



Common Power – Social Enterprises and Renewable Energy

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Common Power Social Enterprises and Renewable Energy



METLA



2007-2013

Innovatively investing in Europe's Northern Periphery for a sustainable and prosperous future



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Helga and Björn, a happy farmer couple from the very rural Iceland have an own small-scale hydro plant. By using the power from the mountain stream they produce their own energy. Safe, clean and sustainable energy means a lot for the farming “it is the reason we can look together to the bright future”.

– Botn in Súgandaörður, rural Westords, Iceland

INTRODUCTION

A key issue in many OECD countries is how to improve the standard of living of the rural population. People living in rural areas are highly dependent on the declining agricultural sector, high unemployment rates and scarcity of regional development alternatives. In this paper, we try to provide insights into rural communities as a ground for establishing social enterprises in the field of energy.

Dependence on the agricultural sector is a challenge for many rural societies. The sector is declining fast and new ways have to be figured out in order to keep up the standard of living. Renewable energy may offer a new business era for farmers. Not only may it offer a possibility for new incomes, but it may also offer lower energy costs, which may lead to better profitability and competitive advantage.

As we will discuss later, our society will face

drastic changes when it comes to our energy solutions. We will become more and more dependent on energy, while the whole industry sector is facing challenges when it comes to production. We are in need of new solutions in order to be able to keep up our living standards. Renewable energy sources will gain more foothold in future. This change in the entire sector offers different opportunities for different areas. We will discuss how certain communities and rural areas are especially in need of these changes, and how they may be able to benefit from the opportunities that renewable energy can provide.

Changes in international attitudes towards energy production drive changes. Germany's decision to run down their nuclear power before 2022 has raised the discussion about renewable energy solutions, and has woke up decision makers around the world. At the

same time changes in consumer interests and behaviour has speeded up the discussion around renewable energy diffusion. The European Union is driving adoption and diffusion by defining the international goals for renewable energy (e.g. EU 2020 directive, which will be introduced later). On a national level, the goals may differ and they can even be higher than international goals. A great example of this is Sweden. In Sweden the target for renewable energy is high, as they aim for 50% of national supply before 2020. (sweden.se)

While the interest is rising, unfortunately adoption, diffusion and changes have been relatively slow, but some progress has been made already. In the future there will be barriers to surpass before renewable energy solutions can meet energy consumption needs.

The Eno Heating Cooperative has produced nearly 15 years local wood chip heating. It is said that, key factors for success in Eno have been the involvement of community members, like farmers, forest and property owners. Willingness to cooperate for common goal to save the environment, influence the energy price and quality are very highly appreciated values in Eno.

– Joensuu, Finland.

RENEWABLE ENERGY – WHY DO WE NEED IT?

In this chapter we will go through the concept of renewable energy (RE), explain what we mean by the term. We will briefly discuss why we need renewable energy. We will also go through the main international agreement made in order to increase the amount of renewable energy in production and consumption. After the chapter you should understand, what renewable energy is and why we need it.

First of all, the definition for renewable energy is basically very simple. As long as the energy comes from a source that naturally replenishes, it can be called renewable energy. Common renewable energy sources are wind, sun, water (rain, tides, waves), biomass and geothermal heat. Wind power has become the most commercialized of all. When we look at the Nordic scale, hydropower offers one of the

main sources of electricity, as Norway is one of the world's largest hydropower producers and exporters . (IEA 2008). Hydropower has spread all over Northern Europe and small-scale hydro solutions are indeed quite common. Biomass means the material is derived from originally living organisms. Typical biomass is bio waste or by-products from agricultural source. Biomass is usually available locally, which helps the diffusion. Especially when we consider rural areas in Northern Europe, where biomass can be derived from the unlimited sources of wood from the forests. Solar power (power derived from the sun) has gained a lot of interest, but it is quite challenging especially in Nordic areas. Geothermal energy offers a solution for small-scale energy production, but especially in Iceland. Geothermal energy does not exist significantly in other areas.





The rapid growth of climate change, the increasing cost of the energy and the desire for sustainable growth have created more interest towards renewable energy solutions. Climate change has reinforced the discussion on how we should be producing the energy we use. This topic has been given special attention on a national level, especially in Western societies, but it has also received a lot of global interest. At the same time while we are in need of more energy, we are struggling against the higher prices of energy from traditional sources. Oil and other non-renewable sources of fossil energy will not last forever, and to fight climate change we will need new solutions. Using bottom-up strategies might offer solutions to the adoption and diffusion of renewable energy technologies; and will be discussed throughout this paper.

Renewable energy is not a new topic. The discussion has culminated around the issue of climate change in recent decades, and especially in recent years. Anecdotal evidence would suggest that this discussion has not been absolutely determined. There has even been discussion on whether we are going through the climate change at all. If we are to accept that climate change is happening then this has not been offset by a growth in the adoption and diffusion of alternative renewable energy technologies, which has although been quite remains quite low. This, however, is not rare, when it comes to totally

new technological innovations. If we want to be able to achieve the goals that we have set for our emissions, we will need to work on our energy production and change it. Lowering the level of emissions is not an intrinsic value itself, but rather a prerequisite for securing the diversity on our planet.

In 2009 the European Union accepted the directive 20-20-20 (officially 2009/28/EY). According to this, by the year 2020, 20% of energy consumption should be covered by renewable energy, greenhouse gas emissions should be reduced by 20% and energy efficiency should be improved by 20%. If we want to reach these goals, we need intensive work in the field of renewable energy. One must bear in mind that the directive is not governed without reason. This was a signal from European decision makers that they want to be prepared for the fight against climate change.

We must agree that the present situation in energy usage and production is not optimal or even close to it. Climate change and the decline of traditional energy sources have challenged our society. This review will open up the discussion on how we can provide renewable energy using bottom-up way as opposed to top-down solutions. Rural areas and renewable energy solutions offer us an opportunity for that.

Community of Upperlands is run by strong will to fight against urbanization. Local energy production, own cafeteria and other community activities are good ways to stay lively.

– Upperlands, Northern Ireland

THE CONCEPT OF SOCIAL ENTERPRISE – WHAT DOES SE MEAN?

This chapter focuses on defining and describing the concept of social enterprise clearly. Since there are currently some misunderstandings of what social enterprise as a term means, we will also try to explain to it.

Social enterprise is a difficult term to define. According to Kerlin (2012), social enterprise characteristics differ between the regions of the world. The problem mainly lies in the dual meaning that the English term ‘social enterprise’ has. It may for example mean a company providing working opportunities for workers, who are not able to compete on the traditional labour markets. In this context the term has a different meaning than we want you to have.

The definition of SE given by the UK government is: “a business with primarily social objectives whose surpluses are principally

reinvested for that purpose in the business or in the community, rather than being driven by the need to maximise profit for shareholders and owners” (The National Archives, 2013, p. 6). This definition emphasizes the motivational factors behind social entrepreneurship. The main idea for bringing up this definition is that it captures the main idea quite clearly. The business is run to make a positive social difference. Basically, social enterprises may have any legal form and it may operate in any industry. It competes on the free capitalized markets and it does not receive any incentives from the public sector such as tax reliefs. It may and should make profit, although the main part of profits should be used to achieve social goals or to developing the company (in order to gain social goals in a long run). This does not mean that social enterprises are unable to create profit for its owners. It is totally acceptable that it does so as long as it is not the top priority in its operations.





Further in this review, when we talk about social enterprises or social entrepreneurship, we mean a company which:

- has any legally accepted company form,
- operates in the same markets with other companies (if there are any),
- tries to make profit (at least in the long term, unless they are established as non-profit),
- uses the main part of its profits to develop the company or to support the company's defined social goal, rather than on paying dividends, and
- is established in order to achieve some social goal or social development.

As we can see from the definitive points above, the social enterprise as a term mainly differs from the definition of enterprise in general, as it has a social goal or it aims to contribute to social development, and it uses the main part of its profits to develop the company or/and to achieving its social goals. This does not mean that a social enterprise could not, in financial sense, be profitable to its owners too. The main goal is not to pay dividends, but it is still acceptable. This can be looked reversely. The so-called "normal" enterprise aims to bring as much welfare as possible to its owners, in other words its main goal is to pay dividends. At the same time it may have an interest to solving some social problem. Solving the social problem just isn't the main goal. It does

not mean that it is unacceptable. Usually companies, especially big companies, have a social responsibility program.

There are a wide variety of social goals that social enterprises may look for. These can be local or global, linked to the environmental issues, issues concerning the developing countries or minorities etc. The list could go on and on, but here we mention only a few of the main categories. Social goals vary among enterprises and they can have multiple natures. However, one must keep in mind that job creation, as a goal, is not enough to make the company a social enterprise.

Sometimes people tend to think that it is either or, when it comes to profit or social goals. We can look at this from two perspectives. This simplified example hopefully helps the reader to understand the nature of social enterprises and shows that the definition is not as complicated as it first seems. It also shows us that the profit for owners and social goals are not exclusive to each other. As a traditional company aims to make profits it may also have a social goal. Thus, social enterprises aim to create social welfare, but may also gain profits for its owners too. According to Kerr (2007): "Social entrepreneurship is an investment, not a gift, and not charity".

Community owned Gorgie city farm is unique place. The farm is located in the city center and people are working there on a voluntary basis. The farm is excellent place to relax for busy citizens. Gorgie city farm produces electricity via sun panels and thus it is energy self-sufficient place.

– Edinburgh, Scotland

SOCIAL ENTERPRISE – WHY SHOULD WE WORK THROUGH THEM?

This chapter focuses on the socioeconomic benefits that social enterprises may offer. Some of the discussed benefits may seem self-evident, but at the same time it should be made clear that social enterprises are in many ways just like other companies. On the top of these benefits, social enterprises have some characteristics, that make them different from traditional companies. These will be discussed in the chapter. After this chapter you should know what kind of benefits social enterprises have for individuals, communities and society in general.

The rise of social enterprises has fuelled academic and practical discussions surrounding the topic. Despite the increased discussion,

this is an emerging area and more in depth research is needed. The challenge has been in finding the right tools in order to qualify and quantify the socioeconomic consequences that social enterprises have. Some of the benefits and impacts that social enterprises have on society have been recognized and although, the research topic is relatively young, it is possible to point out many positive consequences, which will be introduced below.

The focus will be on recognized social and economic benefits and impacts. Some of the statements are mainly based on assumptions and theoretical views, which is due to the difficulties of measuring the effects. More support for the statements are needed, but this paper provides some of the claims from the literature.





The Eno Heating Cooperative owns three wood chip heating plants, taking care altogether of eight biomass boilers. The cooperative buys the energy wood for chip production from the local forests. Local energy wood markets increases regeneration of the forests and by using wood chips, the community saves 1 million litres of light heating oil annually.

– Joensuu, Finland.

Job Creation

Social enterprises play a significant role in job creation (MacArthur 2010a, Young 2006, Haugh 2005, Southern 2001, Borzaga & Santuari 2003, Borzaga & Defourny 2001, Smallbone et al. 2001). This role can be even more significant in rural areas (Macarthur 2010b), where the employment rates can often be lower compared to other areas. Job creation can have both economic and social impacts.

Job creation is a positive consequence from entrepreneurship in general. It is an example that although social enterprises are ‘social’, they have the same kind of positive effects on the surrounding world that enterprises in general have. Some examples from the social entrepreneurship sector describe the job creation potential of social enterprises. For example, Greenwich Leisure Limited, which is a London-based gym chain and also a social enterprise, has 1400 full-time permanent and 3000 part-time employees. In Great Britain in general there are 800, 000 people working for social enterprises (SEL 2004).

The job creation potential in quantifiable

terms is great, as we can see from the example above. On top of that there is also a qualitative approach to the topic. Social enterprises not only create jobs, but also more often create jobs that the conventional labor market cannot or will not supply (SEL 2004, Venture Fund Initiative 1999). It may be that some social enterprises see job creation for some specific target groups as their social mission. We must remember that this does not mean that these enterprises do not have the potential to be financially successful too.

Allan (2005), claims that the level of commitment to a job is higher when the employer is engaged in a social mission. Allan also suggests that higher job satisfaction occurs in employment relationships where a social mission is present. Allan’s claim is widely supported in the literature (cf. Benz 2005, Borzaga & Depedri 2005, Borzaga & Tortia 2006, Tortia 2008).

It is also suggested that employee commitment and job satisfaction, is higher in social

enterprises compared to enterprises in general (SEL 2004). Social enterprises in many cases employ local people, which – especially in rural areas – shortens the car journeys made by employees. This can have an indirect impact on employee satisfaction and on some levels also a positive environmental effect. (Haugh 2005.)

Some criticism that has been made towards social enterprises is that they do not actually create new job opportunities. Blair (1999) suggests that it is not even necessary as long as they redistribute the wealth and that way create equality in society, which is something social enterprises do. In some cases social enterprises have even been able to keep the market for products or services buoyant, when other companies could not. For example a case from the Scottish Orkney Islands demonstrates this well. We will discuss this later in the responsiveness for market fluctuations chapter.

Social Enterprises and Community Involvement

Social enterprises can be community-owned and quite often they are. By ‘community’ we mean any group of people, who live in the same geographical area and feel they are somehow interrelated to each other. We must keep in mind that this does not mean that everyone has to be involved in the project, although they would live in the same geographical area. In these projects it has been recognized that community-involvement is naturally higher and has many positive effects on social environment (cf. Warren & McFayden 2010, Gipe 2009, Bolinger, 2005, Jacobsson & Johnson 2000). It has also been recognized that attitudes towards these kinds of projects is more positive, due to the possibility of being involved in designing and implementing projects (Peattie & Morley 2008).

Social entrepreneurship increases the interest towards the project and that way makes it easier to win the challenges of resistance.

For example, in wind power projects the attitude of “not in my backyard” is very usual, but in community-owned projects this kind of resistance is less frequently recognized (MacArthur 2010a). The thought of “others making money on us” disappears when the enterprises are community-owned. The disappearance of the negative attitudes towards, for example, renewable energy supports the technological diffusion as a side effect (Walker et al. 2007). Social entrepreneurship can be seen as a community asset-building process (Green 2007).

It is also been claimed that social enterprises raise the level of democracy inside the community (MacArthur 2010a). They raise the feeling of belongingness, community self-respect and even friendship relations inside the community (Southern 2001).

Community-owned projects are also keen in helping communities to learn from their resources (MacArthur 2010a). The knowledge and resources are kept inside the community helping other projects to succeed using existing knowledge (MacArthur 2010b).

Being community-owned may be also be a benefit in the sense that the needs of customers, can actually be met, or indeed better served than traditional business owners or entrepreneurs, (Allan 2005). Social enterprises are keen to create personal relationships with people (Birkhölzer 1999) and raising the spirit of “we can do it ourselves”. These built relationships are beneficial to the entire community. (MacArthur 2010b.) Social enterprises re-engage citizens in the management of their own welfare (McCabe & Hahn 2006).



On Island of Rousay, there are only 200 islanders living in very rural environment. Despite or peripheral location they still have own school and electricity production, thanks to wind, which helps to maintain both. Incomes are used to organize events and supporting hobbies of community members, like handicrafts and gardening.

Tax Incomes and Multiplied Economic Effect

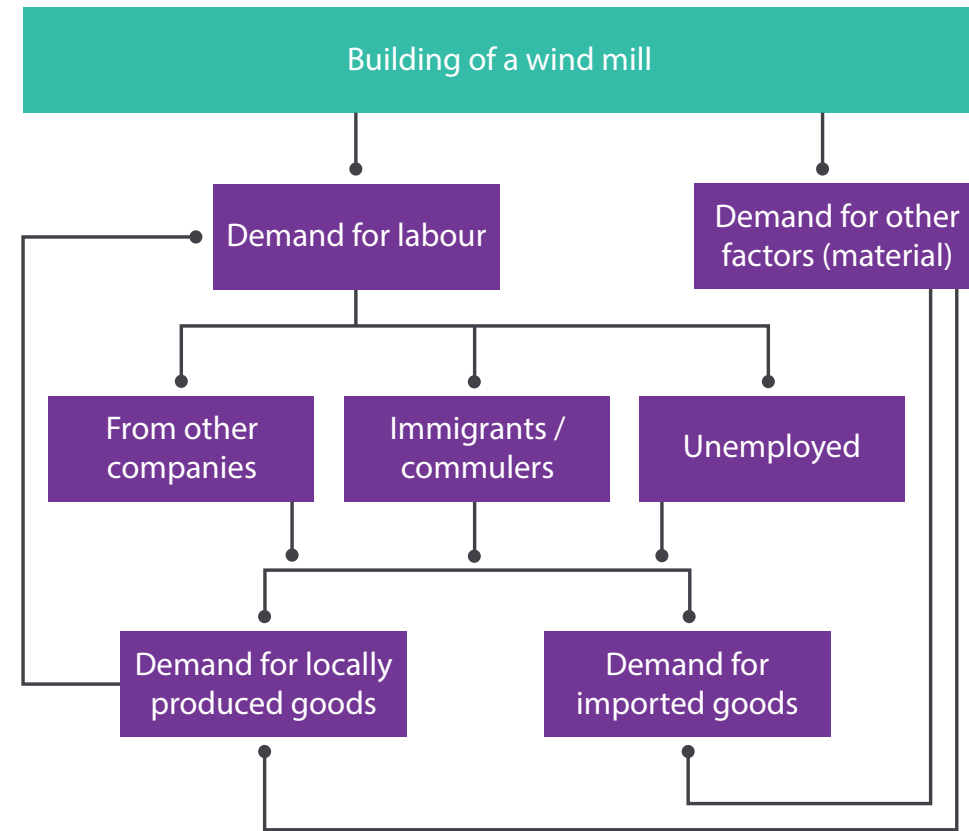
It is obvious that created jobs create welfare to the community in the form of tax income. Social entrepreneurship also guarantees that the created welfare via community resources is kept inside the community. (MacArthur 2010a.). This creates multiplier effects when people probably use their money to buy local products and services (Haugh 2005).

Figure on the right represents the capital flow inside the community, when the investment is made. For example, building a new windmill creates demand for both labor and other factors such as material etc. Together these factors create demand for goods; local and imported, which creates more need for labor. The point is that investment usually creates a positive capital flow inside the market area. This is why we usually talk about the multiplier effect that investments have on the local welfare. This means that the investment made creates more markets for other market actors too.

An example of this can be found from Finland, where the Eno energy co-operative has been able to create a supply chain for local products and the need for local workers. Eno energy co-operative buys the raw material for heating, in this case pellets, from the local landowners. By producing the energy locally using local raw material and a local workforce, they not

only create tax incomes but they also offer relatively inexpensive energy for local people, which once more helps in creating positive economic consequences. In Scotland the investment granted for social enterprises

presume that all the money flow is transparent and the use of the income is public. Anyone can find out how the money was spent and which social goal it was used to further and how. (Armstrong & Taylor 2000)





Community members, living in Hoy have done a great work putting effort to get own wind turbine running. On windy island it means wealth and sustainability for the community and the environment.

– Island of Hoy, Orkney, Scotland

Option for Consumers and Markets

No one can force people to buy products or services from social enterprises. Still, it gives consumers another option. Social enterprises are keen to tackle the inequality that capitalism has created in markets (Teasdale 2012). Social enterprises are not only an option, but also often a producer of goods that other companies cannot offer (Teasdale 2012).

Sparsely located areas are often , unattractive for private companies where there are a small numbers of clients , and it is also difficult for the public sector to produce the needed services, which leaves market gaps for social enterprises (Steinerowski & Steinerowski-Streb 2012). Case study evidence appears to show that social enterprises decisively fill the market gap left by private and public sectors (Leadbeater 1997). It can be argued that people in rural areas are more able to identify their local needs than people from outside the area (Steinerowski

& Steinerowski-Streb 2012). Supporting the previous statement Dees & Anderson (2003) suggest that social enterprises are often very market responsive.

Social entrepreneurship is a choice and it can be seen as a source for brand and reputation building in the eyes of the consumer (Allan 2005). Social enterprises can communicate their offer in different ways. Social enterprises empower consumers to get involved in responsible buying behavior by offering options that can have a social impact (SEL 2004). Social enterprises social missions may give them unique selling propositions vis-à-vis competing enterprises (Chell 2007). The brand and reputation advantages for the company may not be seem beneficiary to the society in a straight forward manner, but they illustrate that social enterprises are an option for the markets, and in that sense needed.

Social enterprises are enterprises and their goal (like every company's goal) is to produce profit. Markets (=consumers) have the right to decide whether they want social enterprises in the markets or not. Social enterprises offer an option for consumers and are in that way beneficiary for the whole market.

Social enterprises can sometimes produce products and services with lower prices than traditional companies, because of their lower need of profit margin (MacArthur 2010b). This can have a positive impact on the purchasing power amongst community members. For example the Finnish social enterprise Lumituuli, produces wind power for the use of its owners who are mainly private persons. The idea is to guarantee the source of electricity but also to produce it cheaper than the traditional companies would do.

An entrepreneur Mr. Matti Pappinen is well-known about inventions. Products like a pellet pressing machine and a pellet burner has been developed by the machinery company M. Pappinen. These inventions have been beneficial for bioenergy sector in North-Karelia.

– Polvijärvi, Finland

Social Enterprises are Efficient

One of the main advantages presented in the social enterprise literature is the efficiency in service delivery that social enterprises have. This is especially in comparison with the public sector (Borzaga & Tortia 2009a, Dees & Anderson 2003). Peattie & Morley (2008) suggest that the efficient delivery of public services is one of the main magical “E” contributions that social enterprises have. Others are economic development, employment and enterprises.

There are examples of highly successful social enterprises that deliver services in a very efficient way. One is ECT (Ealing Community Transport) – established 25 years ago, now a £22M turnover business that provides community transport and recycling services that are economically sustainable and bring environmental benefits (Chell 2007). Public transportation can be seen as a challenging service to deliver in a profitable and efficient

way, but examples show that it is possible. Improving local public service delivery, social enterprises have been able to demonstrate their success as providers of local services (SEL 2004). In Northern Ireland, Bryson Charitable Group is one of the leading social enterprises with seven different business units. Their turnover was in 2013 £34M with positive fund movement of £1,5M. (Bryson Group Annual Report)

One of the reasons behind social enterprise efficiency, is their flexibility. Social enterprises are keen to provide their services in a way that is as straightforward as possible. Not many social enterprises have high hierarchy in their organization. It is more likely that social enterprises focus on doing rather than on planning. This is of course not always a good thing, but it increases the efficiency in their business.



The traditional beating method and apparatus is almost vanished, but in Upperlands they still produce high quality linen by using modern small-scale hydro turbine.

– Upperlands, Northern Ireland

Innovativeness

Social enterprises often focus on serving basic, long-standing needs in more innovative ways than the public sector (Stevenson & Wei-Skillern 2006). Dees & Anderson (2003) recognize that innovativeness is one of the key characteristics of social enterprises. According to Leadbeater (2007) innovativeness especially occurs in the area of environmental services. This can be very beneficial in the field of renewable energy.

When it comes to finding new technological ways to solve energy issues, social enterprises have great potential to take these projects further through their innovative approach (MacArthur 2010a/b). When discussing innovativeness, social enterprises are seen as opposite to the public sector, which Dees (2007) describes to be “antithetical to innovation”. Simply, social enterprises stimulate social innovations (Borzaga & Santuari 2003). Social entrepreneurs are seen as agents of change. They continuously seek new ways to change the environment they operate in. (Chell 2007.)



Business Opportunities for Others

Acs et al. (2009) suggests that social enterprises create future business opportunities for other companies too by gaining knowledge from markets. Some of the unattractive business opportunities can become attractive when the business model is developed further. Social enterprises in this sense open the doors for different corporations to launch business in their market areas. Acs et al. (2009) sees social enterprises in a key role in creating such knowledge spillovers. The neoclassical approach to entrepreneurship does not offer the only answer to the motivational factors for entrepreneurship.

Thornton et al. (2012) offers a similar suggestion regarding the role that social enterprises play in creating new market opportunities for other companies too. They claim that social enterprises generate knowledge spillovers and provide valuable market information to other companies. Social enterprises can enter the markets at a lower cost due to their different approach to profit maximization. Other firms are able to exploit and scale opportunities whilst social enterprises are creating market knowledge.

Risk-Taking Benefits the Economy

The willingness to take risks is suggested to be higher in social enterprises (MacArthur 2010b), which may be beneficial in the sense of growth. Social entrepreneurs are willing to invest their profit in developing their business in order to tackle the social problems they have defined. This creates both social and economic benefits to the community.

First of all, social enterprises take a risk when entering the market, which might not be interesting for other companies. This is usually done in order to solve some social issue. Riskiness is always present when it comes to business, but social enterprises more often operate in markets that are not attractive for most of the companies. Another way of taking risk is that social enterprises invest the main part of their profits in order to grow or they use the money to achieve the social goal they have. This can be seen as risky, but it is also beneficial for the economy as the money keeps on flowing inside the community.

Market Decentralization

Social enterprises are keen to decentralize power in the markets. This can be extremely important in some specific business sectors. For example, the energy sector is claimed to be a sector where markets have strongly

focused on some big business actors. Social enterprises can offer an alternative to the highly centralized dominated power markets. (MacArthur 2010a.) Social enterprises have the possibility to develop markets and create competition. In particular, renewable energy production in communities can be beneficial to the community in many ways as well as being beneficial to the market structure (Scheer 2007).

Social enterprises to some extent tend to operate in markets with no or very little competition. Social issues tend to rise when markets have no actors or actors face no competition. As mentioned above, energy markets are a good example. As they have faced no competition in the past decades, there has been no requirement to serve customers, for example, in rural areas. Social enterprises are able to solve the market centralization issues as they offer a unique approach to the markets that might be extremely centralized. We call this approach bottom-up. In this context, it means that the people are solving market issues on a local level in local markets.

Investment Opportunity with Double Benefits

Social entrepreneurship is investment, which creates two different kinds of interrelated results: social progress and financial returns. While the ultimate goal of a social entrepreneurship project is to build

a sustainable solution to a social problem, the traditional business entrepreneur seeks pecuniary gain as the ultimate end. However, there is an important similarity between these two goals: both traditional and social entrepreneurs are in business to make a profit. (Kerr 2007.)

Chell (2007) suggests that no matter whether we speak about social entrepreneurship or so-called traditional entrepreneurship it is difficult to say that either one is purely motivated by social or financial goals. Usually all entrepreneurs have seen the challenge they want to win and motivational factors may not be purely social or financial. Social enterprises usually have the highest focus in tackling some social problem. Thus, it is obvious that social enterprises also provide good for the social environment. This so-called double bottom-line is a very important part of success measuring in social enterprises. (Chell 2007.) Social enterprises are investments that create welfare and income for its stakeholders.

The Institute for Social Entrepreneurs (USA) defines social entrepreneurship as “the art of simultaneously pursuing both a financial and social return on investment”. The definition captures the idea behind the whole concept. The social ROI may be as valuable as the financial ROI. The desire to solve some social issue or further social development are valuable motivations for many entrepreneurs. ‘Making the difference’ is a keen motivation for many social entrepreneurs.

we hope that Corrymeela will come to be known as ‘the open village’ – open to all people of good will who are willing to **meet** each other, to **learn** from each other and **work together** for the good of all.

Ray Davey, founder of Corrymeela (1965)



Corrymeela Community Group successfully completed a renewable energy project, which included the installation of a wind turbine, solar thermal panels, as well as a rainwater harvesting system. Project is generating profits every year, which are then reinvested into the Corrymeela community for the benefits of the residents and visitors. Annually in Corrymeela there are thousands of visitors.



Delivering Higher Customer Satisfaction

Social enterprises are claimed to provide better customer satisfaction than other companies that do not work for the social mission as their core business idea (Allan 2005). High customer satisfaction in social enterprises supports the claim that they offer a good option for consumers and fulfill their needs and desires.

High customer satisfaction might be a consequence from social enterprises seen as good companies that offer an option for 'traditional' companies. This image might help them in delivering high customer satisfaction. This is also linked to the customer's own desire to make good. As social enterprise offers customer an option for buying and 'making a difference' it increases the level of satisfaction with the entire purchase.

There are also different opinions stated in the literature about this benefit. Dees et al. (1998) stated that as social entrepreneurs have the main aim of achieving their social goal, they may 'forget' their target as creating that benefit via customers. Customer satisfaction then may not gain as much attention as it should.

This is a justified insight, but not the whole truth. Social enterprises' customers may feel that their purchasing decision contributes to the social goal that the company has. This way customer satisfaction becomes higher as customers gain the double-benefit from their purchase as well as the entrepreneur does.

Creating Sustainable Rural Communities

Social enterprises diversify the mix of the local economy by promoting enterprises that respond to local needs (SEL 2004). Social enterprises might contribute to creating sustainable rural communities (Steinerowski & Steinerowska-Streb 2004), which benefits the community to a large extent by offering people an opportunity to choose their place to live. Rural communities are often economically unsustainable. Social enterprises may offer the ground for establishing new income generating businesses for those areas. They may also be a way to create services for the areas that

would not be attractive for other companies. It might be that no one is willing to take the responsibility for financial sustainability in communities if they are not willing to do it themselves. In Germany communities own three quarters of installed wind power capacity, which shows that something can be done to create sustainable communities. Communities have taken the responsibility of their own energy production, as it has been widely attractive for them. (Schreuer & Weismeyer-Sammer 2010)

Social enterprises are seen as the empowering force for communities. Peattie & Morley (2008) state that social enterprises are offering place-specific contributions to regeneration and community development. By 'place-specific' they mean that mostly the contribution that social enterprises have on the economy is local. Local benefits create welfare at local level and help the community to gain even more good in the long run. This was demonstrated above when discussing other benefits such as tax incomes.

Delivering Services to Those That Do Not Have Options

Social enterprises can in a very simple way provide positive social impact in society by targeting their products to the groups of people that would not have access to those goods and services in other ways (Dees & Anderson 2003). For example, London-based gym chain Greenwich Leisure Limited provides its service to the customers that do not have the possibility to join more expensive gyms located in the heart of London. By producing the services in cheaper areas they can deliver the service at a lower price and do good for social welfare.

This socioeconomic benefit can seem obvious, as one of the reasons for the entrepreneur to establish a social enterprise could be the desire to offer a service or product for a target group without options. This may be especially true when it comes to energy sector. In some certain areas access to energy or the electricity grid may be limited or the reliability may be weak. In these kinds of situations social enterprises may offer an option for consumers who do not have other options.



Jarleth Rice, sitting in the doorway of 250kW Pellet Boiler, is arts worker at the Share village. Share Village community is specialized on guided outdoor activities in rural Northern Ireland.

– Lisnaskea, Fermanagh, Northern Ireland

Responsiveness to Market Fluctuations

Social enterprises are a good way to produce social good due to their entrepreneurial approach. It has been proved that profit-focused social enterprises are more responsive to market needs and fluctuations. This creates sustainability in service production. (Hansmann 1996.) Social enterprises may operate in sectors that deliver basic goods or services such as energy. It may also be that social enterprises have naturally a more stable customer base due to their nature, which helps them to survive market changes.

In some cases social enterprises may also be established on a more sustainable ground than other companies. It may also be that social enterprises are more easily kept running than other companies. Let us give you an example. On the island of Papa Westray in Orkney Islands in North Scotland, the local shop and the ferry to the inland were both bankrupt for a short time period. These two operators were mainly the only two that kept the island connected to the rest of the world. As these two operations were essential, the local people formed an island co-operative to produce these services. The shop and ferry were both run by volunteers until the profits made it possible

to hire workers for the businesses. (Birkhölzer 2000 in Birkhölzer 2009)

This example demonstrates not only the willingness of people to work together in situations, but it is an example of how the social enterprise was established on more sustainable principles than the previous businesses. This way they created business that is not so vulnerable to the market fluctuations. It is also an example of providing the services for those who do not have any other options. (Birkhölzer 2000 in Birkhölzer 2009)

Conclusion

As demonstrated above, social enterprises have many socioeconomic benefits and they also have in some cases, higher impact than traditional companies have. These examples and theoretical discussions show that social enterprises can create the same benefits in the community and society as traditional companies do, but also in some aspects the impacts are stronger.

RENEWABLE ENERGY IN RURAL COMMUNITIES – SUITABLE OR NOT?

This review is made in co-operation with Karelia University of Applied Sciences that runs a project called SECRE (Social Enterprises in Community Renewable Energy). The project is focused on rural communities in the Europe's Northern Periphery (figure on the right). Rural communities in general and especially in Northern Periphery have particular strengths and weaknesses in developing renewable energy projects in their areas. This chapter will provide a brief insight into these characteristics.

When discussing the rural areas in the context of this article, it is necessary to make the difference between the rural areas in general compared to the Northern Periphery rural areas. First of all, the NP rural areas are located in highly developed countries in Northern Europe and Greenland and Faroe Islands. This means that the socioeconomic environment is

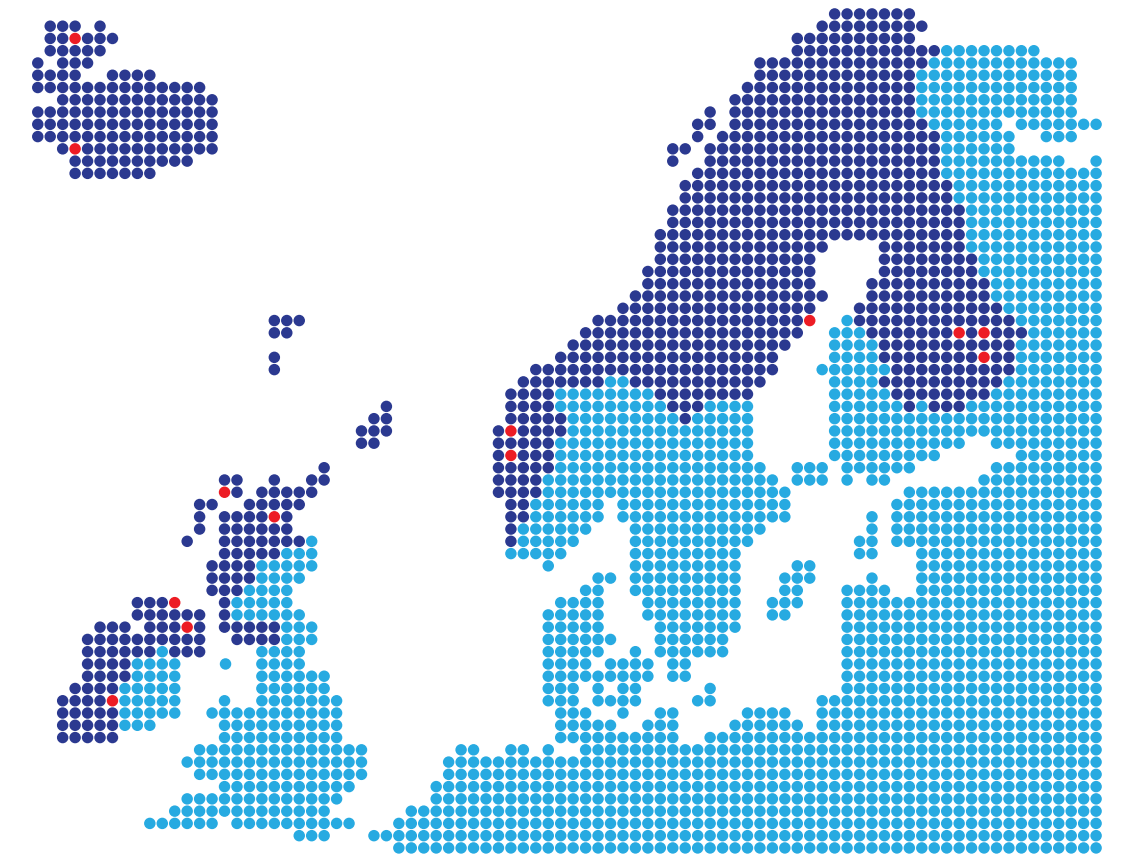
totally different compared to for example rural areas in countries like China or India. Secondly, a high percentage of the mainland countries involved in this project are in rural areas, although that the main part of the population are living in extensively populated urban areas. The Northern Periphery rural areas' electricity or heating grids are usually connected to the national grid. Still, the required amount of grid in metres per capita in rural areas is much more than it is in urban areas. This has led to a situation where the grid is not usually cabled underground, but is instead air cabled. The air cabled grid is always more vulnerable, which makes rural areas more sensitive to outages. Usually the grid in rural areas is difficult to fix due to difficult access to the grid itself. The grids are often at least partly located in the forest for example. These facts mean that usually there are more outages and they can last longer in rural areas.

By providing community (renewable) energy systems in rural areas, they can become more independent from the national/municipal grids. In the previous sentence the word 'renewable' is in parentheses. Any other energy system could lead to the same outcome as a RE system. But we must keep in mind that when it comes to non-renewable energy the raw material is usually not available locally, as it is with renewable energy. This can increase energy (renewable) independence. Independence, which is valuable itself, can also make the probability of outages lower and help the maintenance of the grid. In fact rural communities could benefit from a dual system for energy that enables connection with the national grid, but also the possibility to benefit from RE as well. Thus it is possible to not only use the energy or electricity from the national grid, but also to feed in overproduction from RE sources to the grid. These two-way working

grids are already in use in many Northern Periphery rural areas.

Although most of the Northern Periphery rural areas have access to the national/municipal electricity or heating grids, there are also areas where the connection is still missing. In those situations it is usually because of the expensiveness of building the grid. In these circumstances, it might be that the best way to produce energy within the local community is to have their own production plant. Cost-efficiency is usually the reason for such a solution, but there is no feed-in possibility in such cases.

The above mentioned scenarios are basically describing the challenges that rural areas face in the field of energy. NP rural areas are challenging when it comes to RE projects, but they also have main advantages compared to



Northern Periphery Programme (NPP) area and location of Common Power partners

Kuittila Farm is one of the first energy self-sufficient farms in Finland. The farm uses a lot of heat and electricity annually. In the long run self-sufficient electricity and heat production will bring substantial savings. Compared to fossil fuels, using of renewable energy is also better for environment.

– Nurmes, Finland

urban areas. One of the reasons that make NP rural areas suitable for RE projects is the fact that these areas are rural. In urban areas and even sub-urban areas far from the city centres, they may have problems with building the plants due the scarcity of land. In rural areas it is usually easier to find possible places for RE plants.

Another strength with rural areas is linked to the availability for raw material. For example biomass from agriculture and wood mass from close forests may be easily available. This way there will be no need for transportation. This has another advantage, when it comes to emissions. Less transportation means greener production processes too. In general rural areas that have easily available, by-products or raw materials may have a competitive advantage over other areas.

When by-products and raw materials are locally available, it also gives communities the option of becoming self-sufficient in the field of energy. For example, agriculture can



remarkably benefit from this when there is less, dependence on the price fluctuation of traditional energy sources. Self-sufficiency is not usually possible in the urban areas, where households and corporations are more dependent on global energy prices.

One point not given much attention in the literature and research might be linked to attitudes and values. For some rural areas it might be a question of values to be able to produce at least part of their energy. Nowadays less attention has been paid to the welfare of rural areas compared to urban areas. This point is anecdotal, but it might be that it would be a possibility for people in rural areas to demonstrate that they can do without 'help'.

Another aspect in the literature is linked to the differences between rural and urban areas in communality. Although it is suggested that the communality in rural areas is higher (cf. Ní Laoire 2007) and this fuels the independent nature amongst people in rural communities who would rather be self sufficient and independent.

In total, rural areas in Northern Periphery offer a suitable ground for renewable energy solutions, and as we discussed briefly they tend to not only have the resources for renewable energy but also the need for it.

COMMUNITY RENEWABLE ENERGY – WHAT DOES IT MEAN?

Throughout this article we speak about community renewable energy. Although we have not really made it clear what we mean by that. As Walker & Devine-Wright (2008) point out, the main question when defining community renewable energy is ‘what makes these projects different from other renewable energy projects?’ The scale of different definitions is wide, as usually happens when the topic is relatively new. This chapter focuses on the concept of community RE projects and aims to create an understandable description.

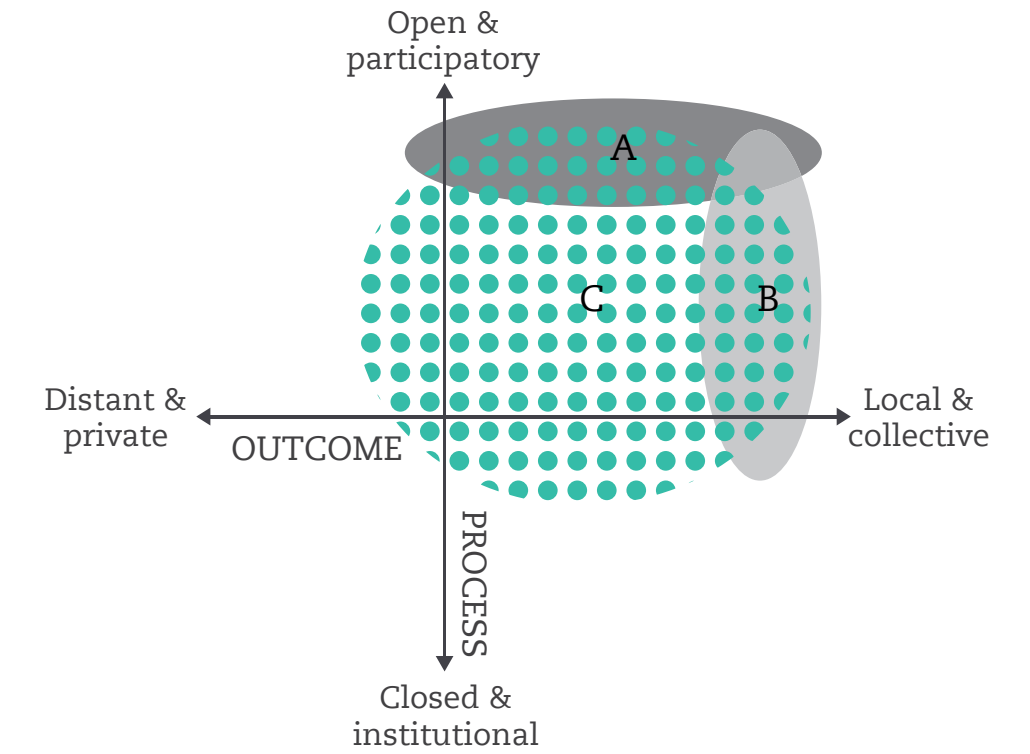
Walker & Devine-Wright (2008) recognized two approaches to the term ‘community’. The process dimension focuses on who a project is developed and run by, or who is involved or has influence. In other words the process dimension is focuses on the ‘action’ side. The outcome dimension focuses on whom the project benefits and who are on the receiving side of the project. A community energy project can also be described as: “an installation of one or more renewable energy technologies in or close to a rural community, with input from members of that community” (Rogers et al., 2008, p. 4217).





KME is a pioneer company in the field of forest bioenergy sector in North-Karelia. Consultation services provided by the company have increased the quality of wood-based raw materials in region. The company is also selling high quality wood chips to other bioenergy companies.

– Pielinen Karelia, Finland



Above figure describes the two aforementioned dimensions of a community RE project. On axis X, there is the outcome dimension and on axis Y, there is process outcome. The first viewpoint (A) focuses on the process dimension. It sees the community RE project as a project needing a high degree of involvement from local people. It is focused on open and participatory involvement in the project. The

second viewpoint (B) focuses on the outcome dimension. It points out the importance of local and collective benefits of the project. The third viewpoint (C) is open to a broader aspect regarding the community RE project. According to the third viewpoint the focus can be on both A and B or just one of these two. (Walker & Devine-Wright 2008)

This simplified model with two variables is problematic. Most likely all RE projects are at some point run by local people. But if we adopt the wider perspective (C) we end up in the situation where we accept that community RE projects are one-man projects. Or we accept that the community may run a project that benefits others, other than the community itself. On the other hand if we strictly adopt viewpoint B, we end up accepting that only a few members may run a project that is defined as a 'community project'. If we accept viewpoint A we will end up in the situation where the project benefits may flow outside the community. (Walker & Devine-Wright 2008)

It is harmful to label the project as a community project, especially when local community members feel that they are doing all the work but they get pretty much nothing out of the project. This supports the decision to not only engage the local people in working for the project, but also to distribute the outcomes amongst the community members. This does not necessarily mean that the distribution should be equal, which is probably impossible anyway. It means that the local community members should be able to benefit from the project and feel that the outcome distribution is at least in some way fair and collective.



Cloughmills village has an active community, which is running organic farm and garden. In the garden, local volunteers and unemployed can help and learn about plants and gardening. Community members are planning a locally owned wind turbine to continue tradition of renewable energy.

– Cloughmills, Northern Ireland

The outcome viewpoint is important when labelling the project as a community project. By taking into account the point of outcome distribution, we do not only mean monetary value, but rather all the value that the project will produce for the community. (Walker & Devine-Wright 2008)

It seems self-evident that the community should work for a project that is called a community project. Actually, it seems difficult to imagine a community project that does not involve local members working for it. A project run by 'outsiders' will probably not be labelled as a community project by the people who live in the communities affected. If the community members in general think that community members do not run the project or members are not involved, it is unlikely that the community will buy into the project. We think that the most important interest group in labelling the project is the community itself. This way the self-evident process viewpoint is a very important aspect of the terminology.

Due to the above-mentioned argument, we consider community energy projects to be a combination of viewpoints A and B.

South West Firewood is a family business producing wood logs and heating wood in the Scottish countryside. Father and son are professionals in wood processing. By managing the whole supply chain from heavyduty machines to knowledge of wood heating they have a remarkable role decreasing use of heating oil.

– Parkgate, Dumfries and Galloway, Scotland

We consider projects to be community projects, when the project is both run by local community members and the benefits of the project flow to the community members. When the project is beneficial to the community in a collective way, it is more likely to be accepted inside the community. NIMBYism (Not In My Backyard) is not likely to manifest itself when the community is largely involved in the project. The community ownership approach can mitigate local opposition, increase community acceptance and increase RE capacity (McLaren, 2007; Zoellner et al., 2008; Warren and McFadyen, 2010; Musall and Kuik, 2011).

One must bear in mind that we are now speaking about community RE projects not social enterprises. A single person can run social enterprises and it can be beneficial for other stakeholder groups as well as a local community. Community energy projects

are not always necessarily run via social enterprises. But if the project meets the above-mentioned characteristics it may likely be a social enterprise.

COMMUNITY RE PROJECTS – WHAT ARE THE SOCIOECONOMIC BENEFITS?

A lot of attention has been paid to the environmental benefits that RE projects have. These benefits are unquestionable, but they are not the only aspect on the topic. RE projects can benefit the communities, whether they are rural or not, in many ways. This chapter will mainly focus on socioeconomic impacts that RE projects have in communities.





Employment Generation - Quantitative and Qualitative

One of the main benefits that RE projects create to the communities is related to employment. Bergmann et al. (2008) interviewed 219 Scottish households in their study to understand their valuations of the attributes on RE projects. Although, environmental effects were evaluated more than the socioeconomic features. What makes the study results interesting is that employment was especially evaluated in rural areas. Del Rio & Burguello (2008) suggest that the significance of creating only a few jobs may be high in rural areas, especially in isolated communities with scarce development and employment opportunities. Community projects are keen to create economic development in rural areas, which increases household incomes and welfare. (Phimister & Roberts 2012, Li et al. 2013)

Employment opportunities can be examined both from quantitative and qualitative aspects. Some projects create more jobs than others. Qualitatively those jobs may differ remarkably on their skill demand levels. Some jobs may be well suited for the long-term unemployed workers. Others need more specific skills. The latter may create a workforce transfer, when

already qualified workers move into the area. New projects may also create supplementary job opportunities. For example, when the local agricultural activities of farmers are supplemented by farmers working partly on RE projects. Thus helping to maintain current jobs too.

Renewable energy projects may significantly vary in terms of their quantitative employment effects. Usually at the construction phase, the employment and income generation effect is comparably high, but temporal. For example, wind farms need a lot work force to construct but rather a modest amount of workforce to maintain the wind turbines. For communities it is usually better that the mature phase of the project creates jobs rather than the shorter term construction phase. Some of the jobs that are created are not in a specific area, but elsewhere. When the project is run by the community itself, the 'job leak effect' does not occur. Social enterprises offer a good way to run these kinds of projects inside the communities. We will go through the concept of social enterprise in the following chapters.

Demographic Impact

The impacts that RE projects may have on a local level includes demographic impacts. Demographic impacts are highly interrelated with employment factors. By developing

jobs the community may turn migration into immigration. As del Rio & Burquello (2008) state this aspect should be investigated more deeply. It can be argued that RE projects build an image for the area and that way attract new residents to the area.

Energy Impact

RE projects naturally have an energy impact on the area. If the whole sector diversifies by implementing RE solutions, this is always beneficial to industries. Rural areas are rarely energy self-sufficient. Earlier in this article we discussed the problems that rural areas face in the field of energy consumption. Rural areas are sensitive to energy outages due the vulnerability of the long grid solutions. By producing the energy inside the community, the grid outages do not necessarily affect local level energy delivery. It may also be a way to produce cheaper energy to the local community by implementing RE projects. (del Rio & Burquello 2008)

Productive Distribution

Given the uncertain prospects about the future of agriculture, RE projects can impact on product diversification in the area. This impact is assumed to be greater when a larger share

of the regional value added is based on the agricultural sector. It might be that RE projects do not solve the socioeconomic problems of rural areas, but as stated above, due to their specific characteristics, RE might be one of the most suitable options to solve socioeconomic problems in rural areas. (del Rio & Burquello 2008)

Income Distribution

Local sustainability is largely based on equal income distribution. The best effect will be achieved when projects lead to income and employment generation amongst the more disadvantaged groups of individuals (e.g. the long term unemployed, young people trying to enter the employment market). As discussed earlier, projects can largely differ from each other on the qualitative employment generation aspect. However social enterprises may at least try to achieve to some extent, equal income distribution among the participants. Social enterprises are not primarily trying to generate wealth for shareholders, but are more concerned with the social welfare of communities and society as a whole. One must bear in mind that social enterprises like any other enterprises may pay

dividends or otherwise share its profits to the owners, but it is not their primary goal. (del Rio & Burquello 2008)

Other Impacts

Del Rio & Burquillo (2008) also suggest that RE projects may also have impacts on the education of local workers, social cohesion and human development and impact on tourism. For example, educational levels and knowledge accumulation may rise due to the learning process in projects. Community's education may be improved as an indirect consequence of projects. For example the RE projects or social enterprises may generate investment capital or invest money to a library or local school system, which may raise the educational level of community individuals in general terms. This is an example of creating more social capital via social entrepreneurship.

Social cohesion and human development is linked to self-confidence and social relations inside the community. Social relations may develop when the community is working together within the projects. As a result of working towards the common goal and succeeding together, the self-confidence

throughout the population will improve. The community may become proud of its success and proud of the community in general. This may have a positive impact on areas of human development in general.

Successful RE projects may have a positive impact on tourism and this impact is usually based on the demonstration effect. The demonstration effect may bring tourists and visitors to the area, but the effect is usually modest due to the low attractiveness of demonstration RE plants compared to other tourist destinations. Probably the interest groups are limited to experts and individuals or groups that are trying to launch the same kind of project elsewhere. (del Rio & Burquello 2008)

CONCLUSION

In this chapter we have gone through the positive socioeconomic impacts that renewable energy projects may have on the local community. Most of the impacts may seem self-evident, but still the research on the topic needs to develop and more attention should be paid on socioeconomic benefits side by side the environmental impacts.





Upperlands Community Hydropower Scheme is hydroelectric generator supplying electricity via a water turbine. The local community benefited in a number of ways. For instance all the money made by the project is returned back into the Upperlands community. Also the benefits of renewable energy to the environment are significant.

– Upperlands, Northern Ireland

Perfect Combo – Why it does not work?

Throughout this article we have been discussing the topics related to renewable energy projects, social entrepreneurship and rural communities. In chapter 2 we agreed that if we want to fulfil not only the political goals for RE, but also the energy needs we have, then we need renewable energy in the future. In the next chapter we discussed rural communities and their special characteristics, which either force or drive them to implement and use renewable energy solutions. Following that discussion, we presented the environmental and socioeconomic benefits that community RE projects can provide. In the most recent chapter we discussed the concept of social enterprises and how they might provide the

most suitable option for community renewable energy projects, and also the advantages of social entrepreneurship.

Even though, all the above-mentioned topics support the choice of social enterprise as an option for entrepreneurship, when it comes to renewable energy projects, the literature neglects the social entrepreneurship revolution. In the next chapters we will pay the focus on attention to the factors that are driving the change, or at least should be. After that we will discuss possible future actions in order to increase the level of social enterprise renewable energy projects.

Mauri Holma from Motoajo Ltd has been working for a long time with KME as a subcontractor. Both companies have a common goal to increase the quality of wood-based raw materials in region.

– Pielinen Karelia, Finland

RENEWABLE ENERGY INCENTIVES

The public sector has developed a wide range of different incentives to encourage companies to produce, and consumers to use renewable energy. These incentives have been developed in order for the public sector to achieve their goals regarding renewable energy consumption levels. In this chapter we are going to focus on some of the most common incentives. The main goal is to reveal some of the different incentives used in different countries.

Although we focus on public subsidies and incentives, the private sector also offers incentives to RE companies. For example, assistance may come from foundations or investment companies that are interested in supporting RE investments.

Renewable Energy incentives may roughly be divided into monetary incentives, further called subsidies, and other incentives such as providing knowledge and non-monetary assistance, such as consultancy in order to

help companies succeed in the field of RE. Mostly the literature has focused on monetary incentives, but the non-monetary ones can also act as strong incentives too.

We may further divide the monetary subsidies into two categories: investment and operating subsidies. Investment subsidies provide financial assistance to encourage the investment. These are especially important when the company is in a start-up phase. Investment subsidies may be grants, low-interest loans or tax incentives. Operating subsidies are subsidies that uphold and maintain the competitiveness of the operating company.

One of the most common RE incentive is the feed-in tariff. It is a typical example of an operating subsidy. A feed-in tariff means that the public sector guarantees a certain price for the RE producer, when they feed the electricity to the grid. This way the public sector tries to



decrease the risk on investment and increase the interest in developing the renewable energy. Feed-in tariffs offers companies security in the operating phase.

Premiums are common operating subsidies too. Premiums are certain amounts that are paid on the top of the current electricity price. It differs from the feed-in tariff in the way that it offers producers a certain margin compared to market prices, whilst feed-in tariff prices are usually based on the production costs.

A quota obligation is a binding RE target; and represents the minimum percentage of RE production from the total capacity defined by the government. These instruments have their own markets, where supply and demand defines the prices. In practice, it means that if a company is able to produce more RE than the minimum level, it may get income from selling to companies unable to fulfil their RE goals.

Table on the right shows the kinds of subsidies in use in 18 different countries (KPMG 2012). As we can see some of the countries have subsidies to encourage RE businesses in every phase, but some have only one or two different subsidies in use. In this paper, we are not taking a stance on whether these subsidies are efficient and necessary or not.

Subsidies used in 18 different countries (KPMG 2012).

Country	Investments and/ or Subsidies	Feed-in Tariff	Premium	Quota Obligation
Australia	●	●		●
Brazil	●	●		
Bulgaria	●	●		
Canada	●	●		●
China	●	●	●	●
Czech Republic	●	●	●	
France	●	●		
Germany	●	●		
Greece	●	●		
Israel	●	●		
Netherlands	●	●		
New Zealand	●	●		
Poland	●			●
Romania				●
South Africa	●	●		
Spain	●	●	●	
United Kingdom	●	●	●	●
United States	●			●





Share Village community is specialized on guided outdoor activities in rural Northern Ireland. Trained young sport enthusiasts run group activities and they work on volunteer basis. In Share Village volunteers produce heat and electricity by burning wood and maintaining small wind turbine and PV installations.

– Lisnaskea, Fermanagh, Northern Ireland

FINAL CONCLUSION

We have gone through the concept of social enterprise and the socio-economic benefits they can offer. We have discussed the concept of community renewable energy and the positive aspects of the concept. We have taken a look into the renewable energy subsidies on a conceptual level. This text aims to create an understanding of the topics discussed. The goal is to help the reader to understand the concepts and arouse awareness and interest towards them. The paper does not create a holistic understanding, rather it has scratched the surface.

In the future we need more and more renewable energy. Rural areas offer us an excellent platform for developing it. Renewable energy may be the new and complementing product for rural areas that suffer from declining agriculture. However the path from the present situation to the future optimal RE solutions is not going to be easy and no shortcuts exist.

What we mainly need right now is to spread knowledge. We do not lack the examples of successful social enterprises in the field

of renewable energy. The entrepreneurs, policymakers and the larger audience need to be able to have access to the data that will help them further their interests. We need to be able to provide knowledge for those who are interested. At the same time, we need to be able to arouse the interest of those who have never heard about many of the concepts presented in this work.

As discussed earlier, community renewable energy projects are able to produce a variety of socio-economic benefits at macro level. Some of these benefits are not under our control, but instead are under the control of social enterprise operations. Examples derived from the literature support the insight that social enterprises are suitable for community energy projects. What we need next is to spread the knowledge for decision makers and people working for the rural communities well being. We need to be able to benchmark the functions that have been tested somewhere else.

Above we briefly pointed out the large amount of energy co-operatives in Germany. According to Buchan (2012), there are two main reasons

behind this success. First, the culture has long traditions in collective civic action and another one lies in the feed-in tariff and affordable memberships in co-operatives. As we have to be able to learn from these examples, we have to pay even more attention to changing attitudes and also driving change via incentives such as feed-in tariffs for RE. Institutional support is essential for changing attitudes and finding the right path for people to succeed.

The revolution of social enterprises is not going to happen in one night, and we can discuss whether we need the revolution at all. Social enterprises are an option for communities and for anyone to solve the issues of energy production and availability. There is a lot of support available for starting social enterprises and for communities looking to take the responsibility for their own energy. The challenge is to make the support visible for those in need of it. Knowledge diffusion is currently only at the starting point.



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This book goes through the concepts of social enterprise and community renewable energy. It will create an insight to the concepts and socioeconomic benefits that those can offer on the field of renewable energy. Social enterprises are an option for communities and for anyone to solve the issues of energy production and availability, which Europe and the whole world will face in the coming decades. Rural areas can offer a ground for small-scale energy solutions and social enterprises can be the way for establishing those solutions.

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