

THE CIRCUMSTANCES OF KNOWLEDGE TRANSFER WITHIN THE SCOPE OF THE CROSS-BORDER CZECH- POLISH PROJECTS 2014-2020

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Abstract

Cross-border projects are aimed at solving significant problems or addressing the challenges anticipating the expectations of the borderland community. In many cases, these projects are related to the implementation of various types of innovative solutions, the application of which as a general rule, however, is limited to the activities of the project partners. Meanwhile, a comprehensive knowledge and experience gained in projects should enrich not only the partners implementing them, but also the recipients of project results and other organizations working on similar basis on both sides of the border. The aim of the paper is to identify the circumstances of knowledge transfer between participants involved in international projects, carried out within the border area, using EU funds for 2014-2020 and the recipients of their actions. The conclusions reached in this paper can help the authorities managing i.a. the programme Interreg V A Czech Republic - Poland 2014-2020, as well as the organizations benefiting from these funds and their followers, whose goal is to strive for socio-economic cohesion of borderland area and building an economy based on this field of knowledge.

Key words: knowledge, project, cross-border cooperation.

Introduction

Knowledge transfer processes are aimed at, among others, transfer of innovative ideas or solutions to new application and implementation areas, and often ultimately lead to developing a widely understood sense of innovation. In practice, several factors having a favourable or unfavourable influence on the quality and efficiency of these processes

can be indicated. One of them is the environment, including i.a. terms of project partners cooperation, i.e. the organization transferring knowledge and acquiring knowledge, motivation to learn and use knowledge, degree of interest in the effects of knowledge transfer, the possibility of actual use of knowledge in practice, etc. (Argote et al. 2000: 1). Against the background of the growing diversity of inter-organizational cooperation forms in the economy based on knowledge, learning and networking, the author drew attention to the potential, highly effective knowledge transfer processes in international projects, including i.a. cross-border projects. These are the projects implemented with the participation of entities operating in the border areas of two or more countries, whose goals of functioning are normally associated with the development needs of border areas (Perkmann 2003: 154). A significant number of such projects is implemented with the active use of the European Union funds, which imposes certain restrictions, but also creates opportunities to carry out actions on a scale impossible to be financed from the partners' own resources (Harguindeguy, Bray 2008: 747). Undoubtedly, one of the most useful aspects of cross-border partnership is the transfer of knowledge and experiences between these organizations, at least in the following areas indicated below:

- management of cross-border partnership (Kurowska-Pysz 2014: 46),
- preparation and implementation of the cross-border project,
- obtaining of the desired and sustainable results of the project.

In practice, these three areas relate primarily to organizations which are actively involved in a project. Nevertheless, the key objective of cross-border projects is also sharing of their results with the surroundings and dissemination of cooperation results i.a. ensuring its availability to other organizations working in similar fields on both sides of the border.

The aim of this paper is to identify the circumstances of knowledge transfer between participating entities involved in international - cross-border projects, implemented with the use of EU funds and the recipients of their actions. The author has sought to resolve the research problem outlined in this paper by the example of the Programme Interreg V A Czech Republic - Poland 2014-2020, under which the cross-border projects are implemented. Conditions and thematic areas of cross-border cooperation within the framework of this Programme have been subjected to an analysis by the author and resulted in the identified areas of explicit and tacit knowledge, possible to be transferred in the project environment between the participants and external stakeholders of the project. The conclusions are based on the desk research analyzing different documents and some evaluations of crossborder programs, such as the elaboration: "The quantification of the output and target values of the selected result indicators of the Cross-border Cooperation Programme Czech Republic - Poland 2014-2020", ordered by the Czech Ministry of Regional Development in 2015.

1. Use of knowledge in cross-border projects

Cross-border projects constitute a special kind of undertakings which due to their characteristic parameters (Table 1) form an interesting and unique analysis platform for knowledge transfer processes taking place within project structures, as well as relating to the project environment.

Table 1. Parameters characteristic for cross-border projects

It. no.	Type of parameter	Characteristics
1.	Objective	Agreed by the originators, most frequently blending in the strategic conditions of borderline development or its any part.
2.	Participants	Partners jointly preparing and implementing the project, including at least one entity from each side of the border (e.g. local governments at various levels and their subordinate bodies, NGOs, entrepreneurs, etc.).
3.	Recipients	Natural and legal persons from the border area to which the activities are addressed in the project, as well as other institutions and organizations pursuing similar business activities in this area as a non-project form.
4.	Area of implementation, environment	The area directly located on the border of two or more countries, in most cases precisely defined (especially in the case of co-financing from EU funds supporting cross-border cooperation).
5.	Manner of financing	Partners' own resources: public and private funds, in most cases, significantly complemented by subsidies from the EU funds supporting cross-border cooperation.
6.	The scope of activities	Measures to achieve the objectives of the project, implemented mostly in the whole border area or its selected part, in cooperation of at least two partners from both parts of the borderline.
7.	Findings	Resulting from the aim of the project and forming a lasting cross-border effect of its implementation addressed to originators, recipients and project environment suited to the strategic requirements of the borderland development (especially in projects using EU funds to support cross-border cooperation); having an impact on reducing disparities in living standards of communities on both sides of the border, as well as the creation or enhancement of partnership relations between institutions, organizations and the population of partner regions (Jabłońska, Hryniewicka 2010: 87-88).

Knowledge is one of the key resources necessary to prepare and implement the project. The greater the complexity of the tasks within the project, the higher the demand for knowledge: both explicit, formal and structured (i.e. documents, guidelines, databases) as well as knowledge which is tacit, hidden, anchored in people's minds, resulting primarily from personal experiences (Nonaka, Takeuchi 1995: 47). Utilizing knowledge in projects should be approached from three perspectives (Kozarkiewicz 2012: 116-117):

- the past: as knowledge, experience and competence of the organization, teams and individuals participating in previous projects (collectively or individually), e.g. referring to the effectiveness of the adopted methods, procedures, tools, etc.,

- the present: as knowledge that comes from an ongoing project(s), e.g. regarding the restrictions on the availability of resources, sharing of available information, creating additional added value in the project, etc.,
- the future: as knowledge which is an important resource to be used in future projects.

In the cross-border projects, it is necessary to ensure access to knowledge (OECD 2000: 57-76) at the following levels:

- the project team and its individual members (e.g. individual experiences resulting from participation in previous projects, knowledge resulting from the professional education and professional specialization, knowledge about the border, etc.),
- project partner organizations (e.g. knowledge of financial and legal conditions for the implementation of cross-border project, knowledge of communication procedures within the organization and between partners, knowledge about the procedures for selecting the contractors for commissioned tasks),
- project environment (e.g. knowledge of the opportunities and threats coming from outside, knowledge of the conditions of applying for EU funds, knowledge about the possibilities of acquiring partners, knowledge about the needs and expectations of potential recipients of the project).

The objectives of knowledge management in a cross-border project, co-financed by the European Union should focus on (Kurowska-Pysz 2014: 361):

- extracting knowledge gained from the experience and competence of the organizations implementing the project on both sides of the border and cross-border project implementation teams (e.g. from managers of partner organizations, the project coordinators, from internal experts, etc.),
- developing the existing knowledge and creating new knowledge, contained i.a. in the findings of the project,
- identifying and acquiring new knowledge of the cross-border project environment (e.g. from the institutions managing cross-border programmes, the Euro-regions, from the experts and trainers, from beneficiaries of other projects, etc.),
- documenting, collecting and storing knowledge by each of the cross-border project partners, in a way accessible for the remaining partners, and in certain cases - also to other entities involved in the project on both sides of the border (knowledge sharing).

The added value of cross-border project is the fact that the knowledge available to the remaining partners is generally quite diverse, and its resources are considerable. During the project implementation knowledge resources are multiplied. Particular importance assumes cross-border transfer of knowledge between partners and sharing of knowledge, which is usually available (at least to some extent) to the recipients of the project on both sides of the border, where it can be re-used in other applications. Project partnership therefore results in a relatively rapid diffusion of knowledge on both sides of the border, although usually such processes are subject to numerous obstacles that impede the sharing of resources such as knowledge (e.g. language barrier). The knowledge created in the project should also be treated as one of its results, which is especially important for the process of developing knowledge and creating new knowledge. Attempts should also be made to transform tacit knowledge into explicit knowledge, which will be reflected in its more effective use in other applications.

2. Interreg V A Czech Republic – Poland 2014-2020 Programme - as a key area of cross-border projects implementation with inter-organizational cooperation

V A Interreg Czech Republic - Poland 2014-2020 is a continuation of cross-border cooperation programmes implemented in previous EU prospects (e.g. 2007-2013). The programme is targeted at different types of organizations operating in the Polish-Czech borderland including Czech regions: Liberec, Hradec, Pardubice, Olomouc and Moravian-Silesian and Polish sub-regions: Bielsko and Rybnik (Silesia), Jelenia Góra and Wałbrzych (Lower Silesia), Nysa and Opole (Opole province). Thematic analysis of cross-border cooperation areas intended to be supported under this Programme are presented in Table 2.

Table 2. Leading areas of cross-border cooperation within the framework of the Interreg V A Czech Republic - Poland 2014-2020

Name of the priority axis and its thematic objective	Common risk management	
	Promoting climate change adaptation, risk prevention and risk management	
Main originators	Investment priorities	Selected types of cross-border projects
- public authorities - selected non-governmental organizations	Preventing disasters and developing disaster management systems.	- managing risks; - preparing emergency services and police to cross-border crisis management
Name of the priority axis and its thematic objective	Development of environmental and cultural potential to promote employment	
	Promoting sustainable and high quality employment and support of labour mobility	
Main originators	Investment priorities	Selected types of cross-border projects
- public authorities - selected NGOs - European Grouping of Territorial Co-operation - Churches and religious associations	Supporting economy growth conducive to employment, among others, by conversion of declining industrial regions and increasing access to natural and cultural resources.	- the preservation and renewal of cultural and natural attractions, - using and providing access to cultural and environmental heritage of the border region, - information, marketing and promotion activities concerning the use of environmental and cultural resources,

Name of the priority axis and its thematic objective	Education and qualifications Investing in education, skills and lifelong learning	
Main originators	Investment priorities	Selected types of cross-border projects
- public authorities - educational institutions and universities - non-governmental organizations - European Grouping of Territorial Co-operation	Investing in education, training, in order to acquire skills, lifelong learning through development and implementation of joint education systems, vocational training and training.	- preparation and implementation of joint training, - cooperation between educational establishments and the institutions of the labour market, - development of language education,
Name of the priority axis and its thematic objective	Cooperation of institutions and communities Enhancing institutional capacity and efficient public administration	
Main originators	Investment priorities	Selected types of cross-border projects
- public authorities - non-governmental organizations, - educational institutions, including universities - European Grouping of Territorial Co-operation - churches and religious associations	Strengthening institutional capacity of public institutions and the efficiency of public administration by supporting legal and administrative cooperation and cooperation between citizens and institutions.	- strengthening of integration, - cooperation of civil society, - development of public administration institutions, - the creation and development of cross-border networks,

Source: own elaboration on the basis of Interreg V A the Czech Republic – Poland 2014-2020.

The above characteristics of support areas confirms the broad scope for cross-border cooperation in project partnerships, although it does not cover its all aspects. The Programme for 2014-2020 lacks, among others, previously popular actions on supporting tourism, economic cooperation and scientific research. From the point of view of the

Programme evaluation as a key area of cross-border projects implementation in inter-organizational cooperation, attention should be paid to the following conditions:

- preparation and implementation of the project under the Programme described above requires close cross-border partnership, whose shape and effectiveness are reviewed at the project evaluation stage, and later, at its implementation and control stage; this forces the cooperation of partners and real transfer of knowledge between them for the optimal preparation of the application,
- cross-border partnership, although it pursues the objectives of the project, as a form of inter-organizational cooperation it also provides partners with other information about each other, about the implementation of activities, common needs and expectations related to projects, cooperation in project mode also enhances the reduction of some natural barriers to such cooperation e.g. linguistic, cultural, financial, etc.,
- preparation of the cross-border project requires the acquisition of knowledge through the cross-border environment, which determines the correct justification for the needs and expectations of the recipients of the project,
- inter-organizational cooperation process in the case of cross-border projects goes beyond the time of their implementation and includes at least the so-called sustainability period of the projects, during which the continuation of cross-border partnership needs to be shown, which also requires the continuation of knowledge exchange between partners.

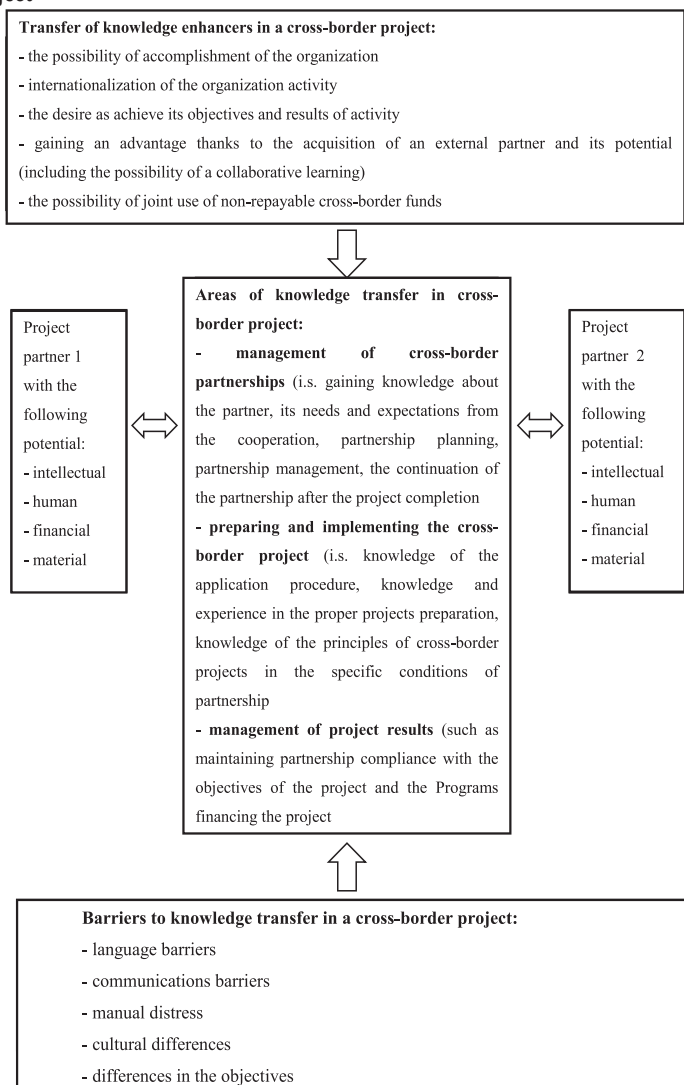
3. Identification of the determinants of knowledge transfer between the participants of cross-border projects and their surroundings

The condition for transferring the knowledge possessed by the organization is its earlier acquisition, then development and codification. In turn, the organization receiving knowledge as a result of this transfer, should be able to use it for its intended purpose and self-interest of the organization (Kowalczyk, Nogalski 2007: 115). The very process of knowledge transfer, in other words – knowledge sharing and knowledge distribution - can have a positive impact on both, the organization transferring knowledge, as well as its recipient. The most effective process of knowledge transfer occurs when the organization transferring knowledge at the same time dynamically learns, thus constantly affects its inner self, whereas the one who receives knowledge, provides it where it is really needed and where there is awareness how to use it. This can be done formally or informally. Tacit knowledge (Nonaka, Takeuchi 1995), is often transferred through simple sharing of information by the staff in direct talks or in a larger group, as a part of performing their duties or on special occasions. On the other hand, in case of explicit knowledge transfer, most often information technologies are used to disseminate such knowledge, after its previous codification, in a way that facilitates its assimilation and understanding, then its use by the recipient (Kowalczyk, Nogalski 2007: 105).

Project situations are conducive to joint learning and mutual transfer of knowledge and experiences between partner organizations (Figure 1). It should be noted, however, that some types of projects, including i.a. cross-border projects are dedicated to the extended

knowledge transfer targeted at the project environment, which should also benefit from the project results and sustainability of the established partnership between organizations. As shown in Figure 1, the transfer of knowledge between partners in the project is reciprocal. The plenitude of the partnership is the possibility of a synergistic use of resources available to partner organizations to implement the common objectives. The Figure presents three main areas of knowledge transfer, which are affected by specific enhancers and barriers. The impact of these factors on the transfer of knowledge depends on the susceptibility of the project partners to their impact, as well as the potential of these partners.

Figure 1. Traditional determinants of knowledge transfer between the partners in the cross-border project



In the process of knowledge transfer, a following sequence of actions should occur: first transmission of knowledge (forwarding, distributing), followed by absorption of knowledge: understanding, assimilation, acceptance (Davenport, Prusak 2000: 156). The effectiveness of knowledge transfer also requires the planning of its appropriate transmission channels, depending on the formalization degree of specific knowledge, whether it is overt or covert one.

The transfer of knowledge, described in Figure 1, is limited to inter-project relationship between partners or persons representing the partners in the project team. Nevertheless, a cross-border partnership is a ground for mutual transfer of knowledge between organizations participating in the project, but also knowledge transfer to the project recipients and to other organizations or institutions dealing with similar problems, and generally speaking - to the surroundings of the project. Significant factors affecting the efficiency of knowledge transfer from the project to the environment can be divided into three levels (Table 3), assigning them to both sides of this transfer, respectively.

Table 3. Factors influencing knowledge transfer efficiency of cross-border project to the environment

Factors on the part of the organization sharing knowledge	Area of the transfer	Factors on the part of the organization receiving knowledge
1. Project uniqueness (the higher, the greater the interest of the environment in gaining knowledge from the project). 2. Project adaptability (the wider the possibilities of project solutions imitation, the greater the interest in the knowledge that comes from the project). 3. Project inaccessibility (the higher the protection degree of knowledge generated within the framework of the project, the more difficult the process of transferring this knowledge is). 4. Subject area of the project	Cross-border project	1. Demand for innovative project solutions (the higher - the greater the openness to the acquisition of knowledge). 2. Possibility of transferring project solutions on the ground of their organization. 3. Accessibility of knowledge from the project to other organizations. 4. Correspondence of the project theme with the measures implemented by the given organization.

1. Openness to participate in the transfer and a willingness to transfer knowledge 2. Tendency to cooperate 3. Activity sector (high / low competition) 4. Preparation for the transfer of knowledge 5. Organizational culture i.a. openness to the surroundings	Organizations taking part in a project	1. Openness to participate in the transfer and a willingness to absorb knowledge 2. Tendency to cooperate 3. Activity sector (high / low competition) 4. Preparation for knowledge absorption 5. Organizational culture i.a. openness to the surroundings
1. Character of the partnership 2. Degree of the partnership openness to include other entities 3. Motives and objectives of the partnership, the course of the partnership and achieving the objectives of the partnership 4. Quality and value of knowledge from the partnership	Cross-border partnership	1. Knowledge of the principles of partnership functioning 2. Demand for the establishment of partnerships 3. Demand for knowledge possible to be acquired from the project partnerships 4. Ability to establish partnerships 5. Assessment possibility of using knowledge from other partnerships

The factors set out above represent only part of the conditions underlying the effectiveness of the knowledge transfer process. This process is dependent on both parties of the transfer: the one transferring knowledge and receiving knowledge. The relationship between them, but also the motives and needs of each party is decisive whether the transfer of knowledge, especially in terms of its efficient further use is feasible to be accomplished.

Table 4. Examples of the areas covered by the transfer of knowledge in a cross-border project

No.	Area of knowledge transfer	Nature of the transfer
1.	Cross-border project	Area of expertise: process / product innovations developed, tested and implemented within the framework of the project. This transfer relates to: the diffusion of innovative solutions to other organizations on both sides of the border.

2.	Organizations taking part in the project	Area of expertise: solutions in relation to the techniques for codification of tacit knowledge and experience of the organization employees gained during the implementation of particular projects. This transfer relates to: the potential for replication by other organizations of codification techniques used by organizations participating in projects.
3.	Cross-border partnership	Area of expertise: innovative formal and organizational arrangements for the functioning of consortia and networks in cross-border projects. This transfer relates to: the use by other organizations building cross-border partnerships of knowledge and experiences of the participants relating to innovative cross-border partnership forms.

Examples of knowledge areas covered by the transfer in three key areas was shown in Table 4. While in cross-border projects, it is obligatory for transfer of knowledge to refer to the results of the project itself (i.e. the dissemination of project outcomes, obligatory on both sides of the border), the transfer of knowledge from project partners to their surroundings on both sides of the border or the transfer of knowledge resulting from the partnership itself is no longer required so expressly, and as long as it occurs – it is treated as added value of the project. At the level of the implemented projects and in the wider context, it is possible to transfer many areas of knowledge, which can also be very useful in the broadly defined project environment (examples are presented in Table. 4) and for the very recipients of the project, e.g. knowledge from training, conferences, research, consultancy services, established contacts etc.

Conclusions

This issue of knowledge transfer in cross-border projects relates to the specific conditions that are defined at three levels: the project, its participants and the cross-border partnership within the project with participation of these entities. Transfer of knowledge is an important, although usually not a key result of cross-border project, unless its subject matter concerns e.g. the discussed above Third Priority Axis of V Interreg Czech Republic-Poland 2014-2020 programme, i.e. Education and qualifications, focused on developing qualifications, skills and lifelong learning. As it is apparent from the procedures of preparing and implementing cross-border projects, this kind of undertaking specifically focuses on building lasting relationships of cooperation between partners from both parts of the border region. These relations should be established within the framework of joint projects, and then, upon the completion of these projects, they should be maintained, developed and extended to other entities. Due to the current, strong focus of societies and economies on collaborative learning and networking - the problem of knowledge transfer at an international level, including cross-border one, assumes special significance. As shown above, by the example of the programme Interreg V A Czech Republic - Poland

2014-2020, there are numerous areas of knowledge transfer in cross-border projects. Significantly, they are associated with the identified, real development needs of those areas that are satisfied through the implementation of cross-border projects. Indicated in part three of the paper - the traditional determinants of knowledge transfer between partners in the cross-border project, including enhancers and barriers affecting this process, should be taken into account by the institutions managing cross-border funds as important determinants of the efficiency of cross-border projects. An even greater challenge is the implementation of a methodology for planning and implementing cross-border projects of both, the levels of knowledge transfer in cross-border project identified in the paper as well as factors influencing the process, on the part of the organization transferring knowledge and receiving knowledge. Nevertheless, the relatively long period of time in which these types of projects are implemented (e.g. on Czech-Polish border, the possibility of such actions exists since 2000) imposes on the institutions managing the cross-border funds and companies implementing such projects increasingly higher efficiency of actions which is determined i.a. by the transfer of knowledge, possible to be obtained by the project partners and transferred as the results of projects to their surroundings.

References

1. Argote, L., Ingram, P., Levine, J., Moreland, R. (2000), Knowledge transfer in organizations: learning from the experience of others, *Organizational Behavior and Human Decision Processes*, Vol. 82, No. 1, pp. 1-8.
2. Davenport, T., Prusak, L. (2000), *Working knowledge: how organizations manage what they know*, Harvard Business School Press, Boston.
3. EWT (2015), The programme Interreg V A Czech Republic - Poland 2014-2020, available at: www.ewt.gov.pl (accessed 1 July 2015).
4. Harguindeguy, J., Bray, Z. (2009), Does cross-border cooperation empower European regions? The case of INTERREG III A France – Spain, *Environment and Planning C: Government and Policy*, Vol. 27, pp. 747-760.
5. Jabłońska, A., Hryniewicka W., (2010), Projekt europejski jako forma współpracy transgranicznej, In: Perkowski M. (Ed.), *Współpraca transgraniczna: Aspekty prawno-ekonomiczne*, Fundacja Prawo i Partnerstwo, Białystok, pp. 87-88.
6. Kowalczyk, A, Nogalski, B. (2007), *Zarządzanie wiedzą, koncepcja i narzędzia*, Difin, Warszawa.
7. Kozarkiewicz, A. (2012), *Zarządzanie portfelami projektów*, Wydawnictwo Naukowe PWN, Warszawa.
8. Kurowska-Pysz, J. (2014), The knowledge and other specific circumstances in cross border project life cycle, in: Stefko, R., Frankovsky, M., Vrabec, J. (Eds.), *Business, management and social researches*, University of Presov, Presov.
9. Kurowska-Pysz, J. (2014), Wykorzystanie wiedzy w rozwoju euroregionalnych partnerstw transgranicznych, In: Perechuda, K., Chomiak-Orsa, I. (Eds.), *Wiedza w kreowaniu przedsiębiorczości*, Sekcja Wydawnictw Wydziału Zarządzania Politechniki Częstochowskiej, Częstochowa.

10. Nanoka, I., Takeuchi, H. (1995), *The knowledge – creating company: How Japanese companies create the dynamic of innovation*, Oxford University Press, New York.
11. OECD (2000), *International science and technology co-operation: towards sustainable development*, Proceedings of the OECD.
12. Perkman, M. (2003), *Cross-border regions in Europe. significance and drivers of regional cross-border co-operation*, *European Urban and Regional Studies*, Vol. 10, No. 2, pp. 153-171.