

PUBLIC-PRIVATE PARTNERSHIPS FOR STIMULATING THE ECO-EFFI- CIENCY AND ENVIRONMENTAL RESPONSIBILITY OF SMEs*

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Abstract

This paper investigates the trend of greening the SMEs sector by means of creating public-private partnerships. There are two main theoretical concepts used to frame the debate – social corporate responsibility and eco-efficiency. The paper describes and analyzes one possible tool local governments have in order to encourage SMEs to become more efficient from an environmental standpoint – the Ecoprofit-type approach. Ecoprofit is a program implemented in Austria and then extended to other countries in which local governments offer training and certificates to SMEs who want to become more eco-efficient. In the empirical research we tested: a) the perceptions and attitudes of SMEs with regard to the greening of their operations and products/services; and b) whether Romanian SMEs would be interested in taking part in such a program. The conclusion is that SMEs perceive environmental management as a burden and tend to comply only with the mandatory requirements of the law.

Keywords: small and medium enterprises, public-private partnerships, environmental responsibility, Ecoprofit, eco-efficiency, Romania.

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1. Introduction – toward building a sustainable local economy

The type and composition of a local economy can influence in tremendous ways a city's ecological footprint and impact. In too many cities, however, the environment is a secondary consideration (if considered at all) in crafting economic development policy (Portney, 2003, p. 369). Several shifts have been taking place recently and they seem to enable local stakeholders to be better equipped in advancing the goals of sustainable economic development:

a) Traditionally, national states/central governments have been responsible for environmental policies. This is changing; responsibilities are being shifted to the supranational level as well as to regional and local institutions (Lintz and Nobis, 2008, pp. 3-4). There are cases where the states have failed while sub-national entities are at the forefront of the environmental movement (in the US California is known as the greenest state, mainly due to initiatives at the local and state level). The local level gained particular attention from chapter 28 of the Agenda 21 adopted by the United Nations in Rio de Janeiro in 1992 (Hooghe and Marks, 2001). The local level is relevant because local authorities are closer to people and businesses than central governments; in the same time municipalities often make policy decisions with environmental implications especially as they affect infrastructure projects, urban planning etc. (Connelly and Smith, 2003; Camagni, 1991).

b) Another change refers to the policy tools used by governments in order to achieve sustainable development. The regulation-oriented policies are replaced with management support programs and other incentives which are meant to help SMEs to increase their environmental efficiency (Odake, 2009; Fresner; 1998). While regulations are often rigid and hard to adapt to the local context, incentives-based policies can be better tailored by local governments as to respond to the local needs. Assistance programs targeting SMEs implemented by local governments aim generally to reduce negative environmental impacts not through forcing SMEs to follow governments' measures but rather through supporting SMEs' own efforts to decrease such impacts (Odake, 2009).

c) New forms of governance have emerged, involving more political levels and cooperation with an increasing range of actors. At the local level, Chambers of Commerce and different businesses associations of businesses are becoming relevant partners for the public sector. Nowadays it is not unusual to have multiple stakeholders working together to solve complex environmental challenges.

d) A completely different attitude and mindset among businesses than two or three decades ago have emerged. Thus, the environmentalists versus industrialists debates of the 1970s and 1980s are gradually being replaced by solutions-oriented approaches. Companies are no longer concerned only with quality, service and cost; they have to also consider their environmental performance. Because less energy, less materials, and less pollution translates into savings for the companies, they seem to voluntarily agree to become more environmentally-friendly and even engage in innovating this field. Moreover, some companies go beyond eco-efficiency and try to

tackle sustainability by considering the environmental impact of the materials they select, the social implications of their products and operations, and in some case the need for their product at all (Brady, Henson and Fava, 1999, p. 33).

In light of these shifts, the paper investigates how local governments can partner with the SMEs sector in order to promote a higher level of eco-efficiency on SMEs behalf. It starts by exploring the reasons which determine SMEs to engage in voluntary programs, which go beyond what is mandated by law in the field of environmental protection. Two concepts are used to frame this section: corporate social responsibility and eco-efficiency. The paper then focuses on various tools available to SMEs for greening their operations and highlights the importance of a specific tool which allows for public-private partnerships between SMEs and municipalities. One such partnership scheme – Ecoprofit, Austria, is examined and several elements which could be transferred to other countries are analyzed. In the empirical part the article scrutinizes: a) the perceptions and attitudes of SMEs in Romania with regard to the greening of their operations and products/services; and b) whether Romanian SMEs would be interested in partnering with the municipalities and taking part in an Ecoprofit-type program.

2. Translating sustainability into corporate sustainability and/or eco-efficiency

The business community usually agrees with the tenets of sustainable development and embraces the idea of greening the economy, however very often there is a gap between this abstract concept and the daily practices of businesses. Morris (1997, pp. 107-108) states that there are two main obstacles companies face in this endeavor: the lack of a bridge that converts sustainable development as a philosophy to a program that is practical and realistic; and no tools to design and implement sustainable development programs. She also claims that other more applied concepts should be used in order to bridge the abstractness of sustainable development with the mundane operations of companies (Morris, 1997, p. 108). Within this section two such concepts are offered: corporate social responsibility (hereafter CSR) and eco-efficiency. Also, several possible tools developed over the last ten years are explored more in depth.

Corporate social responsibility is an elusive notion, hard to define as it means different things to different people. In the literature there are broadly two categories of definitions, one which is very broad and a second one which is narrower, emphasizing the altruistic dimension of CSR. One definition that fits in the first category is offered by Lyon and Maxwell (2008, pp. 1-2): CSR includes all environmentally friendly actions not required by law, also referred to as going beyond compliance, the private provision of public goods, or voluntarily internalizing externalities. Definitions that fall in the second category usually state that an action counts as CSR only if it is not motivated by obtaining a profit; socially beneficial actions that increase a company's profits should not count as CSR (Lantos, 2002). Baron (2001) distinguishes between altruistic CSR (it is similar with the narrower definitions described above) and

strategic CSR (which is profitable for companies). Though in theory companies may engage in altruistic CSR activities, most authors consider that these cases are rare and very often companies have their own agenda (the gains do not have to be immediate and material, they can be also symbolic or on the medium and long term) (Meehan, Meehan and Richards, 2006).

Given the focus of the paper on SMEs, it should be mentioned that SMEs, more than large companies, encounter specific challenges with regard to corporate sustainability. A growing body of literature on this topic points toward the most significant ones: SMEs are generally owner-managed, and less bureaucratic, leading to a rather informal management of CS; emphasize informal and/or personal relationships shaping their stakeholder management approach; follow less formalized strategies and an ad-hoc management resulting in an reactive approach to CS issues; inherent resource constraints such as lack of time, financial and human resources as well as capabilities and knowledge (Klewitz and Zeyen, 2010, pp. 6-7).

Eco-efficiency is perhaps a more useful concept in the context of our analysis regarding the triggers of an environmentally-responsible behavior for businesses. Broadly speaking, it refers to the utilization of the natural resources in the most economically, socially and ecologically efficient manner possible (please see that social considerations are included, however in practice they are most of the time absent, the focus being on environmental aspects). The principle of eco-efficiency connects environmental protection with technological and economic efficiency. It implies both a technical dimension (new products and technologies) as well as a social one (new forms of cooperation, new consumption behavior). The main goal of eco-efficiency is to de-link economic growth from increased resource consumption and emissions (OECD, 2000). Perhaps the most well-known definition is the one by the World Business Council for Sustainable Development (WBCSD), an organization that aims to provide leadership as a catalyst for change in the achievement of environmental excellence, and promotes the achievement of eco-efficiency through high standards of environmental management in business. Thus, eco-efficiency can be defined as the delivery of competitively priced goods and services that satisfy human needs and bring quality of life while progressively reducing ecological impacts and resource intensity through the life cycle, to a level at least in line with the earth's estimated carrying capacity (WBCSD, 1995; Morris, 1997). In addition, WBCSD also defined seven principles for eco-efficiency: 1) Reduce the material intensity of products and services; 2) Reduce the energy intensity of products and services; 3) Reduce the dispersion of toxic materials in industrial processes; 4) Increase material recyclability; 5) Maximize sustainable use of renewable resources; 6) Extend the durability of products; 7) Increase the service intensity of goods and products. Klewitz and Zeyen (2010) define eco-efficiency as the ratio of economic value created to environmental impact added. Furthermore, it is either improved by reducing environmental impact whilst keeping the same economic value, or by expanding economic value whilst remaining on a constant level of environmental impact (p. 6).

The concepts of CSR and eco-efficiency represent the first step toward a more pragmatic adaptation of sustainability to the daily operations of businesses. However, the next step implies a set of tools businesses may use in order to become more environmentally-responsible. Figure 1 below comprises a broad variety of such tools developed based on the existing literature.

Cleaner Production Guides; Corporate Environmental Reporting; Design for Environment; Design for Disassembly; Eco-compass; Eco-auditing; Eco-efficiency; Eco-industrial Parks; Eco-profiling; Environmental Auditing; Environmental Management Systems; and Environmental Performance Measures.	Life-Cycle Assessment; Life-Cycle Costing; Life-Cycle Management; Life-Cycle Value Assessment; Pollution Prevention; Product Stewardship; Social Justice Indicators; Responsible Care; Standards-ISO 14000 and various national environmental standards; Supply Chain Management; and System Conditions of the Natural Step.
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Source: Brady, Henson and Fava, 1999, p. 35

Figure 1: Tools supporting the greening of the industry

Some of the tools listed in Figure 1 should be viewed as overarching concepts rather than specific tools (see for example eco-efficiency). Also, it has to be mentioned that in general these tools originate from three sources: from within the business sector (businesses associations which develop for example cleaner production guidelines for a specific industry), from third independent parties (ISO certification for example), and from the public sector (Ecoprofit-type programs, please see next section for more details).

Though there seems to be growing consensus among various stakeholders, including companies, with regard to the importance of greening the economy, the willingness of companies to engage in such efforts should be viewed in light of the advantages brought by these efforts. They include: reductions in operating costs; production and process improvements; reduced liability and risk; enhanced brand image; increased employee morale; increased opportunity for innovation; increased opportunity for revenue generation-new markets and price premiums; better supply chain management; and better relationships with customers (Brady, Henson and Fava, 1999, p. 5). On the other hand, there is a growing body of literature on the limited awareness of SMEs with regard to their overall environmental impact (Hillary, 1995, 2000; Rutherford *et al.*, 2000; Revell and Blackburn, 2007). Much of the evidence suggests that this is the result of a combination of factors ranging from ignorance to deliberate strategies to avoid rises in production or service costs (Revell and Blackburn, 2007, p. 406). With regard to existing barriers, there are several interesting concepts emerging in the literature. Revell and Blackburn (2007, pp. 406-407) discuss the following:

- Low levels of eco-literacy;
- Negative perception of the ‘business case’ for sustainability – environmental protection is generally seen as a burden which rarely results in economic benefits.

- Lack of customer and supply chain pressure – SMEs experience little external pressure to adopt environmental management systems.
- Vulnerable compliance – due to limited awareness of environmental regulations coupled with low level of empathy with the said regulations.

3. Environmental management systems (EMSs) as tools to promote eco-efficiency

This section first introduces the concept of environmental management system and points out the potential role of the public sector in establishing such systems. It then focuses on a specific, partnership-type of EMS.

Public authorities have a wide range of tools to promote the eco-efficiency of enterprises. Among these are legislation, permission procedures, environmental fees and taxes and different types of subventions. In addition, since the beginning of the 1990s, more or less formal environmental management systems have been developed (Lehtonen, not dated).

3.1. EMSs – definitions

Generally speaking, an environmental management system (EMS) is part of the overall management system of an organization that includes organizational structure, planning activities, responsibilities, practices, procedures, processes and resources for developing, implementing, achieving, reviewing and maintaining the environmental policy (Melnyk, Sroufe and Calantone, 2003; Stege, 2000; Hillary, 2004). One can model the EMS around a number of standards available – some are international (ISO 14001), some European (EU in fact – EMAS), while others can be designed by organizations/authorities at national or sub-national levels (in Germany the PREMA system). In all the cases mentioned above, the EMS implies not just a focus on results of actions in form of material objectives and limits but on setting up organizational structures and managerial processes and subject these to continual control. Companies have to develop and make use of different abilities such as formulating environmental objectives and implementing organizational structures and processes as well as measuring achievements. This engagement is rewarded with a certificate that shows to the public the corporate environmental commitment. In certain cases (EMAS) the certificate is combined with the right to use the logo (Freimann and Walther, 2002, p. 92). For the national/local programs, technical assistance and support may be also included, especially for SMEs.

3.2. Ecoprofit, Austria

Ecoprofit is an innovative program operated by the City of Graz since 1991. It is intended to educate local businesses and to help them identify changes in production processes that could reduce waste and resource consumption, and in turn increase profitability (Portney, 2003, p. 370). It is an internationally registered and copyrighted trademark. It was originally developed to improve the environmental situation in

Graz¹ – in the early 1990s the region of the city of Graz experience serious problems with its local air quality. In this critical context the city of Graz and the University of Graz cooperated in the development of an initiative called Ecoprofit. Today Ecoprofit is implemented worldwide, its broadest dissemination taking place in Germany (Otake, 2009, p. 2328).

Ecoprofit is often described in the literature as a win-win-model, using integrated environmental technologies to strengthen economic efficiency and to improve the local environment at the same time (Balcazar, 2010, p. 29). The program is based on a public-private partnership model. The municipality initiates the establishment of the Ecoprofit program in order to improve the local environmental situation by working together with the local companies and consultants. The companies participate in the program on a voluntarily basis and have some degree of flexibility with regard to their level of involvement. Throughout the implementation of the program, networking is a key element for success, not only among the participating businesses but also with the representatives of the city.

Participation in the program follows several stages (Portney, 2003, pp. 370-372): first, workshops are held to inform and educate companies about low environmental impact production methods; during these workshops consultants work with each company, individually, in order to identify low cost improvements meant not only to reduce pollution but also to increase efficiency and subsequently profits. Second, the company needs to establish a unit within the organization and to assign staff who will be working with the consultants and the company in order to identify those areas where the environmental impact can be reduced. Third, companies are awarded the Ecoprofit logo, provided that they meet certain requirements (modeled after EMAS but adapted for SMEs). The logo is awarded for one year and in order to maintain certification continuous progress must be achieved.

Ecoprofit consists of three main programs, Basic Program, Special Programs (such as Tourist) and Club Program. The Basic Program is for beginners and it consists of workshops and individual consultations. The themes of the workshop include: organization, controlling, energy, emissions, waste, water, occupational safety etc. The idea behind these workshops is know-how transfer. Individual consultations benefit the individual company by bringing experts to their sites and providing solution-oriented service. Parallel to these activities, companies use their new knowledge for activities such as organizing an environmental team, developing an international program, stocktaking etc. The Club Program is for companies which have already completed the basic program. The Club has been operating since 1994. The Club Program consists of workshops and workgroups aiming towards continuous development and implementation of new measures while encouraging cooperation between companies, consultants, and local authorities. The Club is often described

1 Graz is the capital of the Austrian province of Styria, with a population of approximately 250,000 inhabitants.

as a platform for exchanging ideas among members, for mutual learning as well as for promoting sustainable development in the region, together with the local/regional authorities (Balcazar, 2010; Grothe-Senf and Ludwig, 2002).

There are two categories of factors that can determine the success of the Ecoprofit program (Lintz and Beier, 2006; Lintz and Nobis, 2008): on the one hand, there are general factors (existing conditions within the municipalities or the regions which can determine the successful implementation of the program); on the other hand, there are spatial factors such as the close relationship between city administration and companies; local public communication; and working in a group (Lintz and Nobis, 2008, pp. 8-9). Municipalities, more than other levels of government, are presumed to interest in a more direct way with the local SMEs and to be able to motivate them to take part in an Ecoprofit-type program. At the local level there are bigger chances for finding an interested audience (citizens, business community at large, other governmental agencies etc.) in the activities of the program and its impact. Finally, working in a group with other similar businesses, offers SMEs the chance to benefit from the experience of their peers in dealing with similar problems. Such interactions are not possible when applying for ISO or EMAS certification.

One last aspect discussed in this section refers to the impact of the Ecoprofit program. As already mentioned, from an institutional perspective, the program has been used extensively since its creation. In this sense, it could be called a success. In terms of environmental impacts achieved, there are empirical studies conducted for lots of companies enrolled in Ecoprofit programs administered by various cities. Portney (2003, p. 371) cites a 1994 report by ICLEI which states that positive impacts from the program include improved housekeeping, changes in material selections, and the implementation of new technologies and process modifications. In numbers, such changes led to 25% reduction in the total amount of paint used (a vehicle repair garage) or a 70% reduction in chemical inputs in reproduction processes (printing enterprise). In a more recent evaluation of Ecoprofit in Dresden, sizeable energy savings and reductions in emissions were achieved (average energy savings – 7.3%; carbon dioxide emissions reduced by around 1,100t per year etc.) (report cited in Lintz and Nobis, 2008, pp. 10-11).

4. Methodology

4.1. Research questions

There are two main research questions that guided our effort: a) which are the perceptions and attitudes of SMEs with regard to the greening of their operations and products/services; and b) whether Romanian SMEs would be interested in taking part in an Ecoprofit-type program.

4.2. Research method

We used a mixed method approach consisting of document analysis and semi-structured interviews. In order to get a better understanding of the activity of the

researched businesses, several documents were analyzed. These documents include: the legal charter, strategic and operational business plans, marketing plans, documents used when applying for grant money (mostly EU) or loans, documents used during various certification procedures etc. In the case of two companies, there were no such documents available, with the exception of the legal charter. After the initial screening of the documents, which took place in all cases on the companies' premises, semi-structured interviews were conducted. For each company we interviewed the manager and, in four cases, also an additional person who was in charge of administrative aspects of the operation – basic accounting responsibilities, file the paperwork; in all four cases this person was indicated during the initial interview with the manager.

4.3. Sample

Seven Cluj-based SMEs were selected for the purpose of this study, each of them having no more than 25 employees. All of the selected firms have been operating for at least 3 years.

- A printing shop;
- A car painting and occasionally auto repair firm;
- A car washing firm;
- A small packaging company (plant seeds and pesticides);
- A small timber operation which occasionally also does carpentry jobs;
- A family owned and operated meat processing firm; and
- A dry-cleaning business for clothing.

4.4. Structure of the interview

The questions from the interview were split into three main dimensions: a) attitude of the company towards eco-efficiency and voluntary instruments for reducing the impact of the company on the environment; b) self-assessment of the company's impact on the environment; areas where progress can be achieved (different types of resources committed and different time horizons); and c) interest in partnering with the public sector in an Ecoprofit-type of program. In order to get meaningful answers to the questions pertaining to this section of the interview, all the interviewees were given a short presentation of the Ecoprofit program as well as printed materials for future use/reference.

5. Main findings

The first question from the interview inquired about how managers assess the attitude of SMEs in Romania with regard to the conservation of the environment. Moreover, we wanted to find out if SMEs are interested in obtaining certificates that prove that they are paying attention to environmental issues as they relate to the operation of their companies. All the surveyed SMEs stated that the conservation of the environment is not a priority and it is usually addressed in an isolated manner, without representing an integrated part of the strategic management process. Five managers argued that in their opinion the burden of environmental conservation should

not be placed on the shoulders of the SMEs since their impact on the environment is relatively low. Rather, big companies should be held responsible since in most cases the bigger the company the larger the negative impact on the environment. None of the interviewees addressed however the issue of the cumulated impact of SMEs in light of their share in the total number of businesses operating in our country. Another reason why large companies should pay more is related to the resources available to them. One manager stated: 'large companies can afford to spare more resources for environmental conservation; therefore it is only fair to ask them to contribute more'. Several interviewees also stated that the cash flow problems and the very small profits these companies make also influence their ability to address environmental issues. One manager stated that 'the owner wants to see immediate results... preferably results that translate into more profit... very often the profit is not reinvested in the company'. A similar argument was provided by another interviewee who claimed that 'the minute a big transaction is completed and there is cash available, the cash goes directly to the owner... it is very hard to convince him to fix the pipes or the equipment... he won't invest money in something that is not an emergency...'.

All managers declared that they are interested in obtaining a certificate that proves that they comply with environmentally-related standards. Four of them claimed that in Romania you never know when a certificate might prove useful. They all offered anecdotal stories about people or companies which collect degrees, certificates or prizes. In their opinion all these can be helpful when you try to obtain European money or a big loan, when you try to create a website of the company or when you interact with partner companies from abroad. Only one manager declared that by applying for such a certificate 'you are forced to pay more attention to these environmental issues...also you need to do it in a structured way and to constantly monitor progress in the area of environmental conservation...'.

Managers were then asked if their company is certified according to EMAS, ISO 14001 or other standards. Also, inquiries were made whether they are familiar with this type of certification and whether they plan on becoming certified in the short, medium or long run. Three out of the seven companies hold an ISO 14001 certificate. One of these three SMEs had originally applied for EMAS certification but the process proved to be too time-consuming. Instead, they opted for ISO 14001. Contrary to what we expected, the remaining four SMEs claimed that they plan to get an ISO certificate in the near future. In the literature it is often argued that big companies rather than SMEs apply for this type of certification as it requires high efforts (i.e. documentation). In Romania, the situation is a bit different; there are a lot of companies which hold an ISO 14001 certificate². Though there are no clear data with regard to how many of

2 In 2010, the total number of companies holding an ISO 14001 certificate placed Romania among the leading 10 countries worldwide in this field; for more details see ISO Survey 2007, as well as Highlights of the ISO Survey – 2009 (<http://www.iso.org/iso/pressrelease.htm?refid=Ref1363>).

these are SMEs, it is believed the percentage is around 35%-45% (ISO organization, <http://www.iso.org>).

The third question tried to identify the trigger for an eco-responsible behavior on the behalf of SMEs. Managers were asked if in the area of environmental conservation, they usually comply solely with legislative requirements or if they are willing to go beyond them and pursue other strategies on a voluntarily basis. All the managers declared that they try to meet the legal requirements mainly because of the sanctions implied in cases of non-compliance. They acknowledged however that because of weak enforcement as well as corruption they are sometimes able to elude such requirements.

The fourth question inquired about the instruments/measures for environmental conservation used in the surveyed companies and about whether managers plan to use others in the future. The type of measures described by the interviewed managers can be grouped into the following categories: waste/waste disposal, energy efficiency, hazardous materials, organization/training, waste/sewage, and emissions reduction. These measures range from very basic, baby steps such as replacing old lighting fixtures with modern, ecological ones to more sophisticated measures, including a complete new technology for the main activity of the business. Many managers stated that in some areas, such as recycling/reuse, they had encountered barriers mostly because recycling programs managed by governmental organizations are not always well managed. As one manager stated 'once we wanted to get rid of some old appliances and we found out that there is such a governmental program, however the authorities failed to let us know that it only applies to residents and not to companies... we ended up with a ton of appliances at the curb and we had to take them back into the store'. None of the organizations showed interest in training which was perceived as a 'waste of time and money'. One manager claimed that in his opinion 'training, especially training done by consultants, is important for the development of the employees as individuals but not for the organizations these are working for...; it is seldom that training focuses on how to improve the organization, given the context SMEs in Romania operate in'. All businesses said that they intend to do all they can to comply with the existing legal requirements mostly because they want to avoid fines as well as bureaucratic hassle. One manager stated that 'once you get in trouble with the governmental agencies they have a tendency to keep it in mind and monitor you more assiduous than they are doing with other companies... this is something I want to avoid in the future...'. It is interesting to mention that none of the companies holding an ISO certification said that it has in place an environmental management system (underlying requirement for the certificate). When asked, one manager stated that 'yes, it is true, but we have this certificate for a number of years now and we do not constantly think about it... sometimes updates need to be done but I have to be honest and tell you that we do not use it as a tool during our daily operations... I know we probably should...'. The meat processing business stated that the business is part of a professional association and that, in theory they should follow the cleaner production guidelines designed and endorsed by this association. However the manager claimed that 'in his opinion

those guidelines are merely window dressing, the representatives of the associations had drafted them because this was their duty... however even the association knows that nobody complies with them’.

We also inquired if the surveyed companies buy green products and services and if during the selection of supplies the approach of the potential suppliers with regard to environmental protection is taken into account. None of the companies considers that a supplier’s policy with regard to the environment represent a criterion for their selection. Several managers declared that there are certain products they buy that are from recycled materials. However these products are not the most important ones during their production processes. For example several managers declared that they buy recycled paper, however this is not essential for their products.

We wanted to find out if the surveyed businesses had experienced any pressures to become more eco-efficient. Also, we wanted to know which is (are) the main trigger(s) for implementing voluntary mechanisms for the conservation of the environment. In general, the interviewed managers declared that the pressure for becoming more eco-efficient is rather low. We discovered however that several of the interviewees identified two common motivating factors: the residents from the neighborhoods where the businesses are located and their own employees. All businesses, with the exception of the meat processing facility, are located within already established residential neighborhoods. Some of the locations used to house light industrial activities in the previous decades. Because of this close interaction between SMEs and residents, which is encountered in the case of many former communist cities, the latter are more likely to complain about negative externalities that affect them and/or the surrounding environment. One manager declared that ‘in the past it was a lot easier to dispose of the empty ink cartridges... we would simply throw them away with the rest of the garbage... one day several neighbors complained that we shouldn’t do it, that we should try to recycle them or something... the first time we ignored them but one day we received a fine based on the complaint from several neighbors and thus we decided to become more responsible neighbors...’. The manager of the car washing firm stated that his neighbors complained that some residual water is not properly collected and discharged into the municipal sewage system, therefore polluting the underground water...I am not completely sure that their allegations were true but I knew that according to the law I could get fined or even have my business closed down’. Some pressure also comes from their employees. As one manager put it ‘... the younger employees, those who had just graduated, they come with a lot of fancy ideas about how to operate the business... some of them are unrealistic, I mean from the standpoint of what we can afford or are willing to do, but it is good to know what other businesses, especially from abroad, are doing. In many cases it is about the introduction of new technologies which are more environmentally friendly’. Another manager said that the employees working in the administration of the business have started different initiatives for becoming greener – ‘we put a bike rack in front of the building for customers, we buy only recycled paper and other similar products, we

can only order lunch from a bio/green restaurant etc.’ He acknowledged however that ‘these are efforts driven by the ambition and perseverance of employees who are eco-conscious outside the office as well’.

The second section of the interview concerns itself with how managers assess the company’s impact on the environment; and if they identify areas where progress can be achieved (different types of resources committed and different time horizons).

We first asked them if any type of analysis was conducted in order to determine the impact of the business on the environment or if they plan to do so in the following year. None of the companies had conducted any form of structured/formal analysis in this field. This lack of formalization is present with regard to other areas of the businesses’ management. Formal strategic and operational documents are missing from their files; where they exist, this is the result of the requirements of ISO certification or of applications for bank loans. However, several managers had made inquiries about certain products/technologies that could be applicable in the case of their business. The manager of the meat processing business stated that ‘a few months ago there was technical assistance offered through a professional association at a low cost; it addressed the enhancement and modernization of the entire production cycle, including environmental aspects, mainly energy reduction and waste management’.

Managers were then asked to assess, on a scale from 0 to 5 (0 being no impact while 5 is high impact), the environmental impact of their business field and also of their own company, as an individual entity. There was only one manager who assessed the environmental impact of his field of operation as high; he explained that he is aware of all the stories presented on TV about how timber operations heavily pollute the environment. However, he assessed the individual impact of his business as being relatively low (2). The general tendency of all the interviewed managers was to consider the individual impact as low. One manager declared that ‘we are such a small business that no matter what we do the impact is not going to be significant’.

Managers were asked if there any areas/processes which they could make more environmentally friendly and if they are aware of methods/technologies for doing it. Four of the interviewed managers declared that they had seen and/or visited state of the art facilities in their field of operation. They were able to name processes and technologies which will make their business more eco-efficient. Three of them also knew how much it will cost them to implement these technologies and if they are available in Romania. Their answers to this question proves that even though they do not conduct formal analyses regarding the environmental impact of their business, they do know certain things and more importantly they try to plan ahead, even if in an unstructured manner. Most of the changes proposed by the managers referred to aspects of their businesses that are visible to neighbors and authorities. In some cases their solutions had more to do with appeasing the community than with solving the negative environmental externality. As one manager put it ‘I am very careful to give the neighbors the impression that we recycle the cartridges, in reality I just don’t dispose them where they (the neighbors) can see them’. Another manager declared

that his first concern was 'to take care of those aspects that were unpleasant for his neighbors – noise for example, as well as the saw dust'.

Another question inquired about the correlation between cost savings and investments in eco-efficient production methods. All of the interviewees pointed out that in their opinion the initial costs of having eco-efficient production methods and technologies are too high for the business they operate. Two managers pointed out that they are not even sure their business is still going to be in operation in two or three years. In one person's opinion 'in theory we all know that over time those initial investments are going to pay off, however sometimes we simply can't afford to wait...our business could get bankrupt in the meanwhile, especially with all the economic instability from Romania'. Three managers declared that dissemination among fellow managers of successful practices in this field is the key. One manager compared investment in eco-friendly technology in his field with the governmental sponsored program meant to insulate the apartment buildings from the communist era: 'In the beginning nobody was interested in insulating their apartment, however after several residents had done it and were able to then observe the real benefits, everybody became interested. I think that people are more willing to believe such stories if they come from their fellows and not from state authorities or other organizations which are removed from what happens in the real life'. Along the same lines, a second manager declared that he will implement more costly technologies which protect the environment only if other competitors do it. In general, all managers are at least partly aware that over time the initial investment will pay off, however uncertainty coupled with lack of information seem to be the main deterrents.

The third section of the interview investigated the interest of the SMEs in partnering with the public sector in an Ecoprofit-type program. We first asked managers to assess Ecoprofit by comparing it against ISO 14001 or EMAS. We asked them if Ecoprofit is 'less' or 'more' from the SMEs' point of view. In the preliminary discussions with the managers we made sure that all of them had basic knowledge about these programs/certifications. One manager declared that 'everybody had heard about ISO but this is for the first time when I hear the name of Ecoprofit'. Two managers claimed that the city hall will never initiate such a program since 'they do not care about SMEs, about how they can help us...they are only interested in big companies which can hire a lot of people...they can then say that they worked with the business sector to increase employment and thus gain more votes...'. The managers of companies who hold an ISO certificate declared that they opted for it because it is recognized worldwide and everybody sees it as 'legit'. Only one manager stated that in his opinion, based on the information provided about Ecoprofit, 'the program seems to cater to the specific needs of SMEs...it looks as if the program really cares about our businesses and our needs...my experience with technical support in the past was highly impersonal...I did not feel as part of the solution offered'.

The managers were asked to assess the role of the actors involved. They were asked to say which of the following actors – the public authority, the consultants or

the peers in the working group, could provide them with the most useful support in addressing environmental issues as they relate to the operation of their company. All the interviewees perceive that the local public authorities are key actors in relationship to their businesses. As one manager put it 'it is the city hall we go to when we need a permit...or when our neighbors complain they often approach the city even if the city is not the competent authority to fine us'. Two managers argued that the city hall should also involve other governmental agencies in this program. Since in certain cases they need to get special permits from and can be fined by other agencies besides the city hall, the managers want to be sure that these agencies know that they participate in a voluntary program. One manager stated that 'they are more likely to cut us some slack if they know that there is somebody monitoring what we are doing. For me, and I think that for others as well, partnering with public authorities will act as a safety net...I don't have to constantly worry about when the authorities will pay me a visit...'.

Most managers declared that they are completely distrustful of consultants and three managers even went thus far as to argue that they want nothing to do with them. When asked to elaborate, most managers explained that they had bad experience with consultants, especially when trying to get bank loans and/or when applying for European money (this situation was more frequent). The main problem with consultants, based on their previous experience, had to do with fees/costs as well as with the lengthy process, marked by numerous two or three hours meetings, discussions etc. The attitude of experts in most cases also seems to be a problem: 'they treat us as if we know nothing about the businesses we run...sometimes they are rather arrogant and think that their expertise entitles them to treat us as inferior individuals...'.

Peers on the other hand are seen as extremely important; their experiences and input is seen as trustworthy by most of the interviewees. However, three managers explained that they would prefer to be partnered with peers facing the same problems. One manager declared: '...last year I attended a seminar on quality assurance, where we had several assignments...I was paired with a manager of a gigantic SME, we had nothing in common...the challenges were completely different'. Other managers declared that they would trust 'any suggestion coming from a peer, even a peer they are in competition with, because the daily running of a business offers insight which is invaluable...no consultant, no matter how good, can have it'.

Managers were asked to list three factors which would heavily influence the success of such a program, from the SMEs' point of view. Four managers pointed out that they would agree to participate in such a program only if it is coordinated by the city and only if upon completion they will gain a tangible result, for example a certificate. As one manager declared: 'I don't have time or resources to get involved in something that is not official...I don't want to have to deal with banks, consultancy companies or even the Commerce Chamber'. Another factor mentioned by several managers refers to keeping paperwork to a minimum; as well as minimal fees for entering and completing the program.

The final question inquired if managers would be interested in obtaining the certificate at the end of the first year. Also we wanted to find out what type of value/

purpose they assign to this certificate. As already mentioned, all the interviewed managers view the certificate as the most valuable outcome of the entire program. As one manager declared ‘degrees and diplomas are important in Romania, you never know when you will need them...several years ago I didn’t consider ISO certification important nowadays I can’t participate in public procurement tendering if I don’t have it...’. The certificate is perceived as an end in itself and less as proof of an increased performance in the field of environmental management. Several managers also declared that the certificate could help them improve their company’s image, especially if the certificates are awarded in a public ceremony which will be highly advertised. Five managers also declared that they would be interested in this certificate only if the reaccreditation procedures are kept to a minimum. They argue that they see the point in continuous monitoring, to make sure that everybody keeps following the rules and making progress, but, on the other hand, their resources, especially time and employees are limited.

6. Recommendations and conclusions

As part of the sustainability agenda, the greening of local economies is an important goal for a broad variety of stakeholders; different stakeholders very often have diverging priorities and interests underlying the broad goal of sustainability. Due to shifts in the area of environmental policy – level where policies are drafted/implemented, actors involved, tools used etc., partnerships among various actors are nowadays common. Municipalities no longer use merely regulatory means to promote environmental protection; they prefer to engage in partnership-type programs with the SMEs and to offer them incentives for becoming more eco-efficient. On the other hand, SMEs themselves are starting to realize that in numerous cases some changes in their production processes or the way they select suppliers could lead not just to positive environmental impacts but in the same time to savings.

The program analyzed more in depth – Ecoprofit, is very interesting and instructive as a local and cooperative policy approach. Though more research is needed on its impact, it is nonetheless a successful program given its widespread and also given the resource savings some of the firms enrolled obtained.

Our empirical research showed that the success of such a program may be contextual and therefore should be addressed in close connection to the broader governance arrangements within one country/region. Our research points out toward a major problem with the win-win philosophy underlying Ecoprofit. SMEs have little incentives to voluntarily improve their environmental performance whilst they remain unconvinced of the business case for sustainability. According to the researched SMEs they would endorse such a program provided that it has minimal fees, it offers a certificate in exchange of little improvements, and it keeps paperwork to a minimum. In light of these findings, municipalities should carefully consider the proper instrument to achieve an increase of environmental performances from SMEs.

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