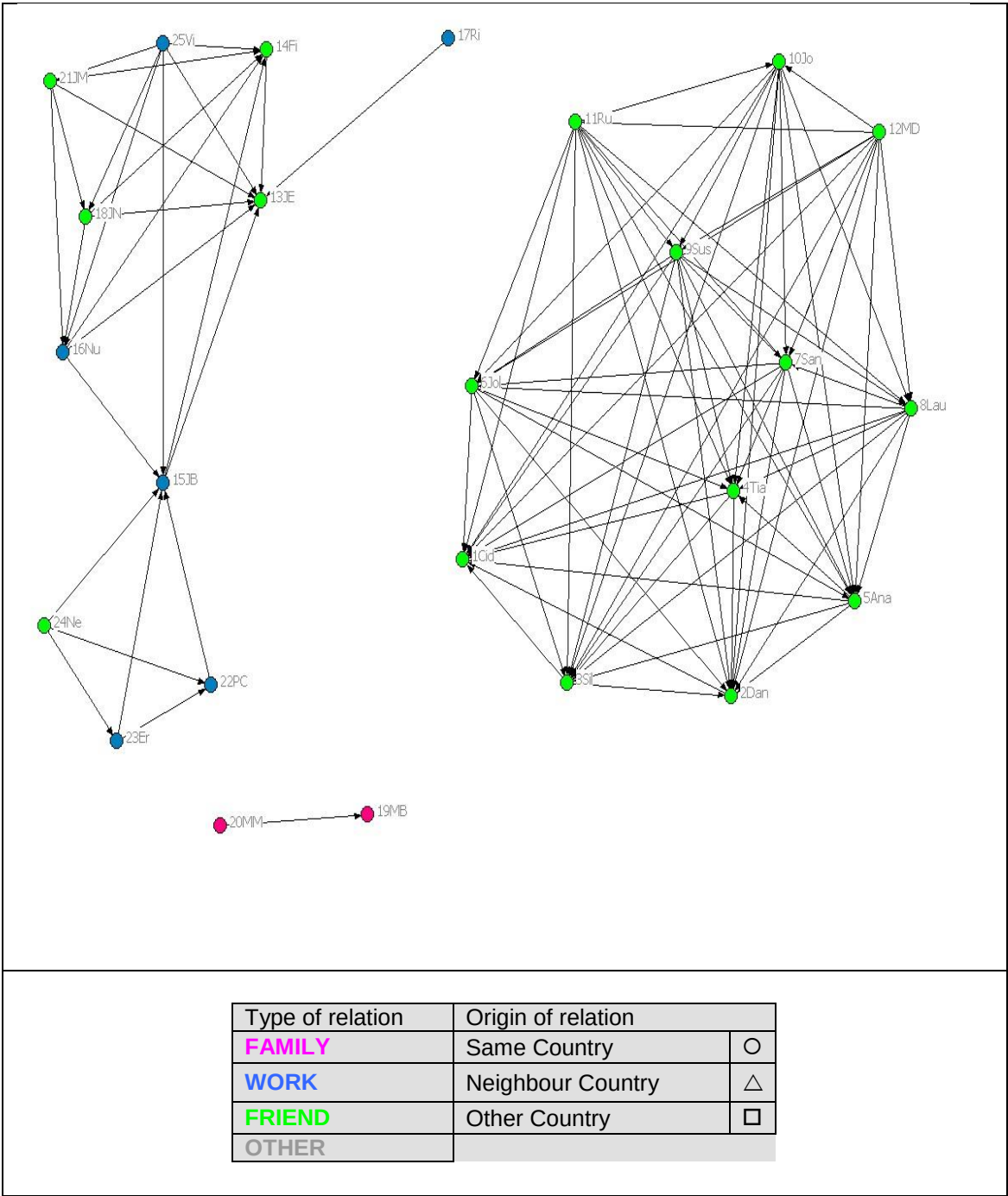
E6, Spain, Manager, Public Institution, 2011

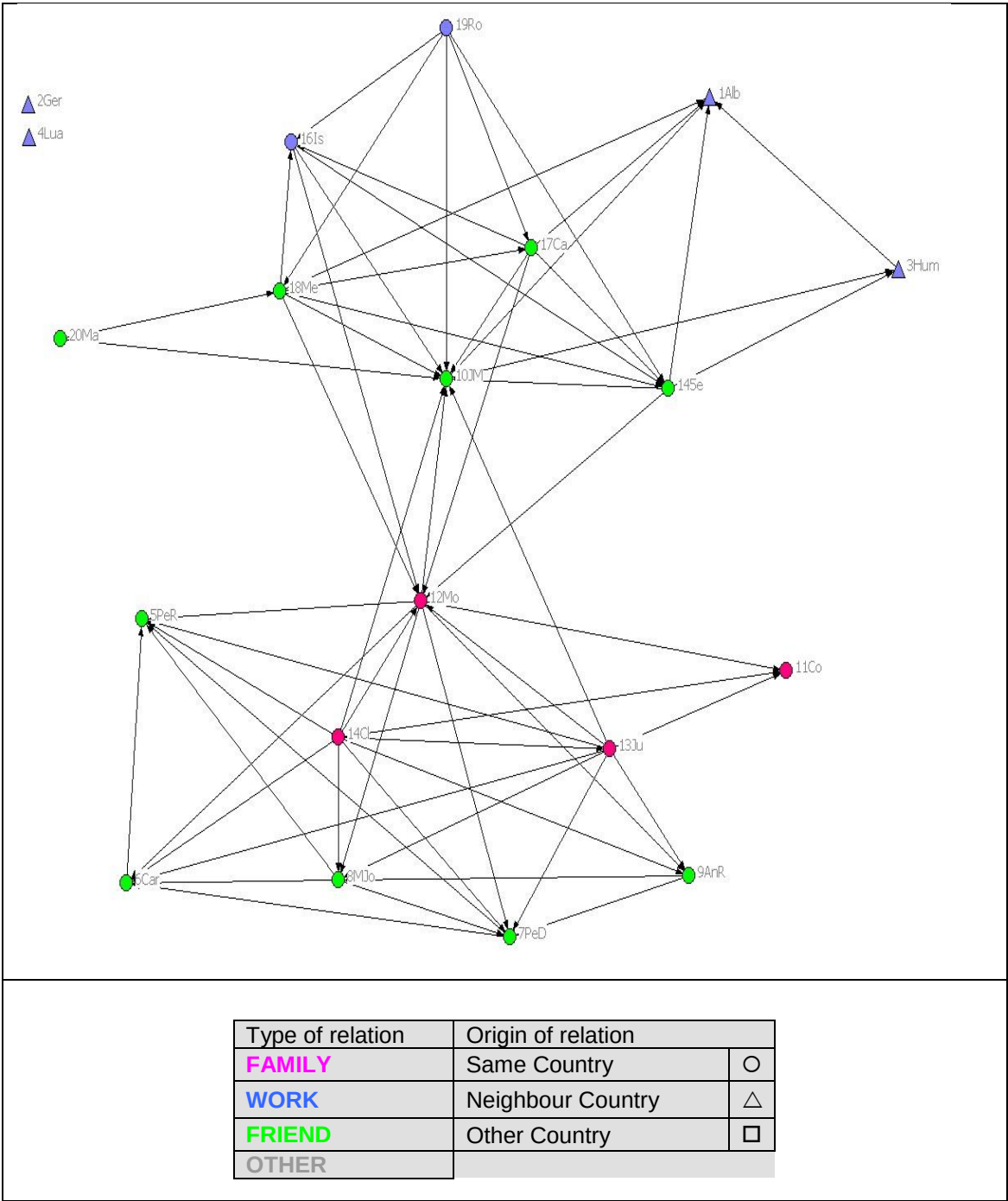


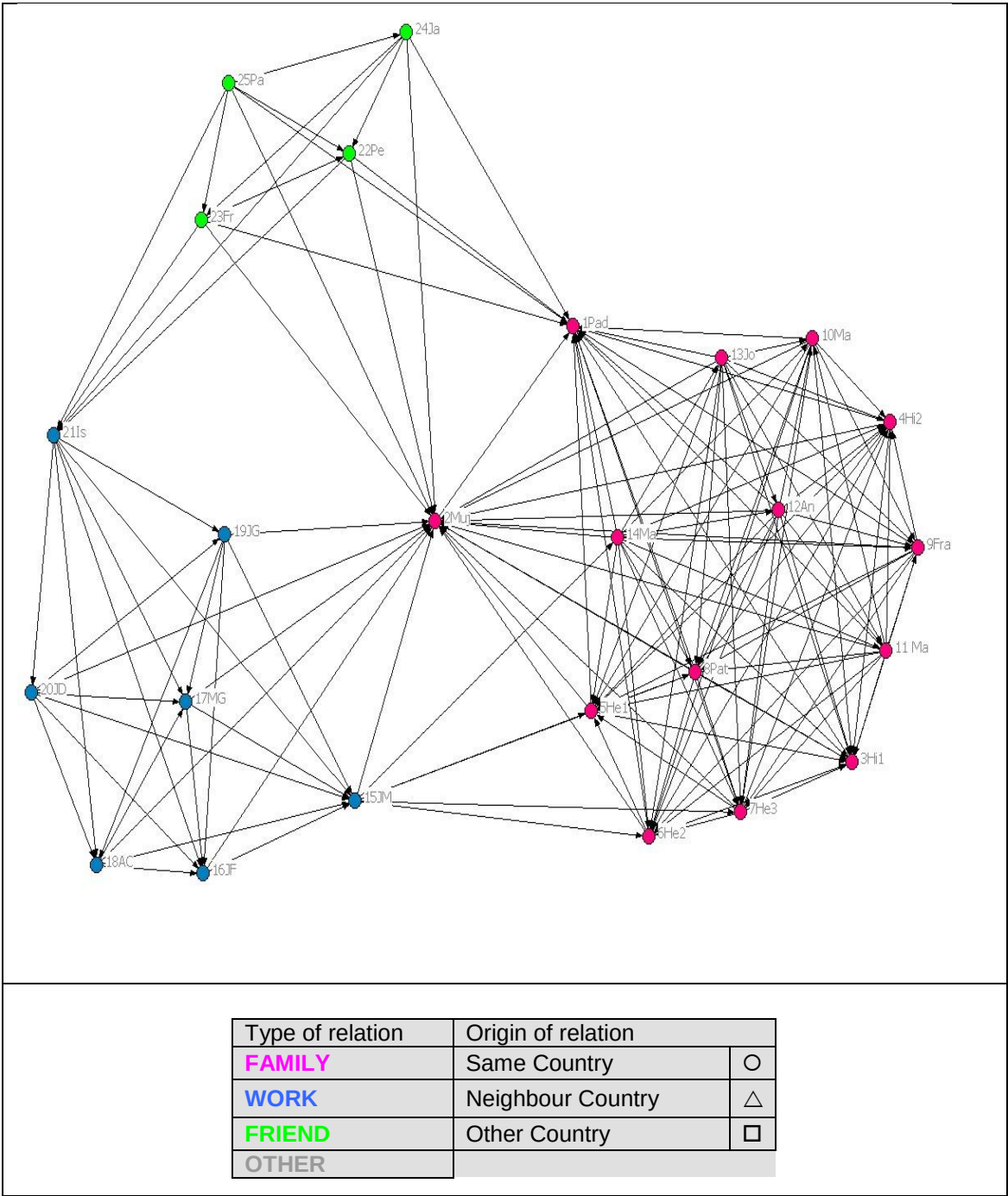




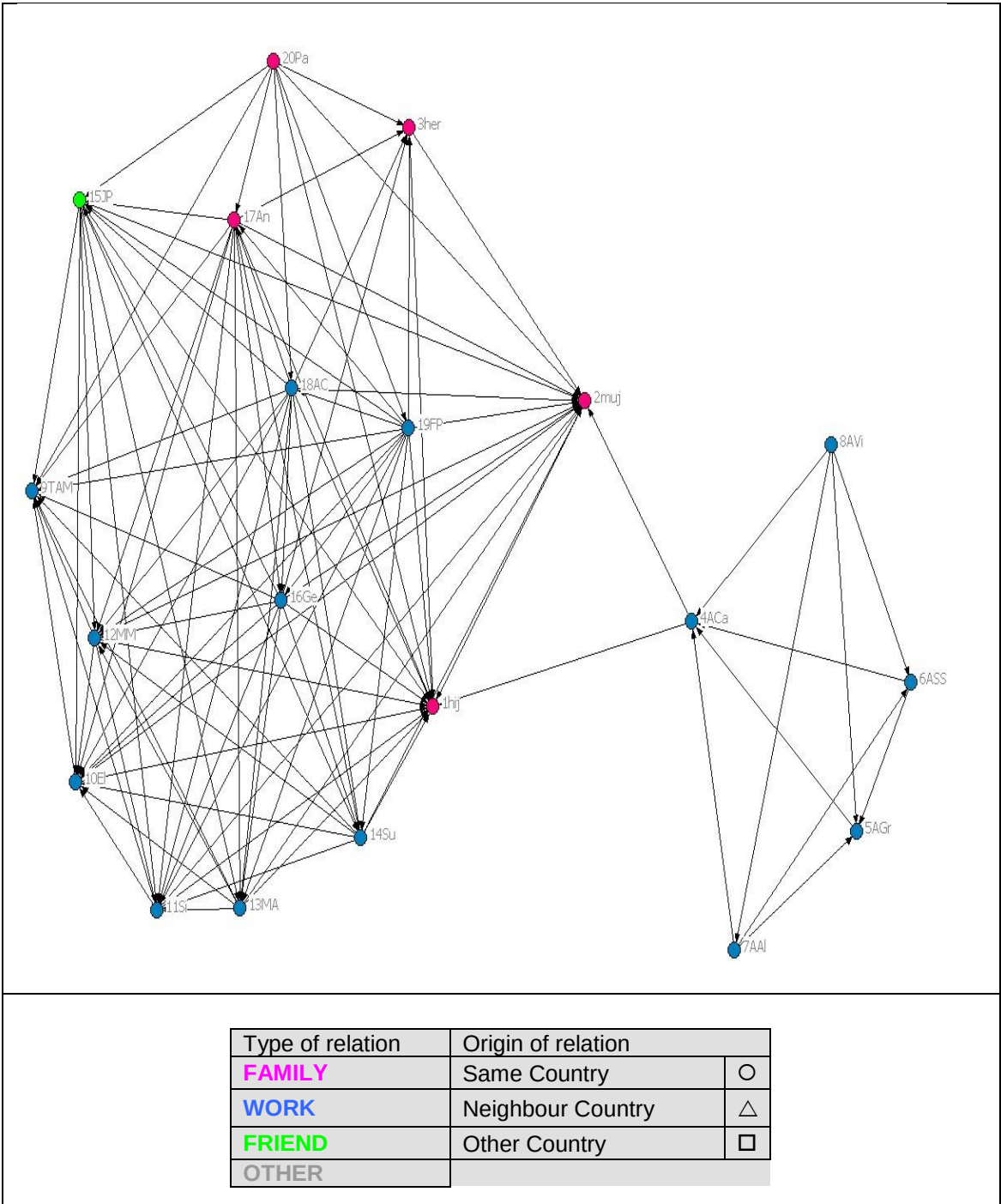
E11, Portugal, Manager, Public Institution, 2011



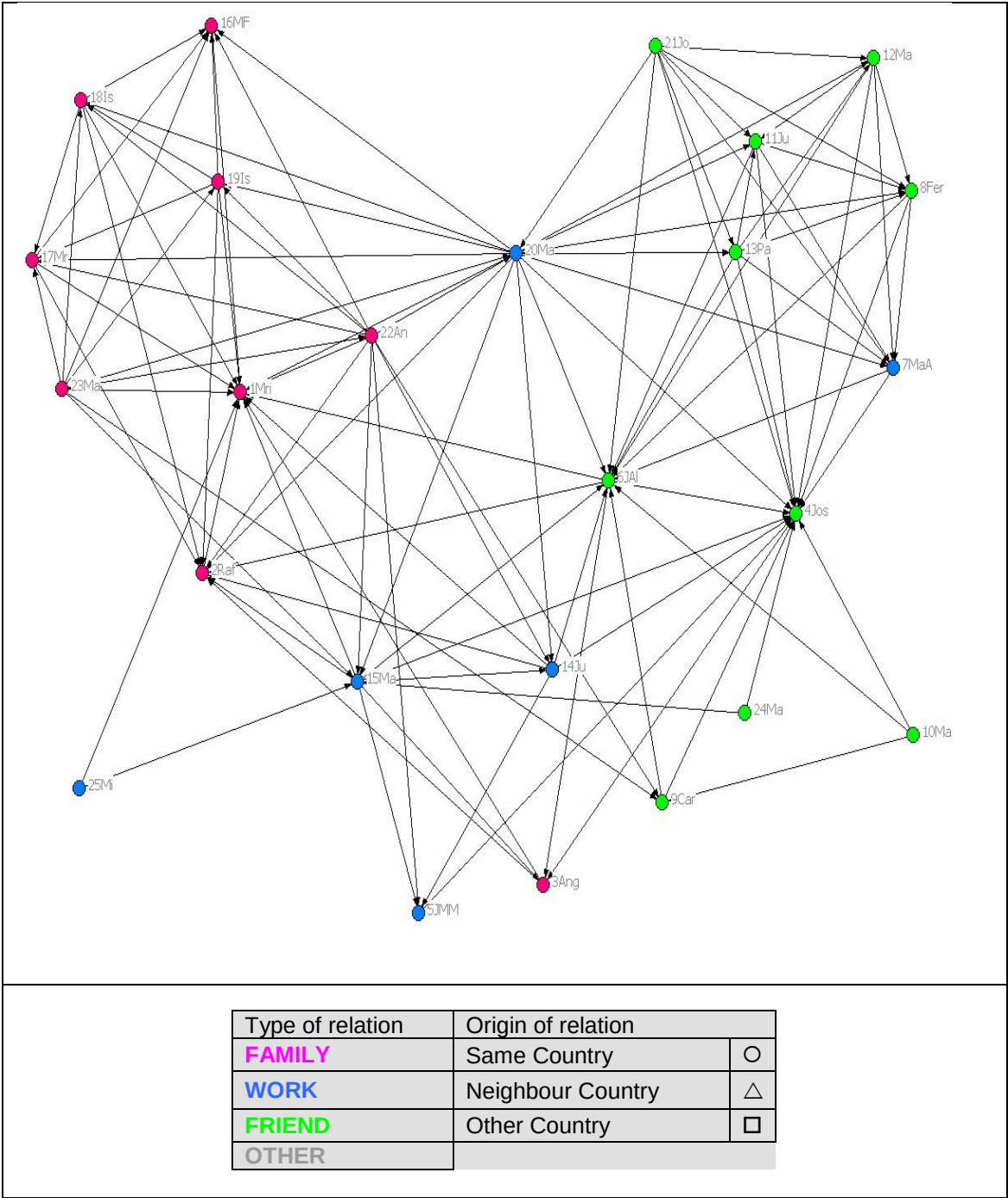




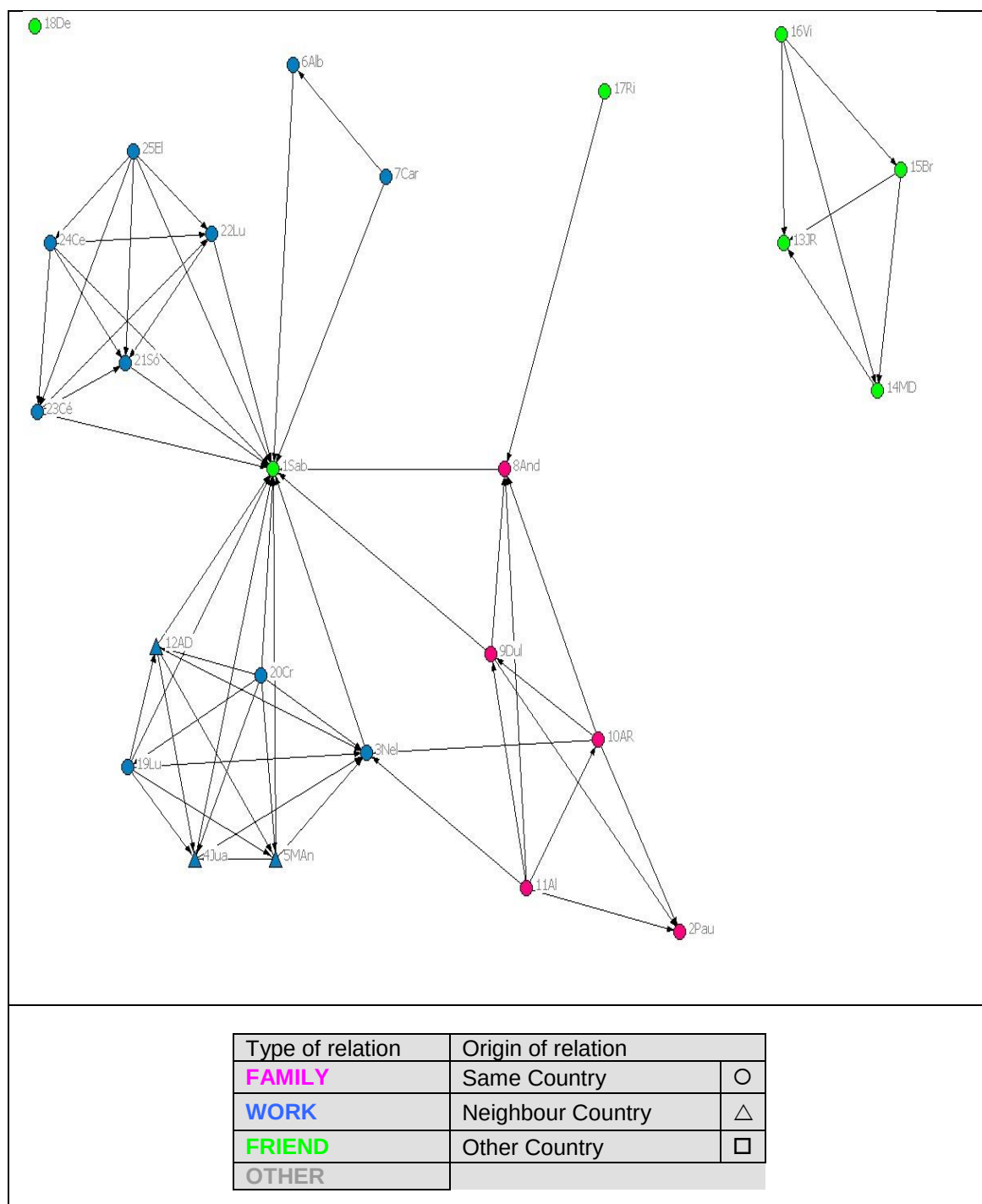
E14, Spain, Politician, Public Institution, 2011

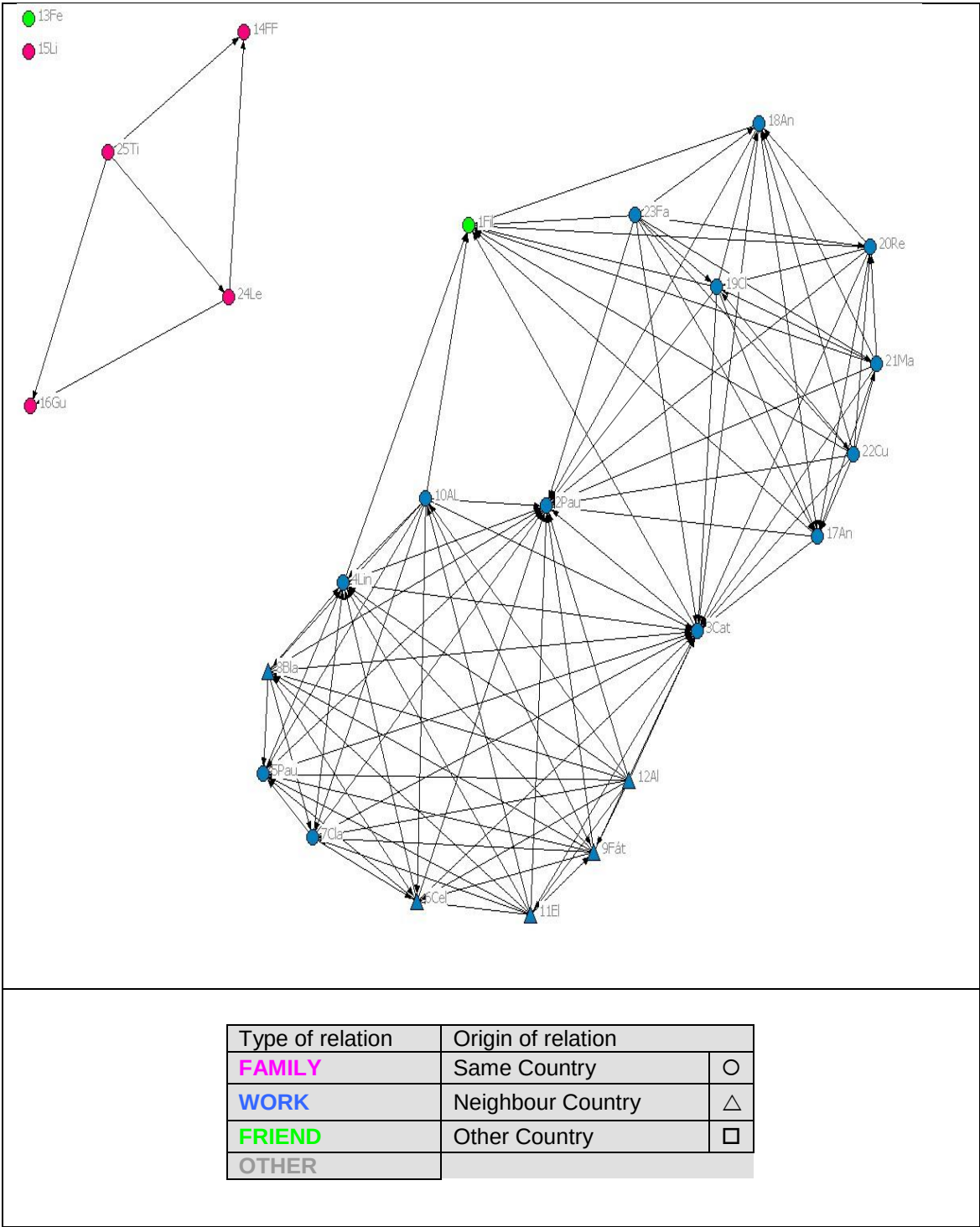


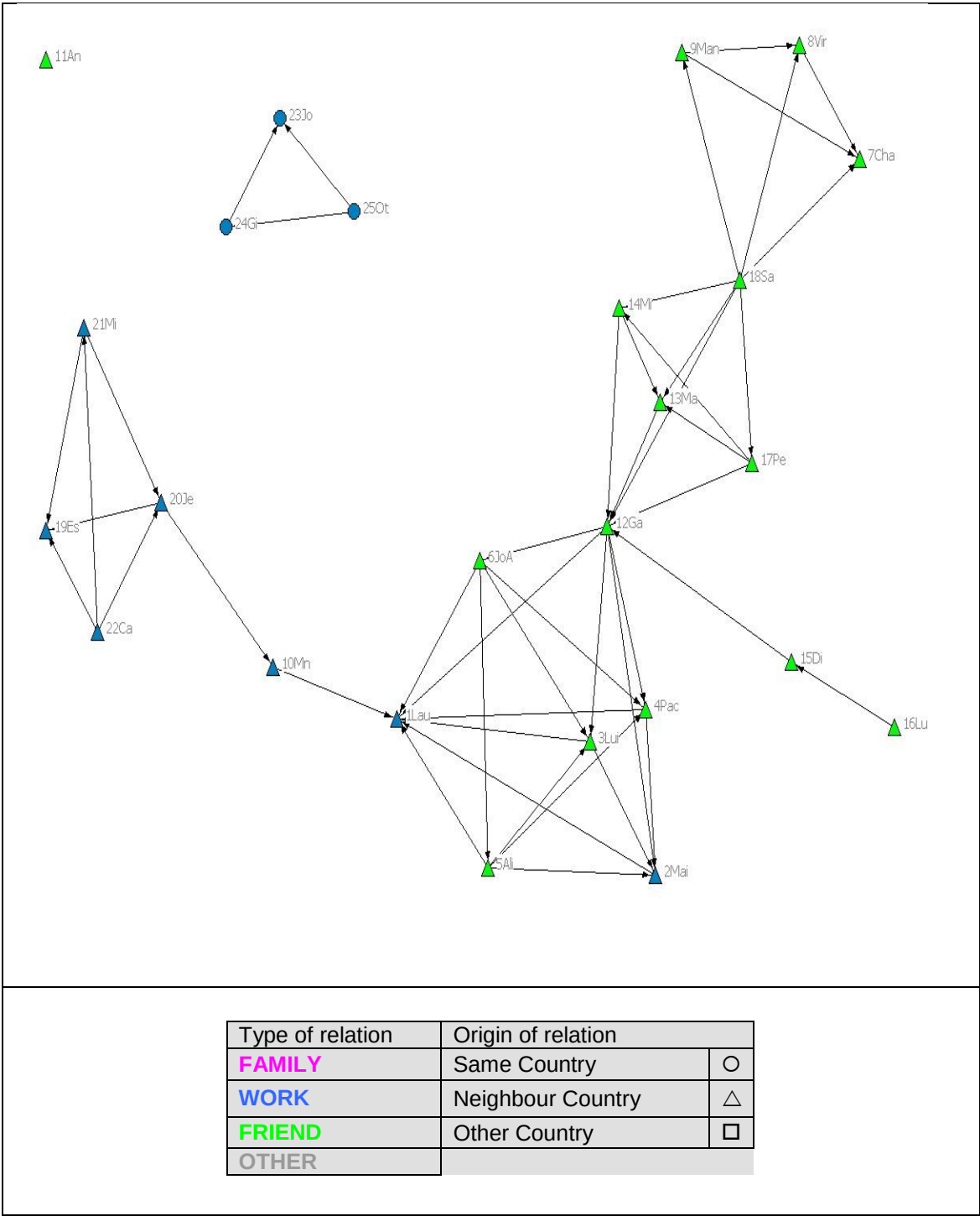
E15, Spain, Politician, Public Institution, 2011

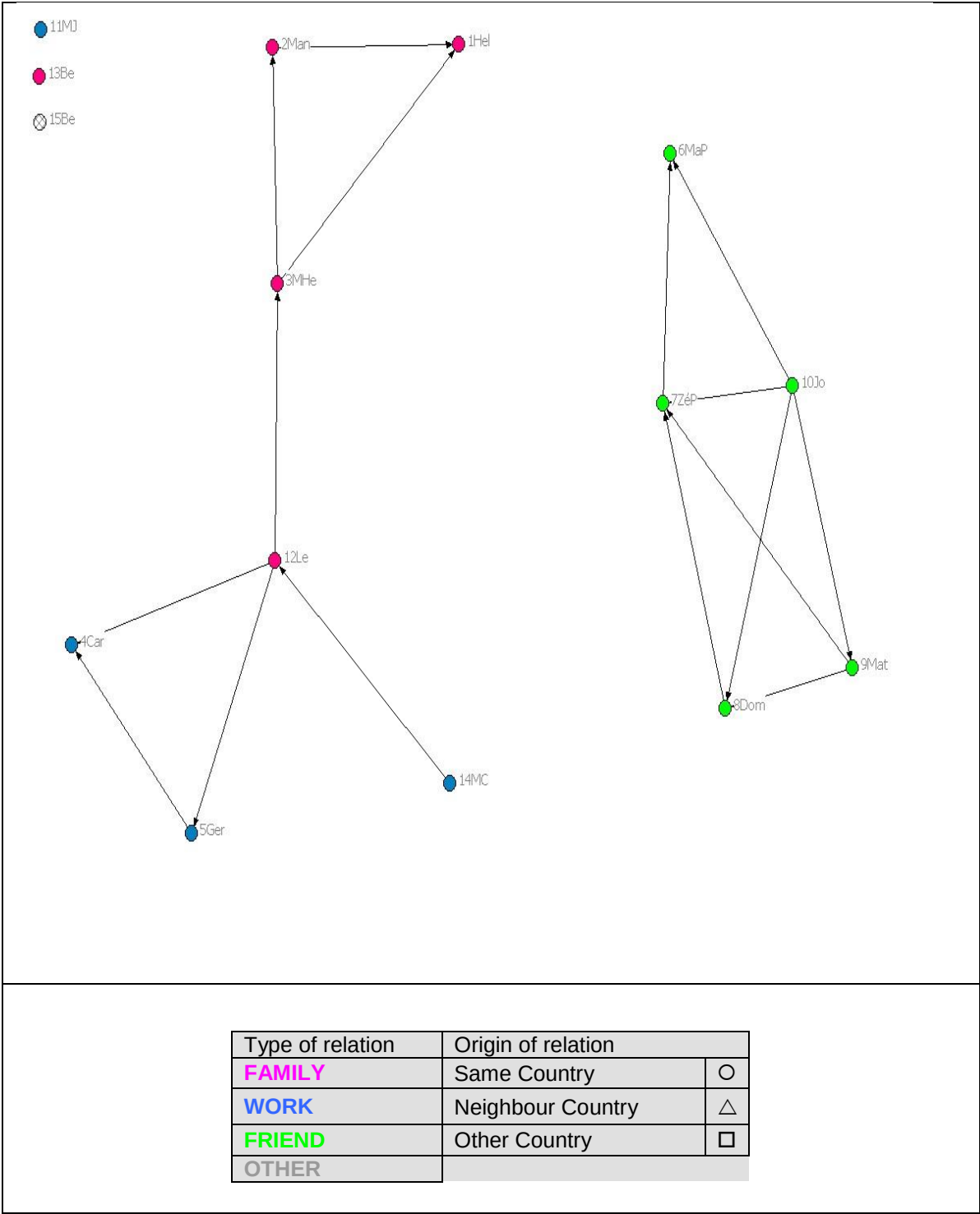


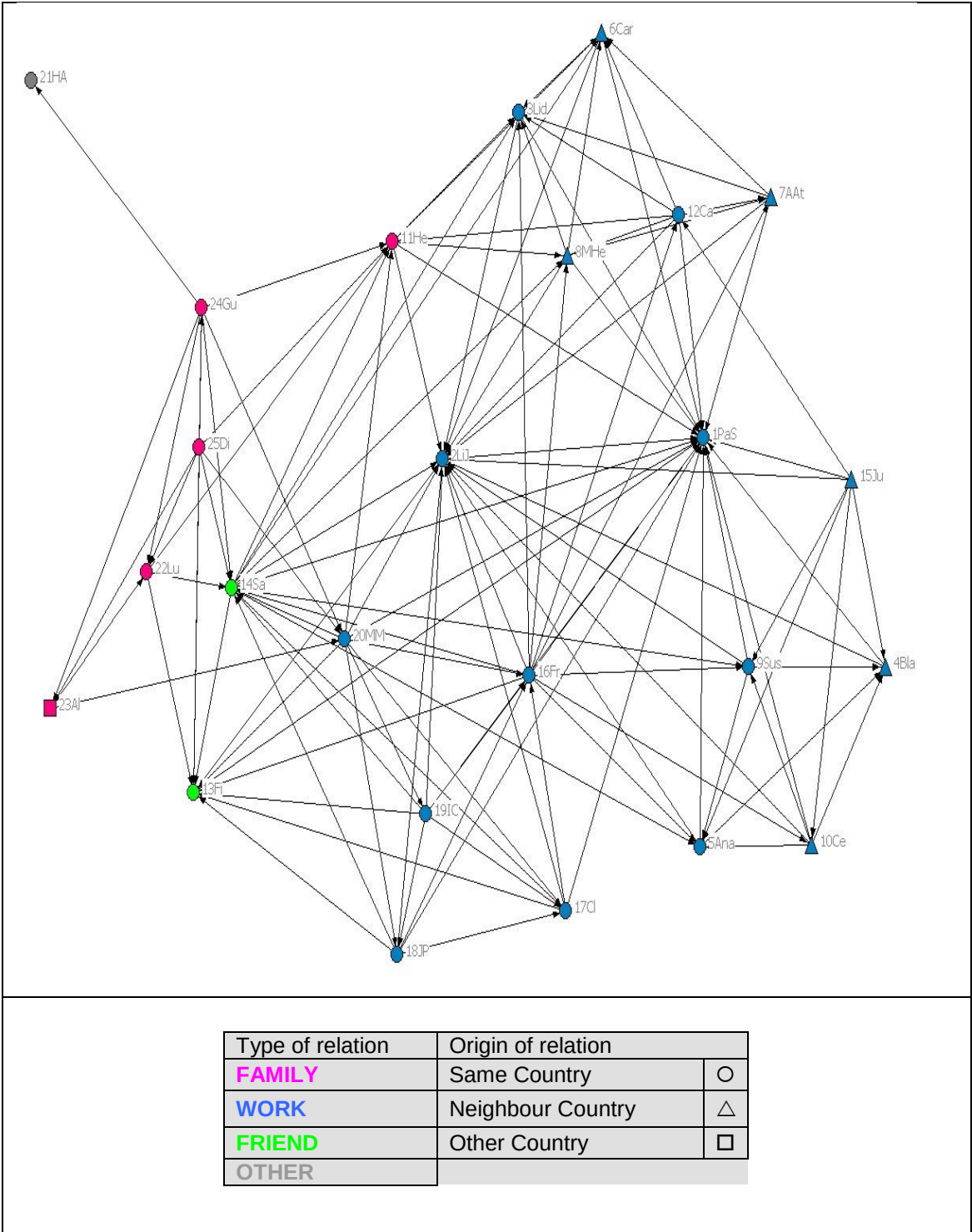
E16, Portugal, Manager, Public Institution, 2011



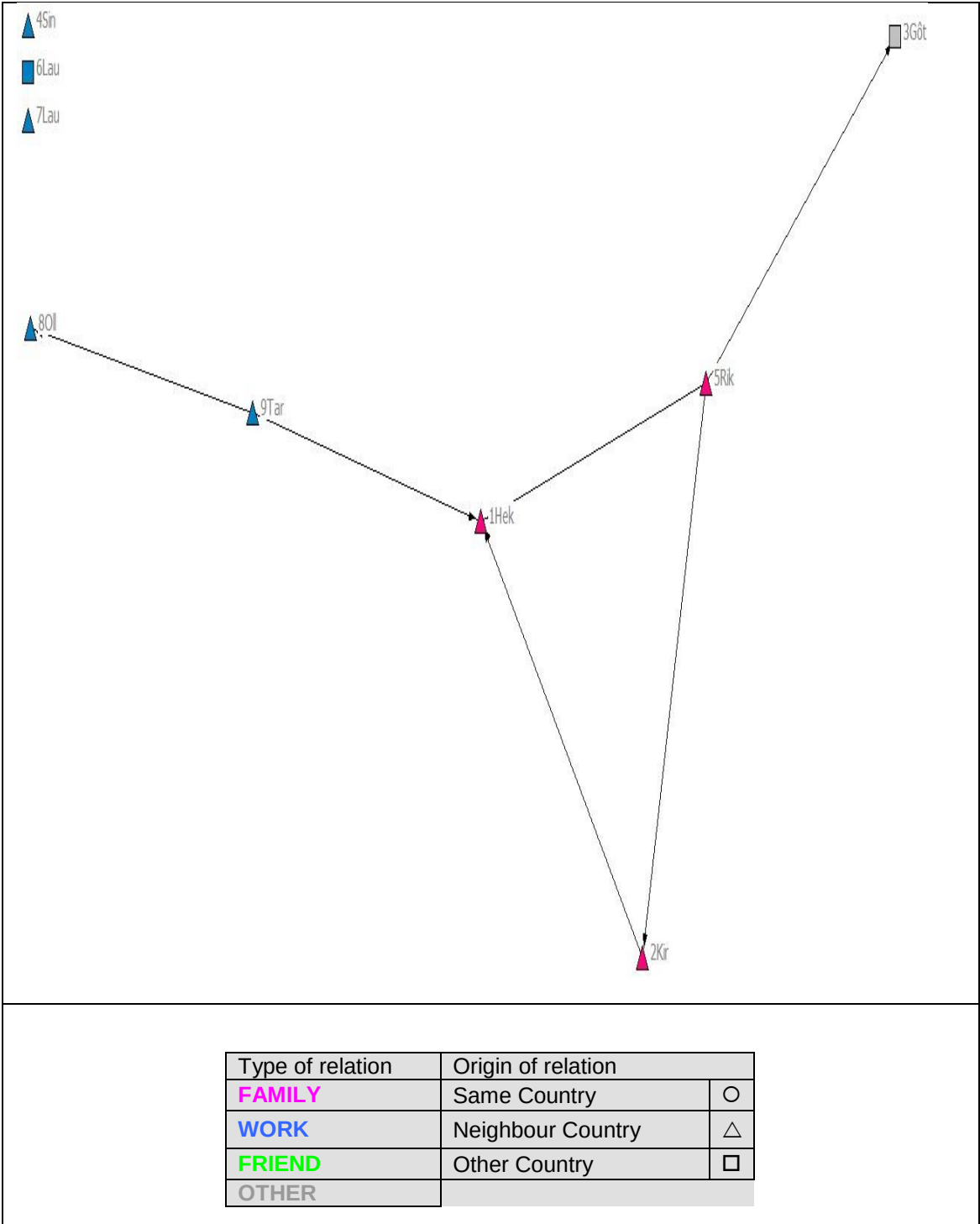


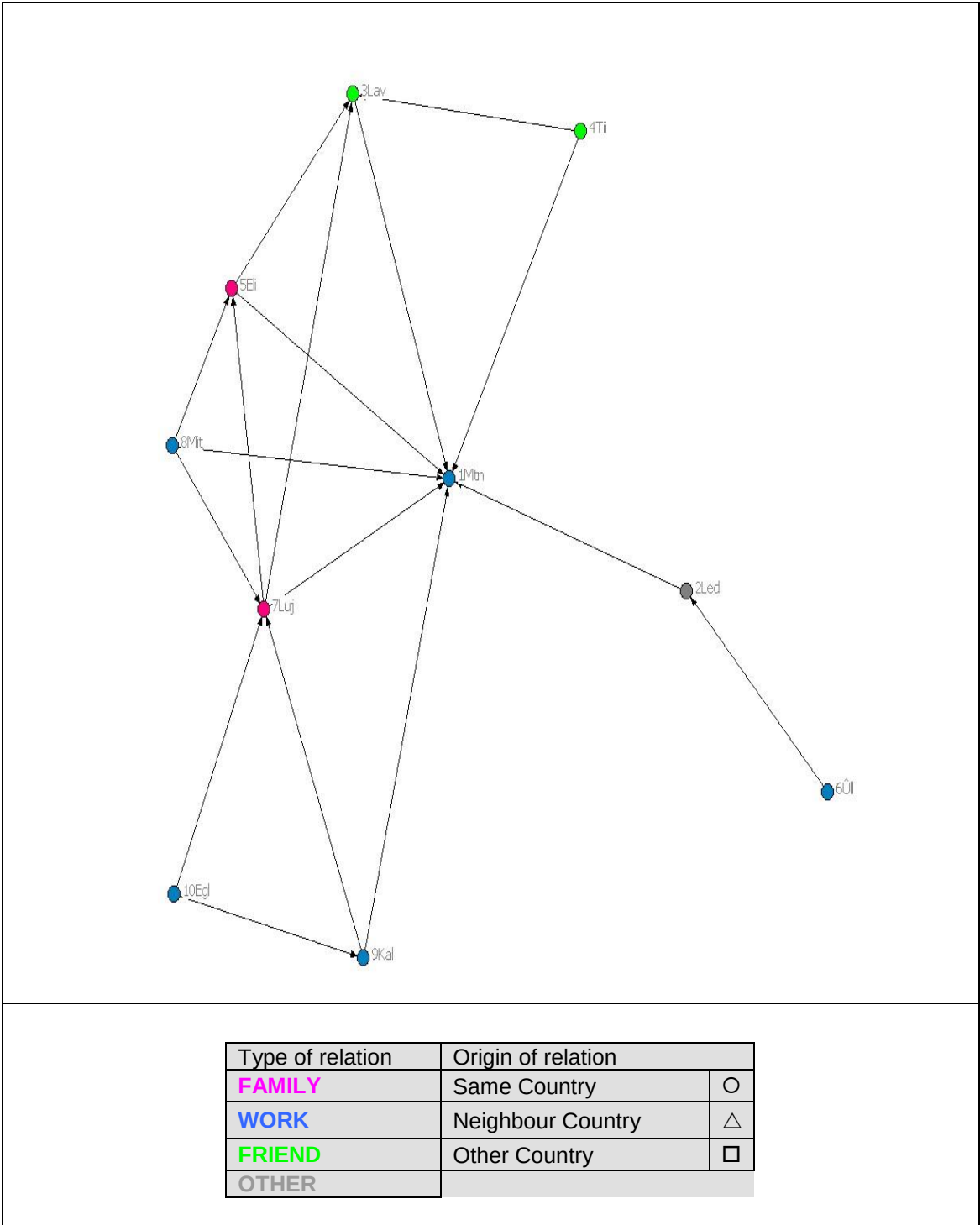




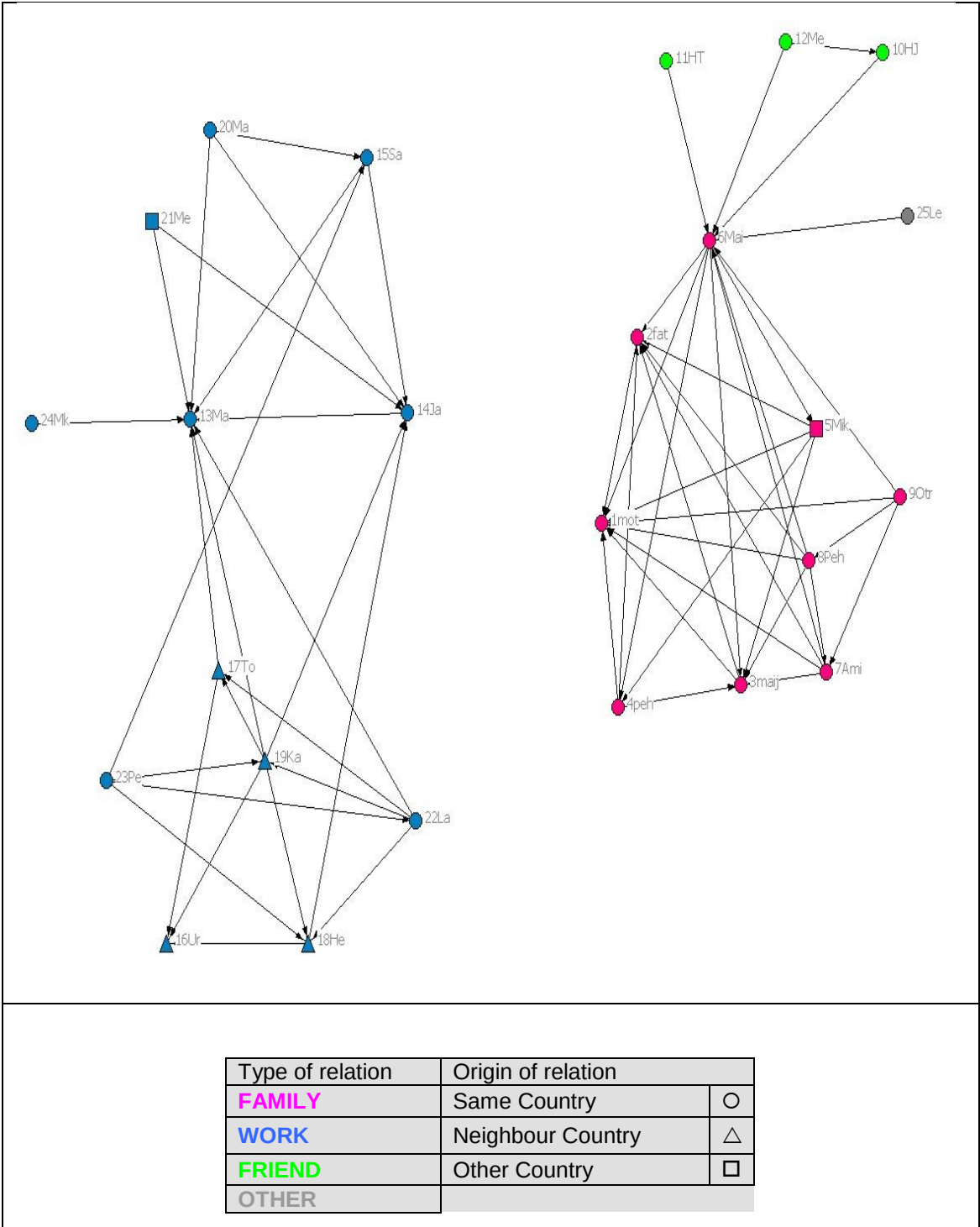


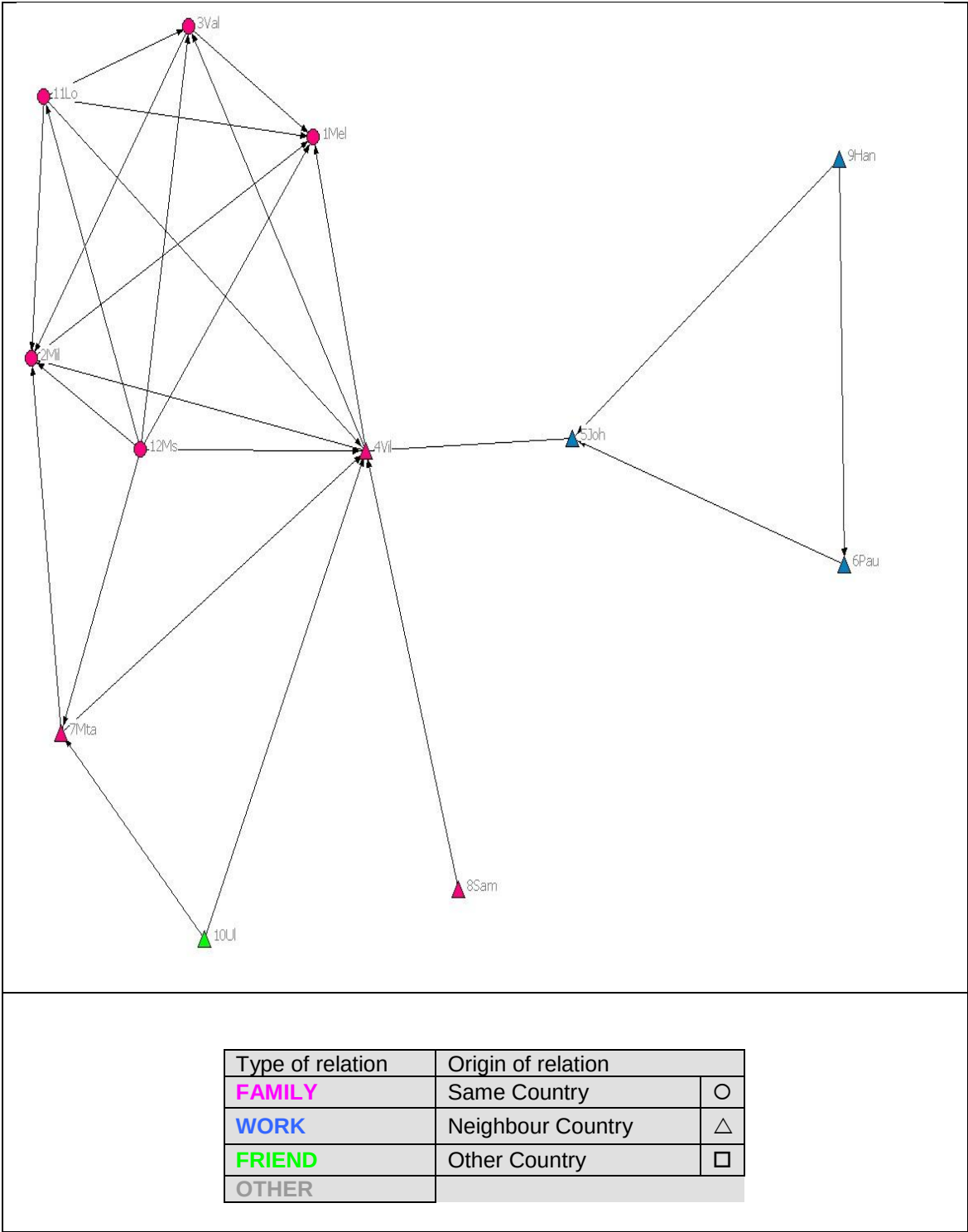
F2, Estonia, Manager, Public Institution, 2010



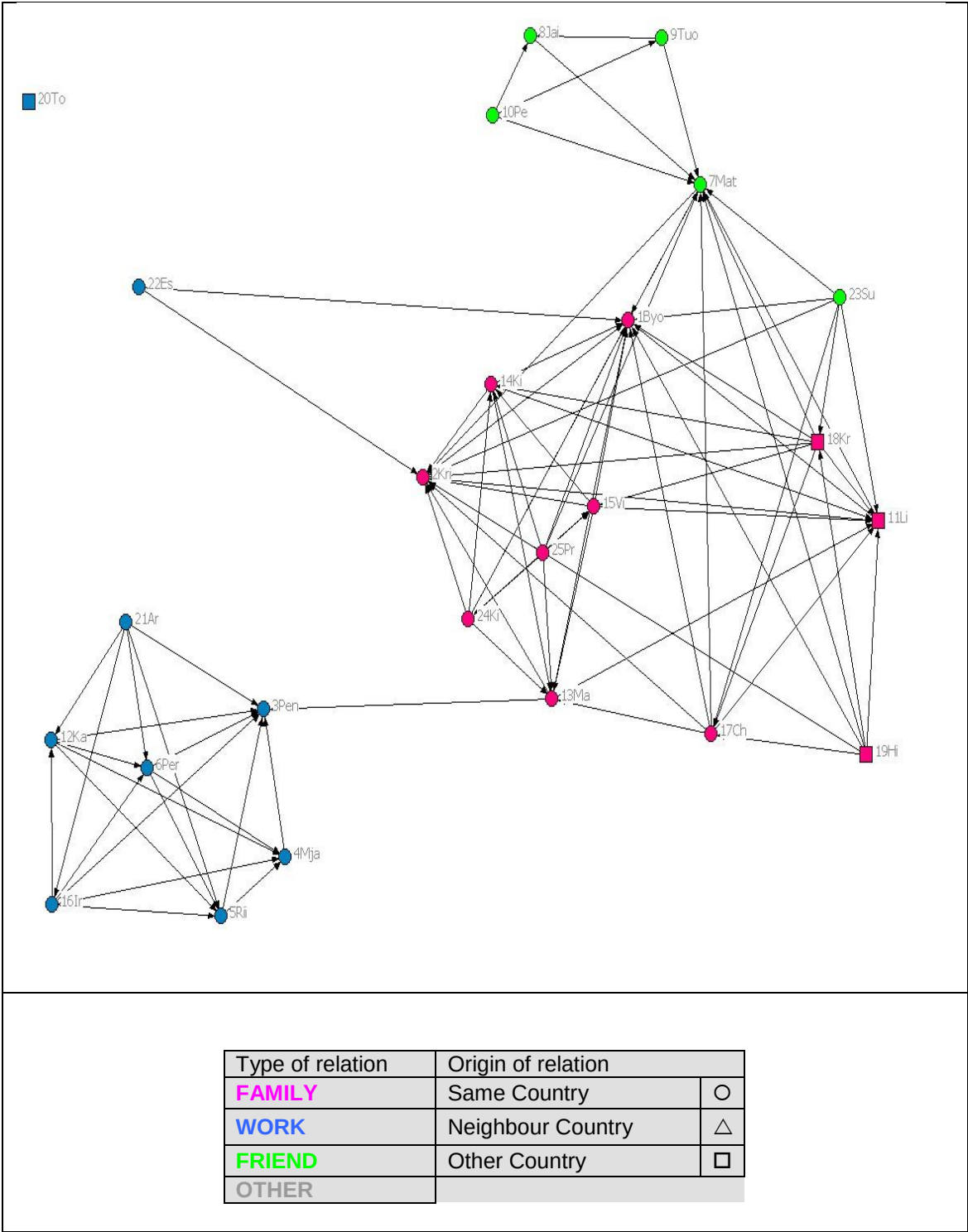


F4, Finland, Manager, Public Institution, 2010

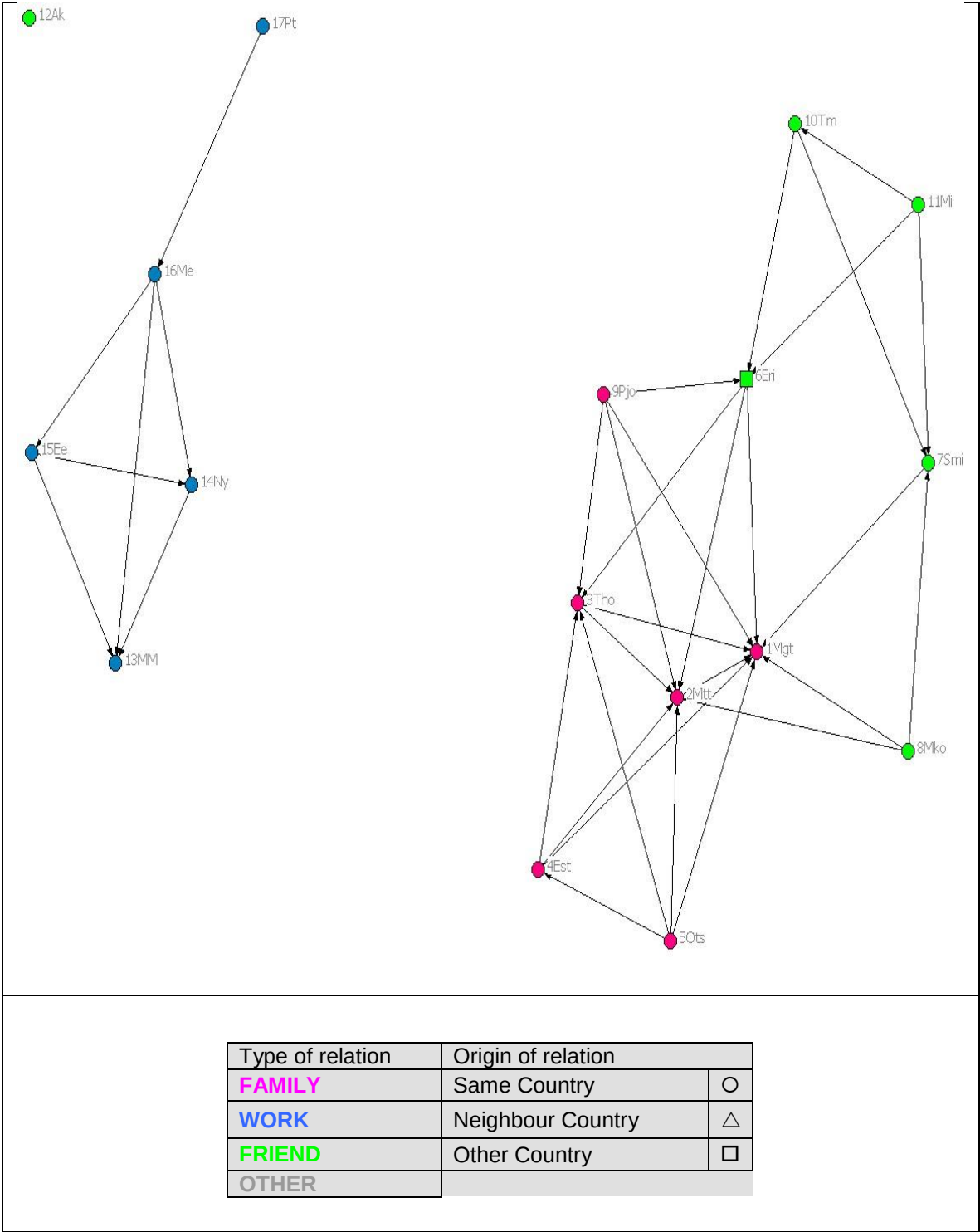




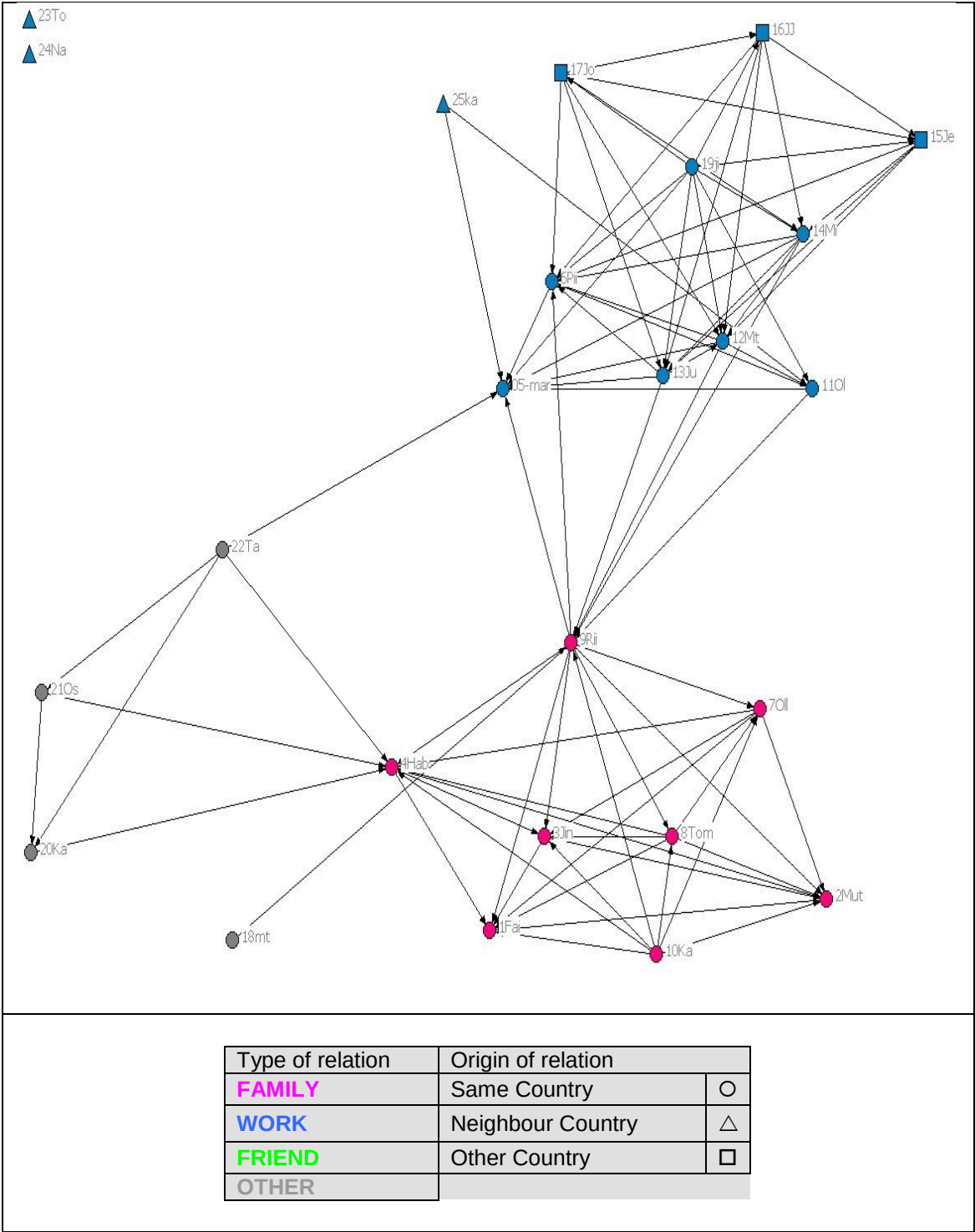
F6, Finland, Manager, Development Agency, 2010



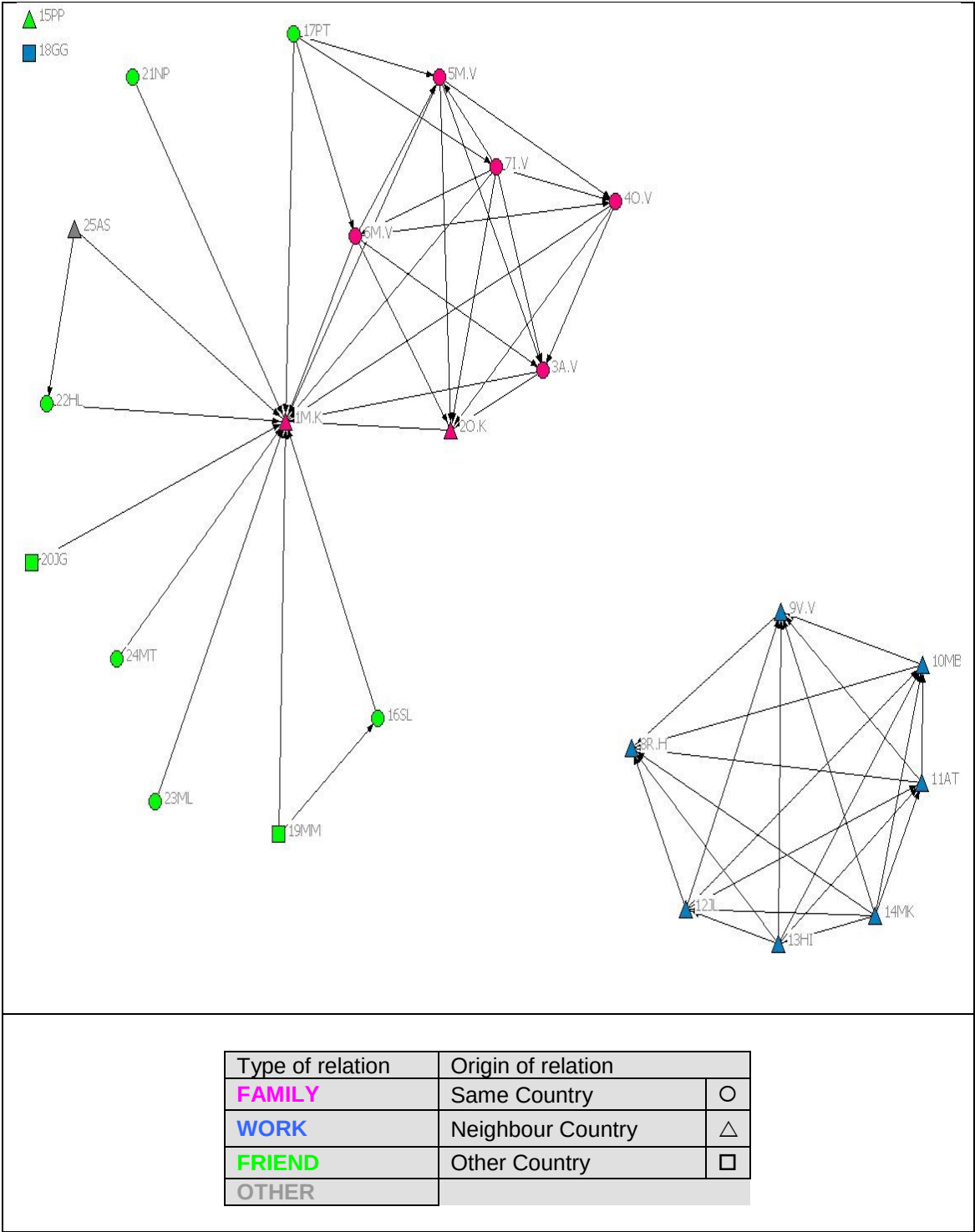
F7, Finland, Manager, Public Institution, 2010



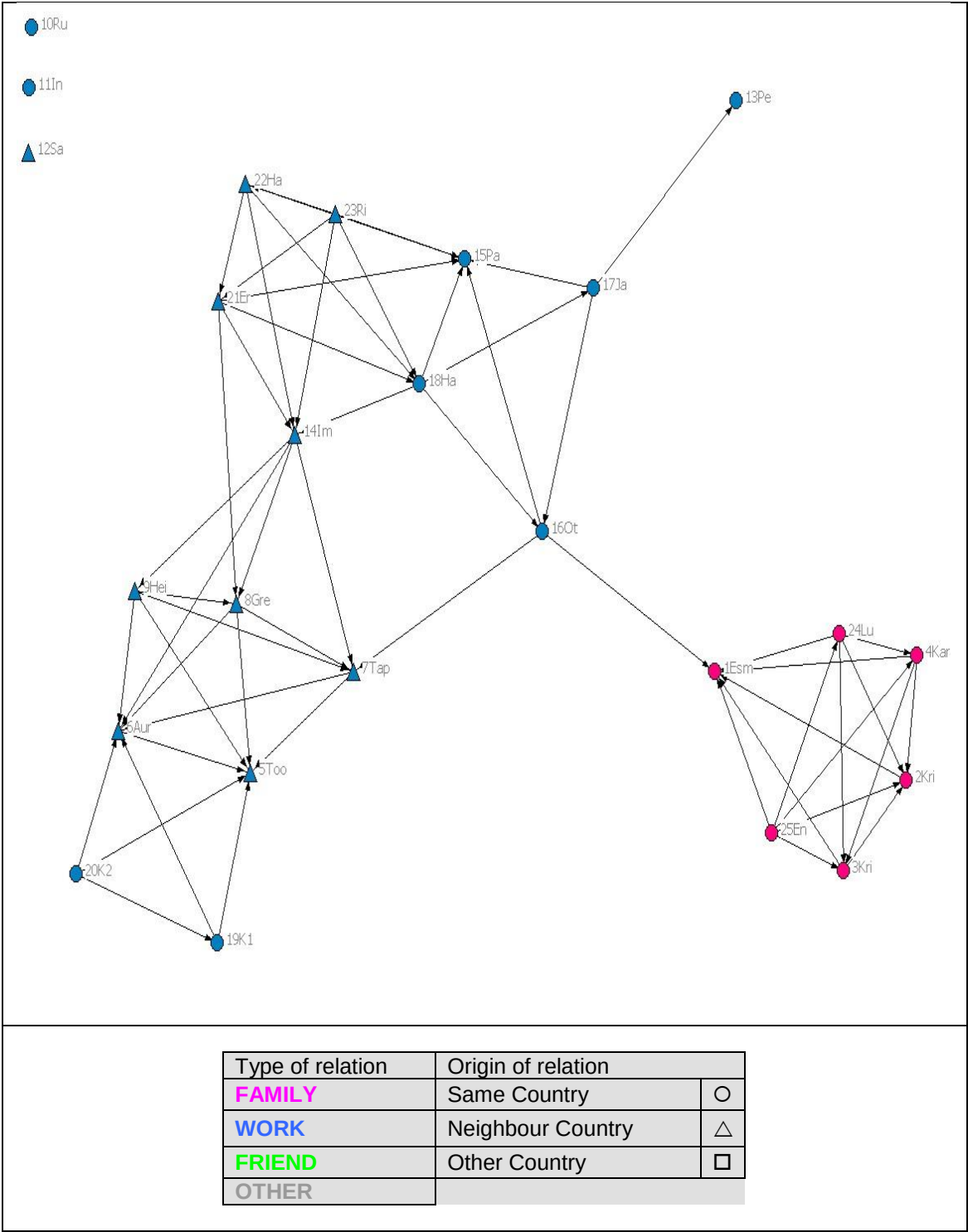
F8, Finland, Professor, University, 2010



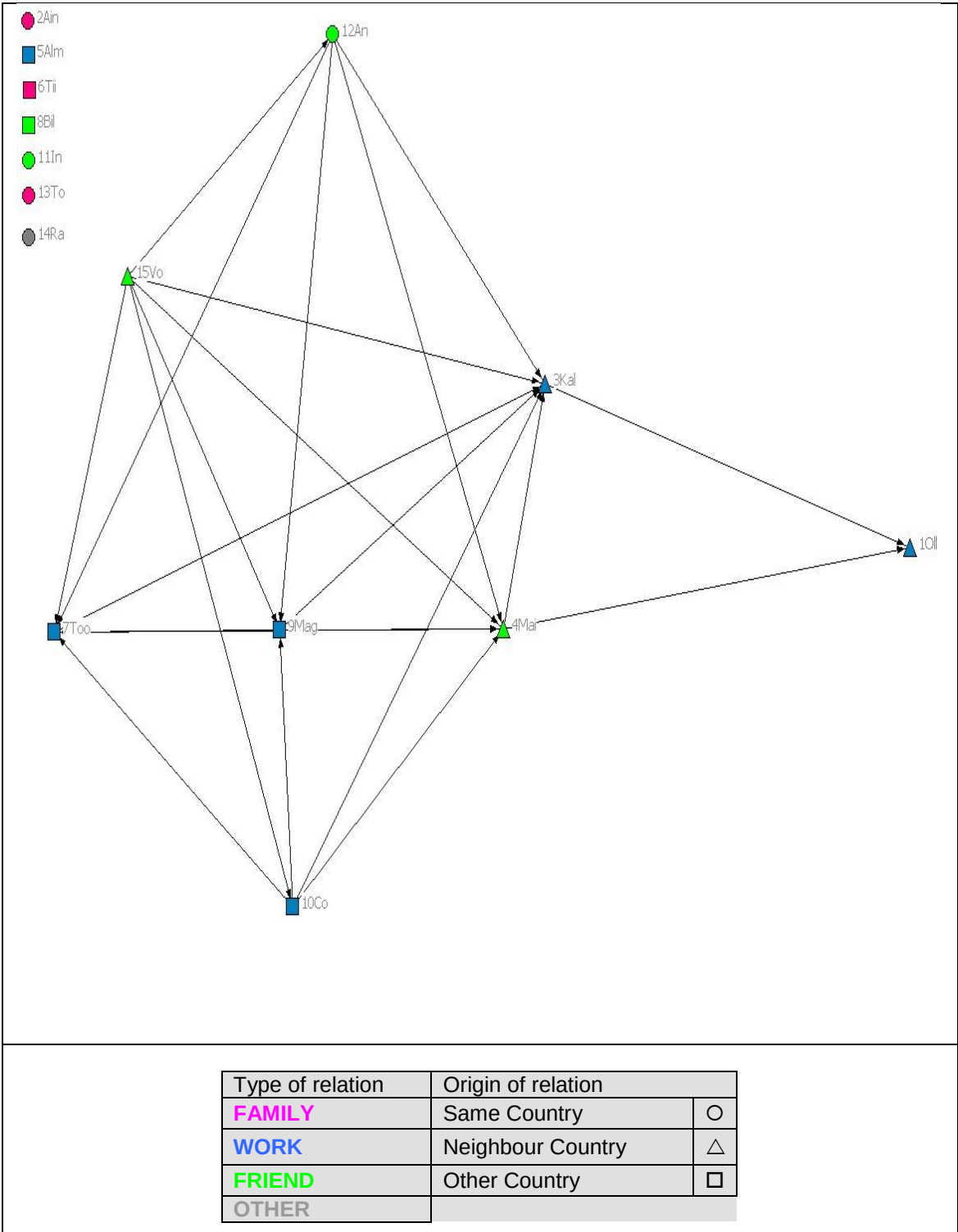
F9, Finland, Manager, Public Institution, 2010



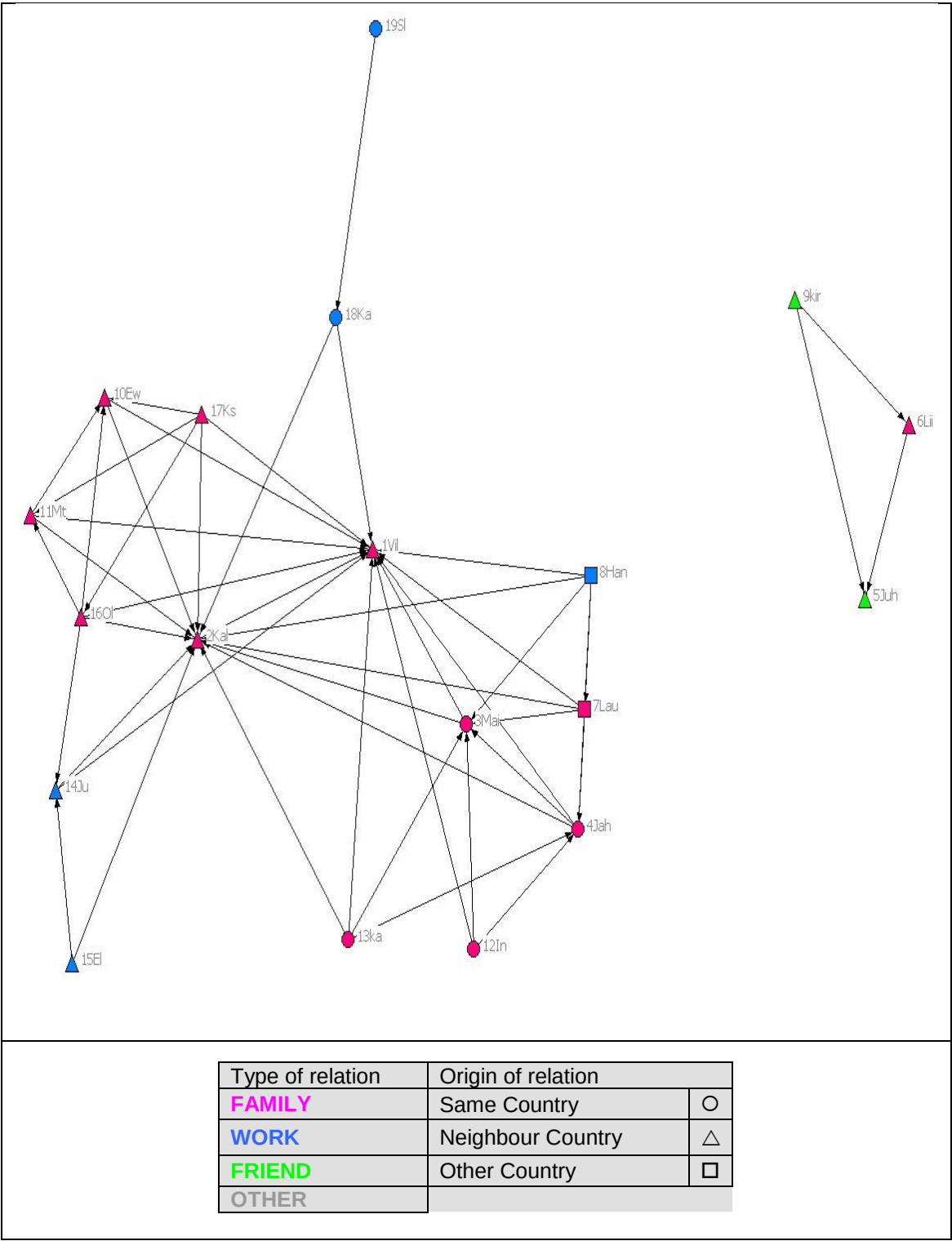
F10, Estonia, Manager, Public Institution, 2010

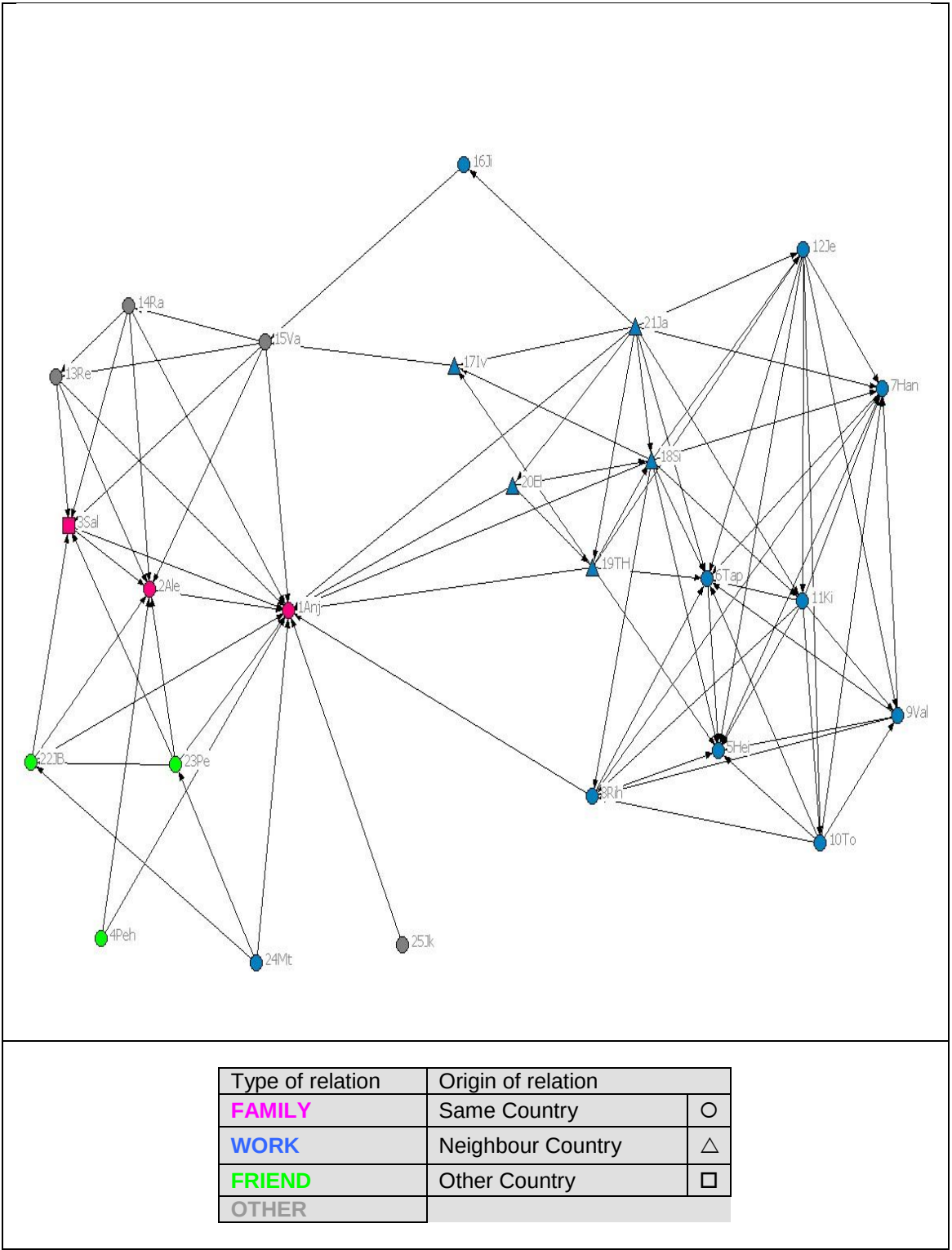


F13, Estonia, Manager, Public Institution, 2010

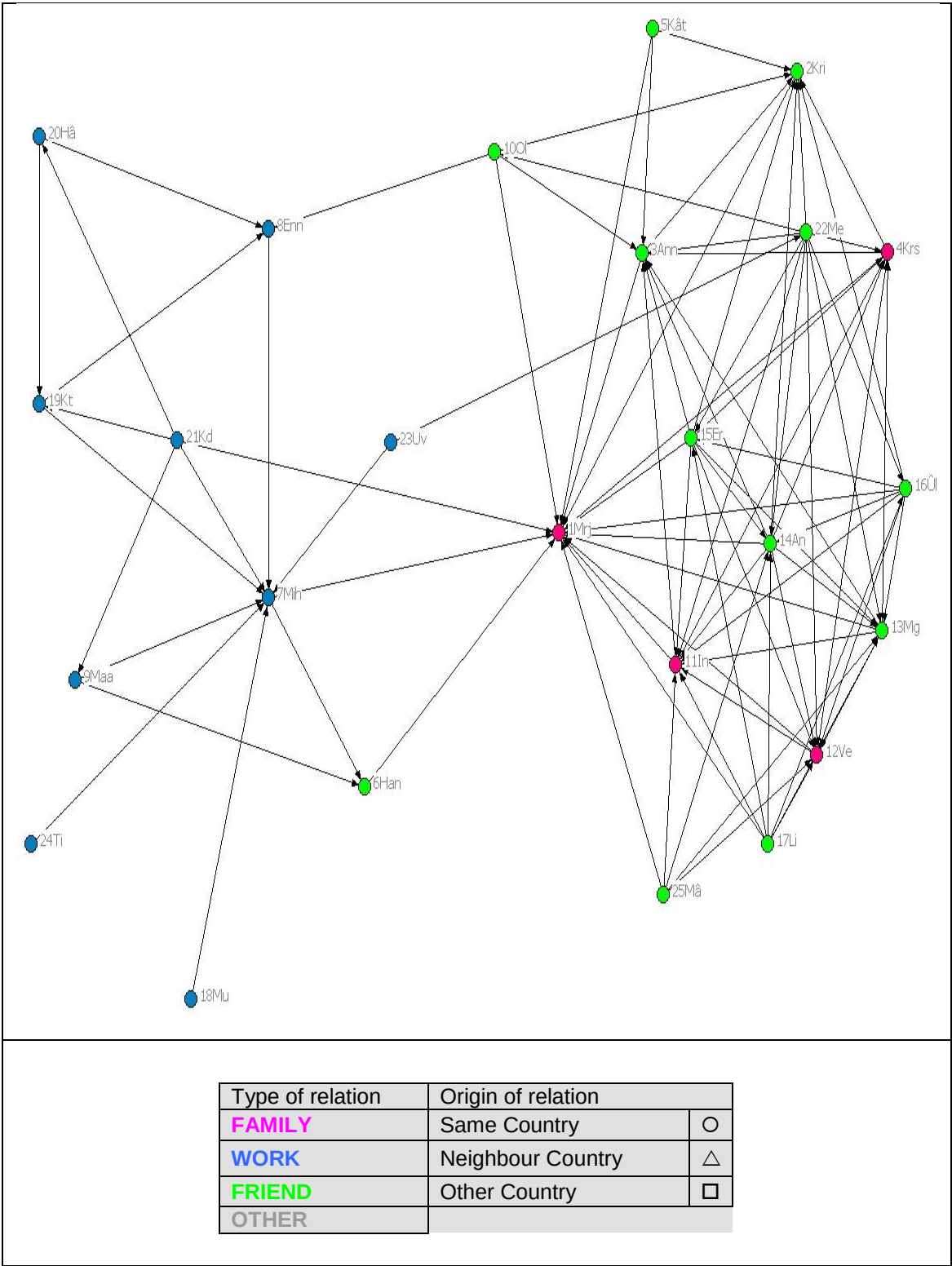


F14, Estonia, Manager, Public Institution, 2011

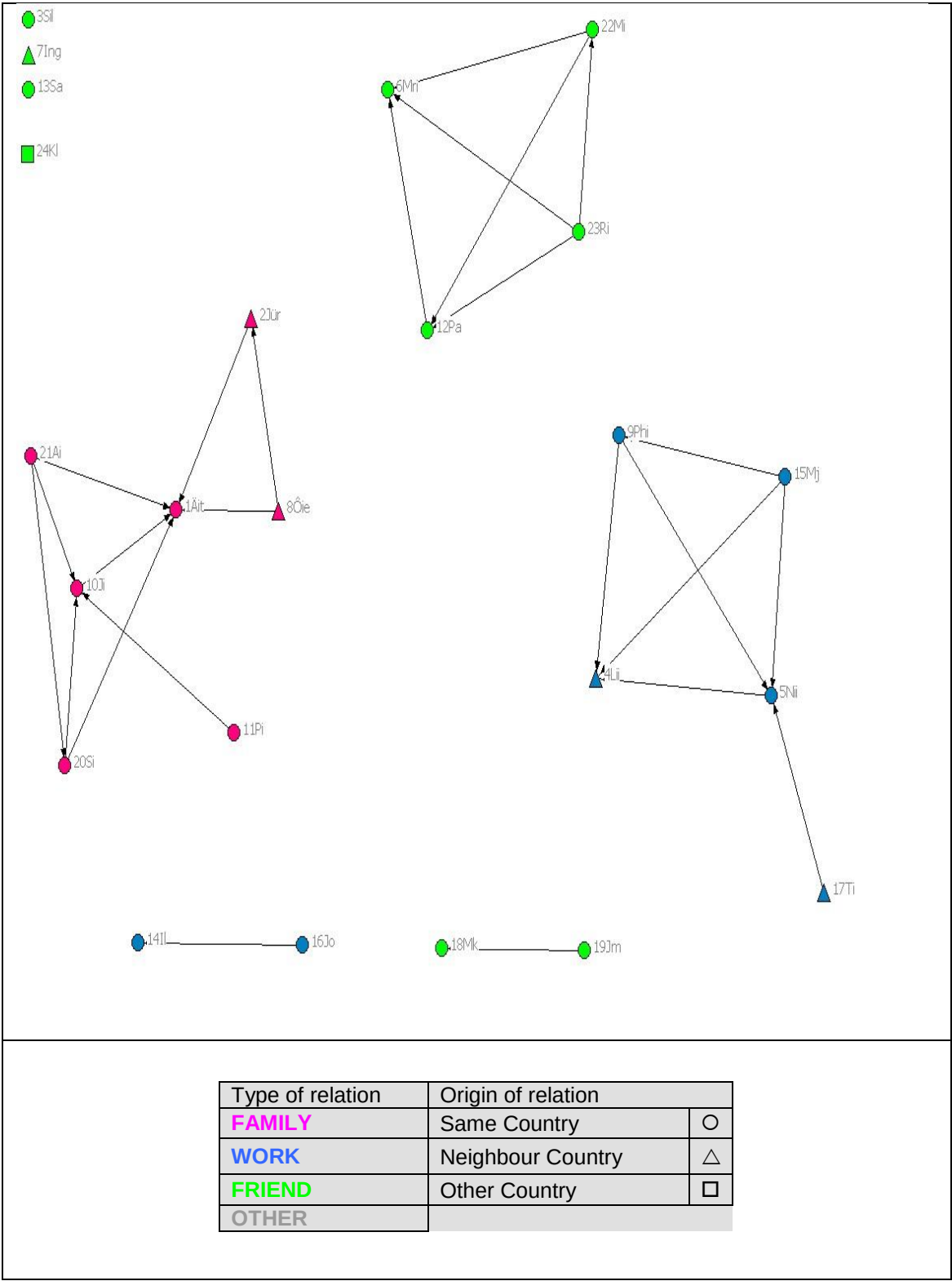




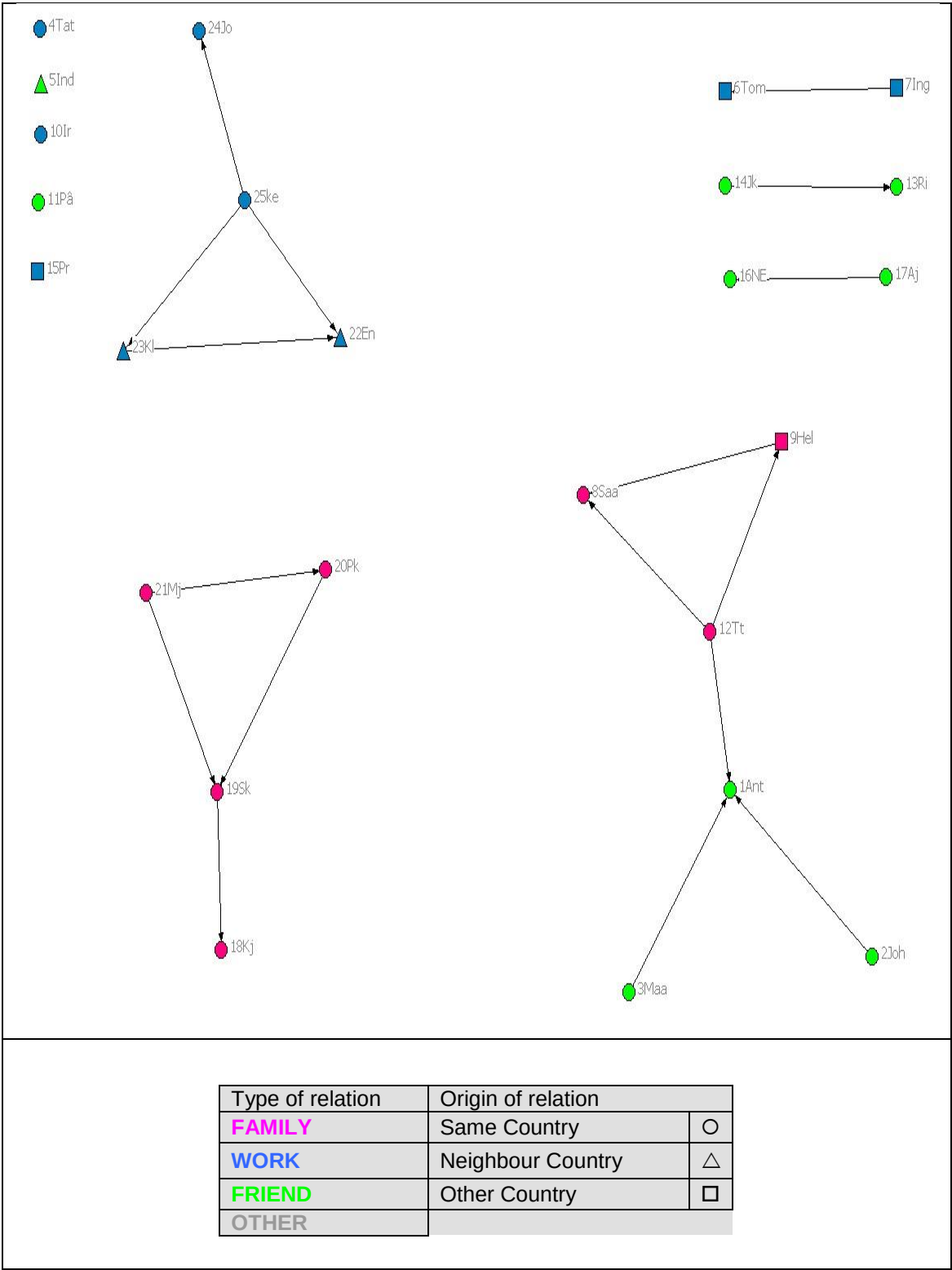
F18, Estonia, Manager, Private Company, 2011

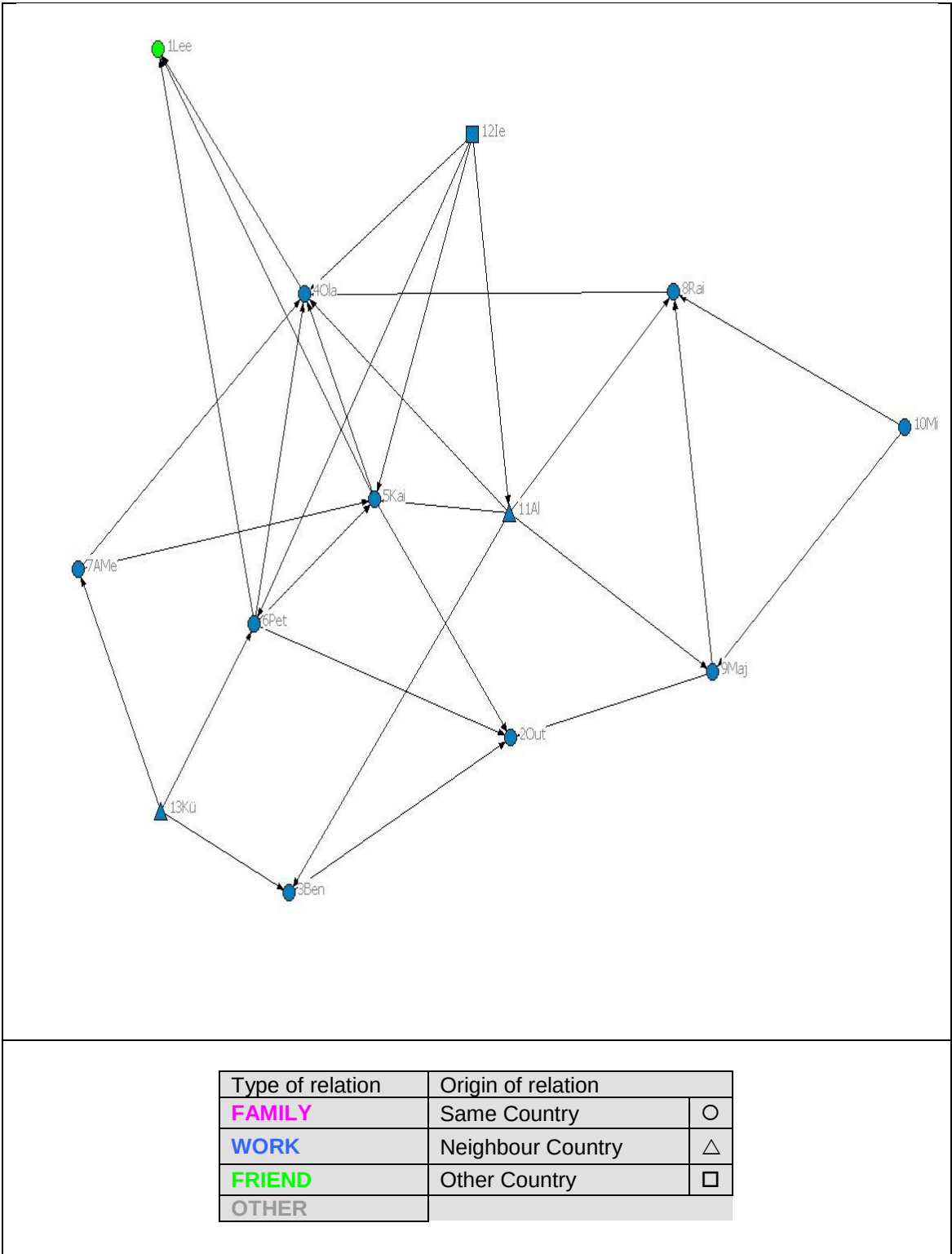


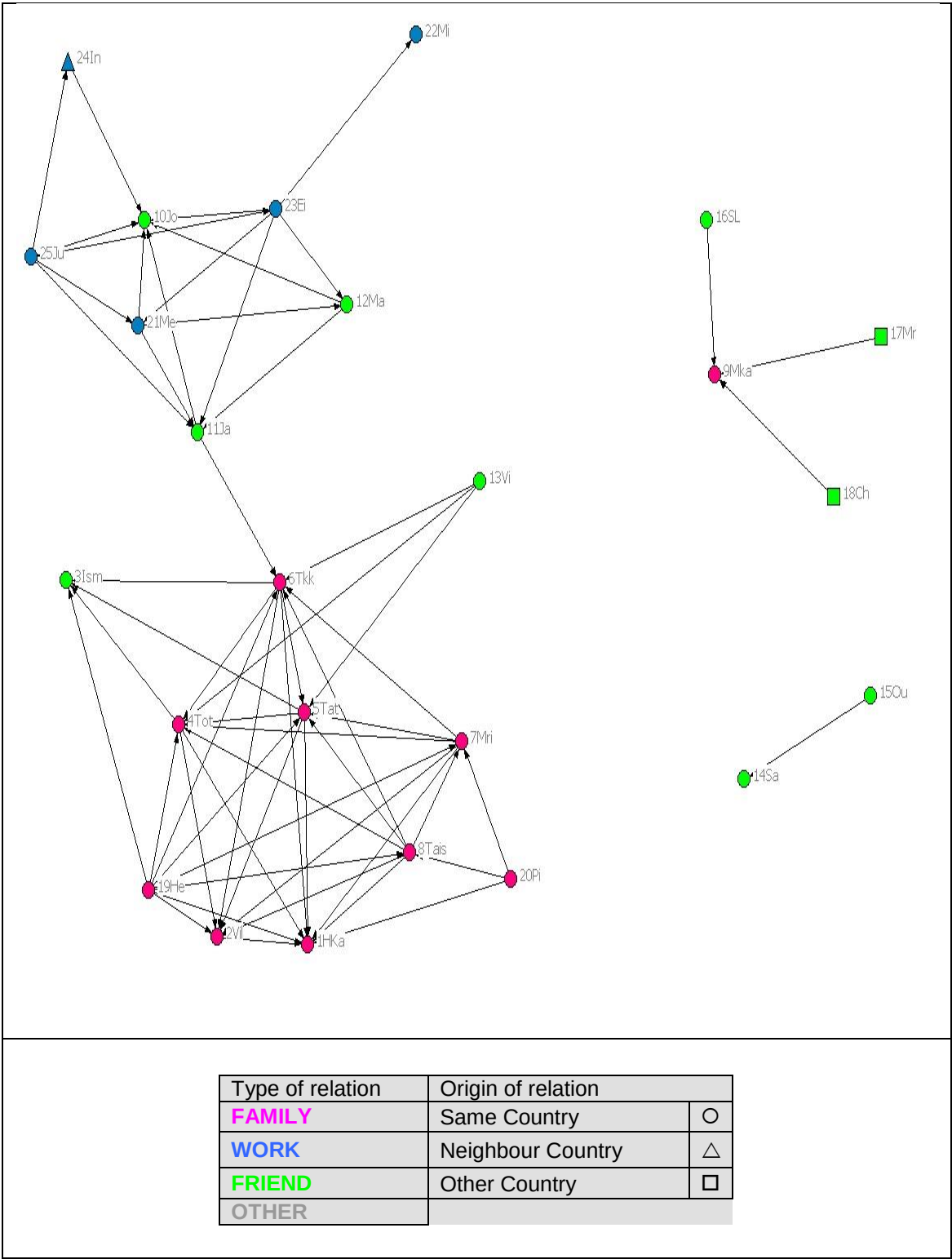
F20, Finland, Manager, Public Institution, 2011



F21, Finland, Manager, Public Institution, 2011







ANNEX 5

Institutions name and code in the crors-border regions Southern Finland-Estonia

Institution Code	Institutions Name
1U	Estonian University of Life Sciences
2L	Maidla Municipality
3C	Union of Rural Municipalities of Setomaa
4F	Lake Vortsjarv Foundation
5B	RG Evans Associates Estonia
6U	University of Helsinki Ruralia Institute
7O	The Assosiation of Water and Environment of Western Uusimaa
8A	Development Association Sepra
9L	Narva-Jõesuu Town Government
10L	City of Imatra, Finland
11P	Narva Vocational training Centre
12U	Saimaa University of Applied Sciences
13U	Tallinn Pedagogical College (TPC)
14U	Diaconia University of Applied Sciences (DIAK)
15U	Tallinn Science Park Tehnopol
16L	Tallinn City Enterprise Board
17O	Association of Mechatronics MECA
18U	Tallinn University of Technology
19A	Machine Technology Centre Turku (KTK)
20P	Centre for Metrology and Accreditation (MIKES)
21A	Federation of Estonian Engineering Industry (EML)
22U	Tallinn University of Technology
23U	Aalto University Foundation, Aalto School of Economics, Small Business Center
24P	Estonian Development Fund
25P	Enterprise Estonia
26B	BDA Consulting OÜ
27A	AS TechnopolisÜlemiste
28P	State Forest Management Centre
29B	Forestry Developent Centre Tapio
30A	Work Efficiency Institute (TTS)
31P	NPA Helsinki-Tallinn Euregio
32L	City of Helsinki
33L	Tallinn Planning Department
34L	Tallinn Transport Department
35L	Tallinn Enterprise Department
36L	Tallinn City Office
37U	Tallinn University, Institute for Futures Studies
38F	Aalto University Foundation
39U	University of Turku
40R	Uusimaa Regional Council
41C	Harju County Government
42U	Estonian Art Academy

43U	Tartu University, Institute of Ecology and Earth Sciences, Department of Geography
44L	Viimsi Municipality
45L	Municipality of Padise
46L	City of Vantaa
47O	The Centre for Development Programs EMI-ECO, Tallinn
48P	Lahti Region Environmental Service
49P	MTT Agrifood Research, Finland (Jokioinen)
50P	Finnish Environmental Agency, Research Department/Research Programme for Integrated River Basin Management
51O	WWF-Finland
52U	Turku University of Applied Sciences (TUAS)
53U	Estonian University of Life Sciences, Institute of Forestry and Rural Engineering, Department of Water Management
54O	Estonian Fund for Nature (ELF)
55P	Kotka Maritime Research Association
56U	University of Helsinki, Department of Environmental Sciences
57U	University of Tartu, Estonian Marine Institute
58P	Centre for Economic Development, Transport and the Environment for Southeast Finland
59P	Finnish Environment Institute
60U	Aalto University, School of Science and Technology
61P	Omnia, The Joint Authority of Education in Espoo Region
62U	Tallinn Service School
63P	Kuressaare Regional Training Centre
64P	Intermunicipal Federation of Vocational Education in Western Uusimaa / Education Centre of Western Uusimaa
65P	Kehtna School of Economy and Technology
66P	Tallinn Construction School
67P	Vantaa Vocational College Varia
68L	City of Turku, Turku Touring
69F	Turku 2011 Foundation
70L	Culture Heritage Department, Tallinn city
71F	Tallinn 2011 Foundation
72A	Kouvola Innovation Ltd.
73B	Estonian Building Centre Ltd.
74F	Building Information Foundation RTS / Building Information Ltd,
75B	InterFin Development Ltd.
76L	City of Helsinki/Environment Centre
77L	Services for Children and Adolescents, City of Kotka
78L	Research and Development Services, City of Hämeenlinna
79L	Tallinn City Government Environment Department
80L	Tartu City Government
81L	Rakvere city government
82U	University of Helsinki, Department of Agrotechnology
83P	MTT Agrifood Research Finland, Agricultural Engineering Research (MTT/VAKOLA)
84P	MTT Agrifood Research / MTT Technology Research, Finland/Vihti
85U	TUT, Tallinn University of Technology, Department of Thermal

	Engineering
86P	SEI-T, Stockholm Environment Institute Tallinn Centre, SEI-Tallinn
87P	HSY, Helsinki Region Environmental Services Authority
88P	Centre for Economic Development, Transport and the Environment for Uusimaa (ELY)
89P	Centre for Economic Development, Transport and the Environment for Southeastern of Finland (ELY) Kymenlaakso
90P	Centre for Economic Development, Transport and the Environment for Southwestern Finland (ELY) Varsinais-Suomi
91P	Finnish Game and Fisheries Research Institute (FGFRI)
92P	Finnish Environment Institute
93P	Pro Vantaanjoki society
94P	Häme Development Centre Ltd, Finland, (Hämeenlinna)
95O	Häme Travel Association
96U	HAMK University of Applied Sciences
97P	Kiipula Foundation / Kiipula Centre for Vocational Education and Rehabilitation
98P	Kuressaare Regional Training Centre
99P	Tavastia Vocational College
100P	Voru County Vocational Training Centre
101O	Saaremaa Marketing Association
102C	Union of Rural Municipalities of Setumaa
103B	Imago Osauhing
104O	Non-profit Organisation Estonian Rural Tourism
105P	Center for Ecological Engineering
106B	RG Evans Associates
107F	University of Turku
108P	Tartu Folk High School
109P	Swedish Folk High School
110F	KG Foundation's schooling centre Osilia
111F	Foundation Tuuru
112O	Tartu Intellectuals' Society
113P	Adult Education Centre of the City of Salo
114P	Turku Adult Education Centre
115P	The Civic Institute of Porvoo
116P	Vakka-Suomi Adult Education Institute
117P	Järvenpää Adult Education Centre
118P	Kerava Adult Education Center
119P	South Western Finland's Estonia Centre
120A	VALONIA - Service Centre for Sustainable Development and Energy Issues of Southwest Finland
121C	Association of Local Authorities of Järva County
122U	University of Tartu, Türi College
123B	TüriVesi OÜ
124B	Aqua Consult Baltic OÜ
125U	University of Turku
126U	HUMAK, HUMAK University of Applied Sciences
127O	VKT, Von Krahle Theatre
128L	TYD, City of Turku, Youth Services Department

129U	UT VCA, University of Tartu, Viljandi Culture Academy
130B	PWP, PW Partners
131O	Estonian Heritage Society
132U	ÅboAkademiUniversity (ABO)/ Lab. Of Fibre and Cellulose Technology
133U	Tallinn University
134U	Tartu University / Viljandi Culture Academy
135O	Finnish Federation of the Visually Impaired (FFVI)/ Sokeva Handicrafts
136U	University of Turku / Centre for Extension Studies
137P	South-Western Finlands' Estonia Centre
138L	City of Tartu / Turku infopoint
139U	Laurea University of Applied Sciences
140P	TFTAK, Competence Center of Food and Fermentation Technologies
141U	University of Helsinki, Palmenia Centre for Continuing Education
142P	National Institute of Chemical Physics and Biophysics
143U	University of Helsinki, Department of Environmental Sciences, Lahti
144L	City of Turku, School Center
145L	City of Tallinn, Tallinn Education Department
146U	Lahti Region Educational Consortium, Lahti University of Applied Sciences
147U	Tallinn University Estonian Institute for Futures Studies
148L	City of Turku, Environmental and City Planning Department
149P	Estonian Environmental Research Centre
150P	Finnish Meteorological Institute
151C	Helsinki Metropolitan Area Council (YTV)
152U	Tallinn University of Technology, Marine Systems Institute
153U	University of Turku, Centre for Maritime Studies
154U	ÅboAkademi University
155U	Metropolia University of Applied Sciences
156U	Kymenlaakso University of Applied Sciences
157U	University of Turku
158U	Lappeenranta University of Technology, Northern Dimension Research Centre
159U	Estonian Maritime Academy
160U	Lappeenranta University of Technology, Kouvola Research Unit
161U	Arcada University of Applied Sciences
162U	Tallinn University
163U	University of Turku, Centre for Extension Studies
164U	University of Turku, Botanical Garden
165P	School of Cultural Production and Landscape Studies, University of Turku
166P	MTT AgriFood Reserach Finland, Jokioinen
167P	MTT Agrifood Research Finland, Horticulture
168L	Municipality of Lieto
169F	Turku Adult Education Foundation (The Summer University of Turku)
170P	Environmental Board (EB)

171P	Luua Forestry School
172L	M. of Rõngu
173L	Municipality of Alatskivi
174P	State Forest Management Centre
175B	Pidula Manor, Inc
176L	Kuressaare City Government
177F	Foundation Saaremaa University Centre
178U	Tallinn Technical University
179O	The Finnish Lifeboat Institution
180L	Municipality of Vihula

Institutions name and code in the cross-border regions Alentejo-Algarve-Andalucía

Institution Code	Institutions Name
1R	General Secretary of Foreign Action
2R	General Secretary of Planification and Territorial Development.
3P	Public Enterprise of Harbours of Andalucía (EPPA)
4C	Provincial Council of Huelva
5R	Regional Commission for Coordination and Development of Algarve (CCDR Algarve)
6P	Port and Maritime Transport Institute (IPTM)
7L	City Council of Vila Real de Santo António
8L	City council of Castro Marim
9L	City Council of Alcoutim
10L	City Council of Mértola
11O	Association for the Development of Low Guadiana, Odiana (11O)
12O	Association for the Defense of the Patrimony of Mértola (ADPM)
13L	City Council of Serpa Baixo Alentejo
14R	Ministry of Enviroment. Office for the Plan of livestock vias.
15R	Ministry of Culture. Cultural properties.
16R	General Direction of Promotion and Toruristic trade – Ministry of Tourism, Trade and Sport (Government of Andalucía)
17B	National Association of Young entrepreneur ANJE
18A	Globalgarve – Regional Agency for the development of Algarve
19B	Andalusian Council of Chambers of Huelva
20L	Official Chamber of Trade, Industry and Navigation of Huelv
21B	Entrepreneurs Federation of Huelva
22L	Cicy Council of Ayamonte
23L	City Council of Cartaya
24C	Intermunicipal Association of Municipalities Beturia
25R	Andalusian Service of Health (SAS)
26R	Regional Administration of Health of Algarve
27R	General Secretary of Economy- Ministry of Economy and Taxes
28W	General Union of Workers of Andalucía. Sevilla, Cádiz, Huelva
29W	Working Commissions of Andalucía. Sevilla, Cádiz, Huelva
30W	Union of Trade Unions of Algarve CGTP-IN –

31W	General Unión of Workers UGT Portugal
32R	Regional Commission for Coordination and Development of Alentejo (CCDR Alentejo)
33U	University of Algarve
34R	General Direction of Environment Quality – Ministry of Environment
35P	Andalusian Institute of Research and Trading in Agriculture and Fishing (IFAPA)
36P	IPIMAR Institute of Fishing and Research of the Sea
37A	Agency of Innovation and Development of Andalucía
38A	ADRAL – Agency for the Regional Development of Alentejo
39F	FAFFE – Andalusian Foundation for the Training and Employment, Huelva
40U	University of Huelva
41U	Polytechnical Institute of Beja
42P	INAM-CSIC CÁDIZ – Institute of Maritime Sciences of Andalucía
43R	ARH Algarve – Administration of the Hydrographic Region of Algarve
44P	IRNA-CSIC SEVILLA
45P	Institute of Natural Resources and Agrobiology Algarve
46P	Institute of Port and Maritime Transport IP
47P	Public Agency of Ports of Andalucía
48P	VRSA, Society for the Urban Management
49R	Ministry of Environment (Government of Andalucía)
50R	Ministry of Culture (Government of Andalucía)
51F	Public Foundation of the Andalusian Legacy
52R	Regional Direction of Culture of Algarve
53B	Entrepreneurial Confederation of Trade of Andalucía
54O	Association for the Defence of Historical and Archeological Patrimony of Aljezur
55L	City Council of Silves
56L	City Council of Tavira
57F	Foundation NAO VICTORIA
58A	PRODETUR, S.A. – Province Council of Sevilla
59L	City Council of Palos de la Frontera
60L	City Council of Sanlúcar de Barrameda
61R	Regional Entity of Tourism, Algarve.
62R	Regional Direction of Culture, Algarve.
63L	City Council of Lagos
64L	City Council of Vila do Bispo
65B	PROMOSAGRES – Entrepreneurial Association for the promotion of Sagres
66P	Ports of the State
67P	Hydrographic Institute
68U	University of Cádiz
69O	Spanish Association for the Cáncer
70O	Association of Oncology of Algarve
71R	General Secretary of Economy. Ministry of Economy, Innovation and Science (Government of Andalucía)

72P	Andalusian Institute of Research and Training in agriculture, fishing and food (IFAPA)
73P	Laboratory for Fishing and Sea Research of the National Institute of Biological Resources.
74A	Agency for the Regional Development of Alentejo
75F	FAICO, Andalusian Foundation of the Image, Colour and Optics
776P	ADESVA, Technological Center of the Agroindustry Centro Tecnológico de la Agroindustria
77F	Foundation of the Technological Center for the Meat Industry
78P	IFAPA, Las Torres, Andalusian Institute of Research, Huelva
79R	Ministry of Health (Government of Andalucía)
80P	Drugs and Dependency Institute. Regional Delegation of Algarve
81P	Public Foundation of Andalucía.
82L	City Council of Faro
83A	Technological and Scientific Park of Huelva
84A	AmbiFaro
85P	Institute of Fats
86R	Ministry of Economy, Innovation and Science (CEIC). General Secretary of Economy.
87B	Confederation of Entrepreneurs of Andalucía (CEA)
88B	Confederation of Entrepreneurs of Algarve (CEAL)