



PROVINCIE FLEVOLAND



INTERREG IVC

INNOVATION & ENVIRONMENT  
REGIONS OF EUROPE SHARING SOLUTIONS



# Connecting

*A qualitative study into how organisations in Flevoland are being stimulated to invest in sustainable energy.*

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# Foreword

The MBA Windesheim project group for the Province of Flevoland was founded on 22 September 2009. The project group consists of Mike Smink, Senior Sales Manager Retail at Shimano, Sjoerd Scholte, Director Corporate Banking at ING, Bauke Keulen, Senior Adviser Information Management for the Municipality of Houten, Otto Albeda, P&O Adviser for the *Friese Wouden* care organisation and Mike van Wissing, Department Manager at the *Poortje Jeugdinstellingen* youth care organisation.

The client, MBA Windesheim, commissioned the project group to draw up a research report focusing on the Province of Flevoland in a changing international environment. Based on the collected data, the project group then drew up a problem definition. After the problem definition was tested by Mr. Bob Pels, General Manager European Territorial Cooperation for the Province of Flevoland, it was used as the basis for a series of interviews.

For a number of the interviews, the project group used knowledge and experience of the situation on the ground. We are grateful for the valuable cooperation of all the interviewees. Without exception, everybody was more than willing to speak to us and to provide us with the requisite information. Thanks to the excellent feedback we received, we learned a great deal about sustainable energy and would like to express our gratitude for this.

Our special thanks go to Provincial Executive members Ms. Anne Bliet-de Jong, Mr. Bob Pels and Mr. Hans Rijnten. Their cooperation helped the project group to bring this project to a successful conclusion.

Zwolle, January 2009

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## Management summary

The future of our children and grandchildren depends on what we do here and now. This is not just an ideological notion – it is also an economic fact. The MORE4NRG project concurs with our belief that the best course of action for all sides is to share knowledge and experience. Then, by connecting regions, we can create the new commercial ties that Europe needs to become stronger and more sustainable. In the future, the prosperity we enjoy in the Netherlands may depend on the development of areas that are now economically less successful.

Although the goal is evident to all – that is, greater use of sustainable energy and therefore a cleaner society for everybody – the road to that goal is not so apparent. The Province of Flevoland therefore commissioned us to conduct a study into how that road currently looks. Based on one main question and three sub-questions, eight interviews and a huge amount of desk research, we were able to gain an accurate picture of the situation. The Province of Flevoland will now use our recommendations as input for the MORE4NRG project.

The main conclusion of this paper is that we need to “connect”. By this we mean that we need to work together to make sustainable energy successful in Flevoland. Although the various companies and organisations involved have their own targets, we concluded that the exercise will be particularly successful if the parties connect. Sometimes it will be necessary for these organisations to bend their strategies a little. We learned that holding on to ideas and opinions from the past is not always the best way to do things. We also need to focus on the future.

# Introduction

*“A century ago, what is now Flevoland was the Zuider Zee, with small islands dotted here and there. A lot has changed in those hundred years. For one thing, we have grown into a fully-fledged Dutch province.”*

With this quotation on its website, the Province of Flevoland expresses in a few words where its roots are to be found: at the bottom of the sea. Over the past decades, the Province of Flevoland has grown to become a fully-fledged, vital and continually-developing province that is proud to be the twelfth province of the Netherlands. Some facts about Flevoland:

Population: 383,400 (2009); in the next 11 years, this number is expected to grow to more than half a million

Surface area: 2,412 km<sup>2</sup>; 1,419 km<sup>2</sup> of land and 993 km<sup>2</sup> of water

Number of homes: 82,309 (2008)

Our study focuses on this province. Flevoland has wide-ranging ambitions for sustainable energy. The province has by far the highest share of sustainable energy in the Netherlands, and it wants to keep developing in this area. The target for 2013 is for the sustainable energy generated in Flevoland to meet at least 60% of all its energy needs (excluding transport). To achieve this target, the Province of Flevoland is taking part in a number of projects, including the European MORE4NRG project.

## **MORE4NRG**

MORE4NRG<sup>1</sup> focuses on strengthening regional strategies for renewable energy sources and on increasing energy efficiency. It is a cooperative project between 11 European regions and the Assembly of European Regions (AER), an interest group of 280 European Regions. Besides Flevoland, which is the project leader, the following partners are also taking part: North Brabant (Netherlands), Norrbotten and Västernorrland (Sweden), Maramures and Prahova (Romania), Abruzzo and Lazio (Italy), Western Greece, Valencia (Spain), Gabrovo (Bulgaria) and the AER.

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<sup>1</sup> MORE4NRG = More For Energy

The project is being funded by the INTERREG IVC programme. This European programme is helping regions to share knowledge and experience in numerous areas – not just with the theme of sustainable energy. The project was launched in 2007 and will end in 2013.

### **Testing, fine-tuning and exchanging experiences**

In the MORE4NRG project, the focus is on testing and fine-tuning the energy policies of the participating regions and exchanging positive experiences. To start with, the existing policy in the regions is being examined. This will be followed by five peer reviews, which will include visits to the regions with less developed sustainable energy policies. Experts from the regions whose policies are more developed are helping these regions to develop a strategy and draw up a plan of action.

### **Measuring the effect**

In addition, a monitoring instrument will be developed as part of the project to measure the effects of a regional strategy for sustainable energy. The results of the project will also be circulated outside the participating regions. The project has a budget of 1.3 million euros and will last for three years, ending in October 2011.

For more information about the MORE4NRG project, visit: <http://www.more4nrg.eu/>

# 1 Introduction

This study focuses on the question of how organisations in the province of Flevoland are being stimulated to invest in sustainable energy. Although there are different types of sustainable energy, this study does not make a distinction between them. The reason for this is that we particularly want to understand the role of the Province and find out the type of information and facilities that the business sector wants. The guiding principle here is the theory discussed during the third semester in the Managing International Markets (MIM), Corporate Governance (CG) and Environment of International Business (EIB) subjects.

## 1.1 Research question

The research question defined for the project during the third semester was:

*“Use a theoretical framework to formulate a strategy and describe the practical consequences in the economic and international environment.”*

We are translating this as a study into the situation in Flevoland, applicable in a broader European context.

## 1.2 Problem definition

To make the research question more concrete, we formulated a problem definition that allows us to assess the problem both outside-in and inside-out. Based on our initial desk research, we were able to determine that both extrinsic and intrinsic factors have a role to play. We therefore formulated the following problem definition:

*“How are organisations being stimulated to invest in sustainable energy?”*

### 1.3 Sub-questions

The problem definition can be divided into several sub-questions. While formulating the problem definition, we kept as close as possible to the three specialist areas that need to be used. We formulated the following three sub-questions:

1. *Which information is necessary in order to consider making an investment and how must that information be made available?*
2. *To what extent are the facilities in the (international) banking sector adequate to stimulate investment in sustainable energy?*
3. *To what extent are the facilities of the authorities consistent with the wishes of the target group?*

### 1.4 Research method

The project group chose to conduct a qualitative study because in that way, according to the Province of Flevoland's business supervisor, we will add the most value to MORE4NRG. A qualitative study has the following characteristics (Baarda, Goede, & Teunissen, 2005):

- Questions are always asked face-to-face.
- It must be a small-scale study (< 60 respondents).
- It must include reports and presentations that contain descriptions and images of a target group.
- Questionnaires or half-structured questionnaires are often used as a tool.
- The study illustrates the underlying motives of the target group on a particular subject (greater insight).

In order to prepare the questions, we decided to conduct desk research into the interviewees' organisations so that we could forge a link between the literature/publications and daily practice relatively quickly. We then held a number of interviews with people from companies and organisations that could give us as comprehensive a picture as possible of the practical situation.

## 2 Corporate social responsibility

Before we answer the three sub-questions, in this chapter we want to discuss the theme of corporate social responsibility in detail. The reason for this is that, according to Egbert Dommerholt (2009), corporate social responsibility is one of the basic principles that can motivate people to invest in sustainable energy. The Province of Flevoland therefore believes it is important to know which principles will fuel the decision of potential investors to invest in sustainable energy. In this way, says policy employee Mr. Rijnten, the province can more effectively meet the needs of (potential) investors. Mr. Rijnten himself believes that corporate social responsibility is an important motivating factor.

Corporate social responsibility – of which investment in sustainable energy is one expression – is described (Social Economic Council, 2000) as the conscious focusing of business activities on long-term value creation on the following three dimensions:

1. social
2. ecological
3. financial-economic (such as profitability and market value)

The Social Economic Council (SER) report calls these dimensions the Triple P: People, Planet, Profit. Businesses are apparently swayed by their operating results on each of these dimensions. Below, we use a number of examples to calculate the extent to which this motivation factor also exists in Flevoland.

### 2.1 People

The social dimension of corporate social responsibility has an internal focus (the company's own personnel) and an external focus (the wider society). Proper stewardship of this dimension begins with good labour relations and a stimulatory social policy (Pot, 2009) that encourages employees to make their own individual contribution and take responsibility for their own actions, that promotes good workmanship (Jacobs, 2009), and that provides enough space to

combine work and care activities. This vision of entrepreneurship is certainly acknowledged inside the Rabobank organisation. Although it may not give us the exact figures, Rabobank believes that the social dimension results in *a better organisation*. There is a greater focus on personnel policy, risk management, the quality of operational management, and the like, and this has been a valuable basis during the current crisis. However, not all companies are managing to keep afloat financially. When a company encounters financial problems, Rabobank places it under “special management” – that is, the company’s accounts are critically examined, after which 80% - 90% of companies can then resume on their own steam after a short time. This means that the continuity of the business is only under pressure for a short period and no jobs are lost.

Another example of an organisation with the *people factor* is East Flevoland Housing Department (OFW). This organisation “breathes” social entrepreneurship. OFW is the only provider of rented social housing in the Dronten area and focuses on social objectives rather than on profit optimisation. One example of this is that the organisation wants to help its tenants by saving on energy. Its aim is to achieve energy savings of 30% by 2012, whereas the sector organisation’s target figure is 20% for the same period. This type of policy is by no means arbitrary. It is tested once a year at a stakeholder meeting and four times a year during inspections by various bodies that measure the realised energy savings. It is a form of governance that enables the corporation to check whether its social performances are producing sufficient yield. During one of the abovementioned inspections, OFW was characterised as a ‘doer’; the successful projects it realised in the 2000–2005 period have greatly benefited the organisation’s stakeholders.

## **2.2 Planet**

In order to increase social prosperity, companies need to display a type of corporate citizenship (Crane & Matten, 2004) in which, of their own accord – individually or in cooperation with other companies – they limit the negative external effects of their activities as much as possible and encourage and strengthen the (possible) positive external and long-term effects.

The ecological dimension of corporate social responsibility means that care for the natural environment is integrated into a company’s business operations. We described above how Rabobank and social housing provider OFW deal with this. One organisation that genuinely

encourages businesses in Flevoland to implement this integration is the Flevoland Development Company (OMFL). OMFL is an implementation organisation that uses the Government's economic policy as its starting point while proactively searching for opportunities for economic growth in Flevoland. According to Herman Vermeer<sup>2</sup>, entrepreneurs in the region are encouraged to assume corporate social responsibility and are being stimulated to start investing in sustainability (such as climate control, waste flows, heat re-use, choice of building materials, use of sustainable energy, etc.).

### **Ideological environment**

The above also applies to Electrabel, an organisation that is always conscious of its social role as an energy supplier – not just as the manager of a utility facility, but also as a socially responsible organisation. What does that social responsibility actually mean? According to Myers & Opzeeland (1985), it means leaving a healthy planet behind for future generations. This approach has a direct effect on business operations. The current ideology – but also increasing pressure from society – are forcing organisations to reconsider their business practices. Electrabel has appointed a sustainable energy manager who will concentrate on opportunities for development in the field of sustainable energy.

Despite our collective responsibility for the “planet” and therefore also for sustainable energy, people do not always take the subject seriously. We believe that this has more to do with the regulations than with the subject itself. Enterprises that are willing to invest in sustainable energy are confronted with a raft of regulations. Some of those regulations are contradictory or are interpreted differently by different local governments. As a result, sustainable energy is sometimes not taken seriously. Mr. Vermeer said that some entrepreneurs regard it as a subject for “left-wing liberals”. During our research, we certainly encountered very little genuine idealism. Mr. Iordens<sup>3</sup> is clear-cut on this subject: idealism is fine, but in the end it all comes down to a positive earning model.

## **2.3 Profit**

Profit involves the creation of value by producing goods and services and by generating employment and sources of income (Social Economic Council, 2000). The financial yield

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<sup>2</sup> Mr. Vermeer is a Project Adviser at OMFL

<sup>3</sup> Mr. Iordens is the manager of the Kubbeweg wind farm in Biddinghuizen

reflects the purchasers' appreciation for the company's products and the efficiency with which production factors are deployed. For investors, it is the criterion by which the company's performances are tested (shareholder value). The orientation towards profit (in the long term) must create the financial basis for the continuity of the company. Due to the growing trend towards social awareness, people are no longer thinking in terms of just financial gains but also in terms of gains for the environment and the surroundings.

### **You are society**

Businesses are shaped by different forces: by what they *must* do (in line with laws, regulations and social expectations), by what they *should* do (based on their personal convictions) and by what *pays* (and therefore serves their own interests, for example due to their improved reputation). In addition, and unconnected with personal opinions, the choice of corporate social responsibility can be inspired by enlightened self-interest and ultimately, therefore, by the desire to prolong the continuity of the company. This may be based on different considerations, including the need for a good quality of life in the immediate surroundings, the value of a good reputation and the motivation level of employees (Boutilier, 2009). For many companies, social acceptance and a good reputation are now important preconditions for their continuity. The need for social acceptance is also expressed as a license to operate, which companies must renew regularly (Porter & Kramer, 2006).

### **The power of the international markets**

The focus on the international capital market, with its Anglo-Saxon influence, is purely on shareholder value, and this is at odds with a balanced and coherent interpretation of the three dimensions of corporate social responsibility. Where our study focused on the facilities provided in Flevoland, Mr. de Vries<sup>4</sup> says that European players like Electrabel are definitely being influenced by the variables of the international business environment. The euros they want to invest can only be spent once, so they try to find out how best to do that to improve their yield and their image. The bottom line here is that the commercial players simply must earn money. If the investment climate in France is better than that in the Netherlands due to the regulations, subsidy options, etc., companies will not choose to invest the money in the Netherlands even though it might help them to improve their image. See the article below about

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<sup>4</sup> Mr. de Vries is Senior Sustainable Business Developer at Electrabel

the planned wind farms, which will only get off the ground if the subsidies are granted in the Netherlands.

### **Investing in green projects**

In the Netherlands, the increase in specific 'green' investment products has been stimulated by the Tax Arrangement for green projects. In the financial service sector, too (credit institutions, insurance), there is an increasing focus on insufficient sustainability due to the associated risks. On closer examination of what entrepreneurs think about these incentive measures, there is a moderate level of dissatisfaction. In two interviews (Electrabel and Prodeon), the interviewees explicitly state that they are very happy with the incentive measures. However, there is an urgent need for a structural and long-term incentive policy. The measures currently in place are regularly amended, deferred or abolished. There are also periods during which there are no subsidy measures or no measures with tax arrangements for investors. Due to the changeable policy, it is difficult to assess the pros and cons of capital-intensive investments (Tietenberg & Lewis, 2010).

Germany has a more structural variant for subsidising sustainable energy and is leading the way in Europe on different fronts. There, the investment climate is more stable, so Dutch players are also starting to look over the border to see if they can put together a profitable business case. As a result, the percentage ratio between sustainable energy and normal energy in Germany is considerably higher than in the Netherlands.

### **Sustainability of bio-fermentation systems up in smoke**

One example of the dilemmas facing entrepreneurs involves bio-fermentation systems. The current systems were installed several years ago, based on a calculation using the following variables:

- investment amount
- production costs
- yield of energy produced
- available subsidy scheme
- technical life span of production system
- alternative (traditional) fuels for energy production

The subsidy scheme has been cut back (new Government = new guidelines). The costs of production have risen significantly. This is due to the so-called ‘list of ingredients’ – that is, all the materials that may be used. This list really only specifies a fraction of the available non-hazardous products. Because use of the permitted ingredients on the list has increased, their price has risen tenfold in the space of four years. In the meantime, the revenue earned from the generated energy has dropped (for example, due to the lower value of the dollar against the euro, the price of a barrel of oil (in dollars), the link to the gas price). Because of this, the average biogas system is making a loss.

The above illustrates the type of decision tree confronting businesses. Viewed from a different perspective, you could say that this is simply part of the entrepreneurial risk. If this is indeed the case, there is a chance that the desire to invest in sustainability will disappear completely. In that case, the best thing to do would be to confirm/guarantee as many parts as possible of this decision tree for the term of the investment (such as the size of the subsidy, the size of the yield). The following quote from Mr. Alberts of Prodeon<sup>5</sup> supports this:

*“It is time that the Government started making its own incentive policy sustainable. If the Government’s long-term strategy is clear, a company can weigh up the various options for developing a profitable and sustainable operation, which is good for the environment, the economy and employment. The Netherlands still has a lot to gain in this area.”*

The week following the interview, these sentiments were confirmed by the World Nature Fund (WNF), which published its study results in the national newspapers, including the Stentor of 12-11-09. Research conducted by WNF also shows that in a global context the Netherlands is not known for its initiatives in the area of clean technology. In fact, even countries that the developed West regards as developing countries (such as Brazil) are more sustainable-minded than we are.

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<sup>5</sup> Mr. Alberts is a corporate lawyer at Prodeon.

## 3 Investment psychology

The first sub-question reads: “*Which information is necessary in order to consider making an investment and how must that information be made available?*”

To answer this question, we used the ABC model to examine the psychology that enables a decision-maker to avoid cognitive dissonance. The theory behind this is also relevant in the marketing sector (Stephan & van Raaij, 2004), where marketers try to avoid a “bad feeling after the purchase” after consumers have invested their money.

### 3.1 The ABC (Antecedent-Behaviour-Consequences) model

In methodological behaviourism, in order to explain behaviour there is no point studying internal psychological processes that cannot be confirmed by independent observation. Skinner distanced himself from that scientific theory and developed the contextual behaviourism approach (1979). According to this approach, in scientific explanations of behaviour it is indeed important to examine the subject’s internal psychological processes (Hermans, Eelen, & Orlemans, 2007). To accurately predict and influence behaviour, Skinner writes it is important to conduct a ‘function analysis’ in order to understand the reason behind the behaviour. Therefore, for a certain type of behaviour the situation that preceded that behaviour, the behaviour itself and the consequence of that behaviour are examined. The *Antecedents* that preceded the *Behaviour* and the *Consequences* together form the context of the behaviour, from which the function of the behaviour can be derived.

Skinner’s ABC model therefore helps us to analyse the following questions:

**Antecedent**      What is your situation now?

**Behaviour**      How do you behave during this situation?

**Consequence** What is the consequence or result of your behaviour?

By examining these psychological aspects, we want to demonstrate that it is better to first assess which type of information is needed rather than the format in which the information should be made available.

### **3.1.1 Antecedent**

In order to successfully connect with (potential) investors, the Province of Flevoland must first use the ABC model approach to identify the entrepreneurs' current situation – starting, of course, with the financial situation of (potential) investors. The current investment climate is not favourable. Due to the crisis, companies are very cautious about their expenditure and are spending more money on maintenance than on innovation, says Mr. Vermeer. Moreover, the changing legislation and regulations are not making things any easier. We regularly hear remarks from people about the Environmental Quality Electricity Production (MEP) subsidy scheme. This scheme involved Government subsidies for the domestic production of sustainable electricity and therefore also wind energy. The subsidy was aimed at making wind energy profitable in roughly the same way across the country so that wind energy projects could be realised in every region. This support for wind energy was aimed not only at encouraging clean electricity, but also at giving industry the chance to research cheaper production methods (learning curve) and thus reduce costs. One excellent example of the how this subsidy scheme works is the Kubbeweg wind farm in Biddinghuizen. The Netherlands's largest privately-owned wind farm, with 17 wind turbines, was established using the MEP scheme. The MEP scheme ended in August 2006.

In 2008, the MEP scheme was succeeded by the Sustainable Energy Production Incentive Scheme (SDE). This scheme, introduced by central government by means of an Order in Council, is aimed at stimulating the production of clean and sustainable energy, including onshore wind energy, combined heat and power, biomass, and photovoltaic solar energy. However, the SDE scheme is very uncertain due to the numerous revaluation regulations and the annual adjustment of the subsidy for each kWh returned. In addition, the 'wind sector' has stated (Rijn, 2008) that the SDE scheme valuation is structurally too low as it is based on a requisite investment of EUR 1,200 per kW of installed capacity, while the market price in early 2008 was as much as EUR 1,300 to EUR 1,400. An inventory of ongoing wind projects drawn up in May 2008 includes wind farm projects that are 'shovel-ready' but will not be launched

because the SDE scheme valuation is too low, as described in an article by Thomas Olivier in The Stentor of 14 November 2009: *“Up to now, the Ministry of Transport and Public Works has granted six definitive permits for the construction of offshore wind farms. It is not certain that even those farms will actually be built. This will depend on the available subsidies, amongst other things.”*

To nevertheless help to reduce CO<sub>2</sub> emissions and comply with the relevant international agreements, and because the applicable subsidies to stimulate the environment do not seem to be working properly, the authorities are becoming creative and are drawing from a different subsidy source. By continuing to use the innovative approach (from a wind turbine height of 100 metres to 135 metres), the investment can indeed be subsidised and the system can be put back on track. This working method is more random than structural, which means that a healthy investment climate for a subsequent project is not guaranteed.

The Government’s financial situation is evidently not very promising. Through the years, several subsidies have been reduced or have depreciated. There is a clear difference between the situation in Germany and Belgium and the situation in the Netherlands. The former two countries have long-term (= longer than 10 years) agreements for subsidy schemes, boosting the confidence of (potential) investors. That gives Germany a clear head start – for example, in the field of solar energy. The country has a 20-year subsidy scheme, which creates a much more secure investment climate and enables investments to be calculated much more accurately. It also means that the Return On Investment can be calculated almost risk-free.

In this context, Mr. van Doorn<sup>6</sup> gave an example that he believes typifies the way the Government operates. Since last year, housing corporations have been obliged to pay corporation tax, the Vogelaar charge and water control authority tax, which has greatly increased their costs. In contrast, the rent increases are in line with inflation. As we all know, inflation is currently low<sup>7</sup>, so there are no higher earnings to balance out the higher costs. This is preventing housing corporations from making extra investments in sustainable energy. Especially given the fact that the money saved through insulation, for example, flows straight back to tenants and not to the housing corporation.

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<sup>6</sup> Mr. van Doorn is Business Operations Manager at East Flevoland Housing Department (OFW)

<sup>7</sup> According to CBS, in October 2009 inflation reached 0.7%

The analysis of this situation is not limited to the financial circumstances. Various interviews have shown that in the current situation (potential) investors do not trust the Government. Both Prodeon and OMFL can quote examples of negative experiences with investments. We noticed that investors regularly mention the discrepancy between the modus operandi of the municipalities and the Province of Flevoland. The Provincial Government is clearly seen as the driving force behind sustainable energy. There is extremely good contact with the responsible representatives in the Provincial Government. The problem is the relationship with the local government (or municipality). According to the interviewees, the way the municipalities apply the regulations makes it seem as if the interests of the province and the municipalities are opposed to each other. The entrepreneurs come up against this problem all the time. *“It’s as if the different authorities are only thinking of themselves,”* says Mr. Vermeer, and describes a typical situation: there was a meeting between the province, the municipalities and several third parties, including OMFL. Almost everybody knew each other, except for the municipal and provincial representatives, who had to be introduced. *“That’s a shame,”* says Mr. Vermeer. *“The municipal and provincial authorities should work together and try to understand each other. That’s the only way we’ll start getting results.”* To illustrate the way approaches can differ, in two bordering municipalities (Dronten and Zeewolde), one municipality wanted the wind turbines to be positioned in a straight line while the other wanted them to follow the curve of the road. The message being sent to entrepreneurs, the surroundings and other stakeholders is therefore very inconsistent.

In addition to this mistrust of the authorities, the supply of information is very fragmented in the current situation. For example, if people want to find out about tax and subsidy schemes, they have to contact several different providers, says Mr. Vermeer. There is no central information point. Despite the existence of a company specialising in the supply of information and support for subsidy applications (Senter Novem), it is remarkable that neither LTO North nor OMFL mentioned this organisation voluntarily.

One final point that the various interviewees mentioned, which was confirmed in the article from the *Financieel Dagblad* displayed below, is that the available information about sustainable energy is sometimes contradictory. On the one hand, investment in sustainable

energy is being stimulated, while on the other hand we read<sup>8</sup> that the price of electricity will undergo a negative development after 2010.

### **3.1.2 Behaviour**

According to the ABC model, the antecedents translate into a certain type of behaviour. This behaviour, which is generally predictable, is confirmed in the interviews. According to Mr. Vermeer, investing in sustainable energy has a very negative image, and this leads to sarcastic reactions. Whenever interest groups come together, the tone is set. We already referred above to the SDE scheme. Likewise, it was found that 80% of applications for solar energy are rejected by the Government. *“That sets the tone,”* says Mr. Vermeer.

Another concrete type of behaviour, as revealed in the interview with OMFL, is that the SME is awarded little or no money because submitting an application “is too much work”. Larger multinationals, on the other hand, employ specialists and can take risks, so this leads to a “class difference” when investing in sustainable energy.

We learned about a different type of behaviour at the housing corporation in Dronten. Mr. van Doorn told us that new homes built in accordance with the Building Decree must satisfy certain standards. The corporation therefore invests a great deal of money in the sustainable construction of homes. The homes are supplied with new systems – often expensive and prone to malfunctions – and the costs of these systems are covered in the rent. This generates almost no revenue. After all, current knowledge about building methods and modern materials mean that it is easy to achieve a low energy label. Much less money is being invested in older homes, which are being demolished rather than upgraded because this generates more profit.

The last type of behaviour we want to discuss is what OFW calls “fear of the unknown”. There is a general assumption that you need a lot of time and expertise to apply for a subsidy. This assumption will continue to reinforce itself if nobody challenges it and/or employs parties to fill in the application. One frequently heard complaint is: “Let’s not go too deeply into this, it involves much too much work”. Mr. van Doorn has a name for this – “fear of the unknown” – and he believes is it uncalled for.

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<sup>8</sup> Source: *Financieel Dagblad* of 16 November 2009

### **3.1.3 Consequence**

The result of behaviour or rather the consequence of the above is mainly characterised by the absence of new investors in sustainable energy. Good potential plans for sustainable energy are not being implemented because the SDE scheme is unreliable, for example. According to an article published on 17 September 2009 on [www.duurzameenergiethuis.nl](http://www.duurzameenergiethuis.nl): “*The SDE scheme would depend too much on the whim of politicians and would stand in the way of any real development of sustainable energy*”.

Furthermore, for most potential investors, unfamiliarity with the legislation and regulations and unreliable access to the requisite permits and available subsidies are good reasons for not getting involved in sustainable energy. Whether it involves wind farms, fermentation systems or solar panels, no initiatives are being taken.

Entrepreneurs are remarkably reticent about investing in sustainable energy; the business risk they face is simply too substantial to dare take such a step. As the prime mover of the wind farm in Biddinghuizen, Mr. Iordens has managed to overcome the reticence of the project participants by taking the following measures:

- Present all the requisite input as simply as possible
- Focus on the financial advantages of the cooperative venture
- Relieve the parties of all the administrative red tape.

The wind farm project would never have got off the ground without concentrating all of these tasks in one place – as a kind of catalyst for information flows – and without the backing of the subsidy scheme that was applicable at that time. In other words, the natural behaviour of entrepreneurs needs an extra stimulus (in this case, the measures taken by the prime mover and the available subsidy) before they actually decide to become involved in such an enterprise.

### **3.1.4 Summary of antecedents, behaviours and consequences**

While summarising the feedback for our chosen model, a number of points stand out. There is no sense of trust in the Government, which is mainly due to the lack of clear information. The raft of information and information suppliers is resulting in a bad investment climate (for example, the bank’s estimate of the risk of default by investors and the stricter policy on

financing that involves more risk). Because of this, entrepreneurs have to feel very strongly about their responsibility for the environment before they are willing to take such risks.

Now that the ABC model has provided us with more details about the consequences of the current situation, we can answer sub-question 1:

*“Which information is necessary in order to consider making an investment and how must that information be made available?”*

- Information that clearly illustrates the Return On Investment (ROI)
- Information about the use of tax breaks for the green sector (tax breaks for green energy)
- Information about guarantee stipulations or conditions for regulations for investments in sustainable energy
- Information about best practices in the sector
- Where all the requisite information can be obtained

As mentioned above, initially we did not tackle this question from the perspective of the *what* but rather the *how*. We discovered that there is more than enough information available to (potential) investors. And they are all more or less aware of this. The real question is how this information can be presented so that it is accessible and usable. Furthermore, the information being supplied must be clear and unambiguous. The rejection of applications because of discrepancies in the legislation and regulations is bad for the Government’s image and also, therefore, for the investment climate in sustainable energy.

One of the interviewees proposed merging the six municipalities in the province into one municipality: the ‘Municipal Province of Flevoland’. We believe this is a good example of why the investment climate is not reaching its full potential. But we should add that, in our opinion, this is mainly due to certain conditions and not to the core values. Particularly the role of municipalities will have to be looked into in order to resolve this issue. This role is analysed in section 5.3.

## 4 Facilities provided by the banking sector

The second sub-question reads as follows *“To what extent are the facilities in the (international) banking sector sufficient to stimulate investments in sustainable energy?”*

We can answer this question by approaching it from different perspectives. In this chapter, we look at the various parameters that affect the availability of banking facilities for investment in sustainable energy. Pertinent developments such as the current financial crisis must be included, of course. Nowadays, a more long-term orientation is being demanded from banks, particularly by the wider society but also by Governments. We realise that this long-term orientation signifies a change in strategy.

### 4.1 Sustainability as a part of strategy

For the banking sector, facilitating investments in sustainable energy has become a permanent fixture of business strategy, not just from a financial perspective but also from a social perspective. For example, every large bank publishes a social annual report in which corporate social responsibility and support for a sustainable society play an important role. Some banks have even based their business model on sustainable investment. For example, on its website<sup>9</sup> Triodos describes its mission in the following way: *“Triodos Bank finances companies, institutions and projects with added value in the social, environment and cultural spheres. It is granted the resources to do this by savers and investors that have opted for corporate social responsibility and a sustainable society.”*

The financial crisis has given an extra incentive to the call for corporate social responsibility. After all, the integrity and reputations of banks have been badly damaged, and corporate social responsibility offers them an excellent opportunity for “moral reinstatement”. However, it is important here to ask how this growing predilection for corporate social responsibility is translating into an active policy to support sustainable (energy) projects. During our interview

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<sup>9</sup> Source: [www.triodos.nl](http://www.triodos.nl)

with Ms. van de Berg<sup>10</sup>, she expressed the conviction that Rabobank has three possible choices for its financing strategies:

1. Finance the “super-sustainable” companies in particular
2. Finance everybody who has a reasonable to good plan
3. Broadcast the message that sustainability is important for Rabobank.

According to Ms. van de Berg, Rabobank is especially interested in Choice 3. Nevertheless, she also says that yield perspective and risk reduction, certainly in the current economic climate, are forcing Rabobank to be more critical about applications for financing. Particularly in the agricultural sector, a growing number of Rabobank customers have been placed under “special management” due to the bad repayment of loans or other problems with operational management.

It can be deduced from the above that commercial organisations will at all times make a comparative assessment between their commercial interests (shareholder value) and the interests of society (stakeholder value). In this area, some banks are certainly tipping the balance further in the direction of sustainability (for example, Triodos bank), although here, too, the business model clearly focuses on making a profit. Mr. Iordens says that he chose to have his wind farm financed by Rabobank. In the round of banks that he visited with his investment plans, the ABN-AMRO, ING, Triodos and Rabobank banks were all very interested. According to him, the project was too large for Triodos bank (EUR 40 million), while ABN-AMRO was sympathetic but it turned out that the bank employees in question did not have enough technical knowledge to be able to evaluate the project adequately. The two remaining banks, ING and Rabobank, both had enough scale size and sufficient knowledge in-house to take on the project. Given its more advantageous conditions, Mr. Iordens ultimately chose Rabobank to finance the project. Although it is not possible to draw conclusions from a single case, it would be fair to deduce that:

- All banks profess to be interested in sustainability, but:
- Due to issues of scale and/or a lack of specific knowledge, some banks cannot undertake these types of projects.

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<sup>10</sup> Ms. van de Berg is Senior Associate Clean Tech in the Food & Agribusiness Research and Advisory department at Rabobank International in Utrecht

In his dissertation, Mr. Dr. Dommerholt<sup>11</sup> states that in practice corporate social responsibility means that the expectations of stakeholders are translated into a strengthening of profitability, a visible commitment to sustainable development, and a guarantee of legitimacy. The above scenario, in which several banks succeeded or failed in their aspiration to contribute to investments in sustainability, clearly shows that it is difficult to translate this commitment into concrete results.

## 4.2 The effect of the financial crisis

The following article describes the current situation in the banking sector:

### **Banks promise to finance more sustainability projects**

Banks have promised to make more use of the Government's guarantee regulations for providing loans for sustainable energy projects. Van Lanschot, Triodos, Royal Bank of Scotland, Rabobank, Fortis, NIBC, Frieslandbank, ABN-AMRO and ING made this promise after talks with Minister Maria van der Hoeven of Economic Affairs.

The Minister has made 2.4 billion euros available to guarantee loans to sustainable projects. The Business Financing Guarantee (GO) was specially designed to cope with the credit crisis. The scheme is intended to provide companies with loans of a maximum of 50 million euros. The Government will guarantee 50% of those loans. The Credit Guarantee For Small And Medium-Sized Enterprises Decree scheme is intended for starters and the SME. Furthermore, Economic Affairs also recently launched the Growth Facility.

As yet, little use has been made of the facilities. This is because the loans are often for long-term projects. In view of the market circumstances and the fluctuating energy prices, the risks can be considerable. The Minister is considering taking further measures if no loans are granted in the near future.

Source: Financieel Dagblad, p. 3; 1/2 p. (7-3-2009)

Despite the low Euribor rate and the agreements with the Minister, banks are evidently not very keen to facilitate 'long-term money' for relatively high-risk projects. This was confirmed by Ms. van de Berg, who explained that Rabobank is currently pursuing a somewhat cautious policy for very large projects, certainly for the time being. She refers to the fact that the limited liquidity of banks means that money is currently expensive. And besides often being complex, of course, the large projects also involve a longer payback time. She, too, calls this "*long-term money (7-8 years)*", referring to the long risk period that Rabobank is facing with those large projects.

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<sup>11</sup> Dr. E. Dommerholt works at the Sustainable Entrepreneurship Lectureship at Windesheim University, Zwolle

When we inquired at the European Investment bank in Brussels about the current financing of sustainable energy projects, Mr. Calthrop<sup>12</sup> replied: *“The facilities of the international banking sector are sufficient for both large and small organisations. Nevertheless, the money has become more expensive due to the financial crisis, and this is having an effect on the banking sector’s attitude. People are not taking any risks on new developments. Because of this, people are turning to the EIB more often, particularly because of our advantageous conditions.”* Mr. Calthrop adds that the EIB is mainly facilitating projects that are already demonstrably financeable. The reason people are turning to the EIB is mainly because of its advantageous conditions compared to commercial banks.

Based on the available information, it therefore appears that banks are indeed following the subsidy flow. Wherever Government money is available, investments are being made, the risk is being minimised, and the procedures and turnaround times are relatively short. This can be characterised as short-term activity within a long-term strategy.

This short-term vision can be explained by the extent to which the banking sector is busy restructuring itself. Mass dismissals, the shedding of business units, cost reductions: all of this to keep afloat and present shareholders with a positive trend in the shortest possible time. Hamel and Prahalad (1994) maintain that this phase of restructuring rarely leads to a fundamental improvement in the results.

### **MABA (Market Attractiveness Business position Assessment)**

To what extent has the crisis changed the attractiveness of the market for the financing of sustainable energy projects by the banking sector? The MABA (Market Attractiveness Business position Assessment) analysis developed by McKinsey and GE is used to map out this phenomenon. The MABA analysis is a portfolio analysis and can be regarded as an expansion of the BCG matrix<sup>13</sup>.

The MABA analysis consists of two axes that form 9 cells. The competitiveness is displayed on the horizontal axis, in this instance projected for the entire banking sector. This consists of factors that determine the competitive strength of a particular product-market combination

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<sup>12</sup> Mr. Calthrop is Sector Economist for Energy, Transport & Environment at the European Investment Bank (EIB)

<sup>13</sup> The Boston Consulting Group matrix was dealt with during the first semester.

(PMC). In this MABA analysis, the PMC consists of facilitating investments in the market for sustainable energy. Next, relevant factors such as sector growth, customer loyalty and access to finance are valued with a figure and a weighting factor. By adding the weighting factor, the various aspects are differentiated according to their importance for the competitiveness in this PMC.

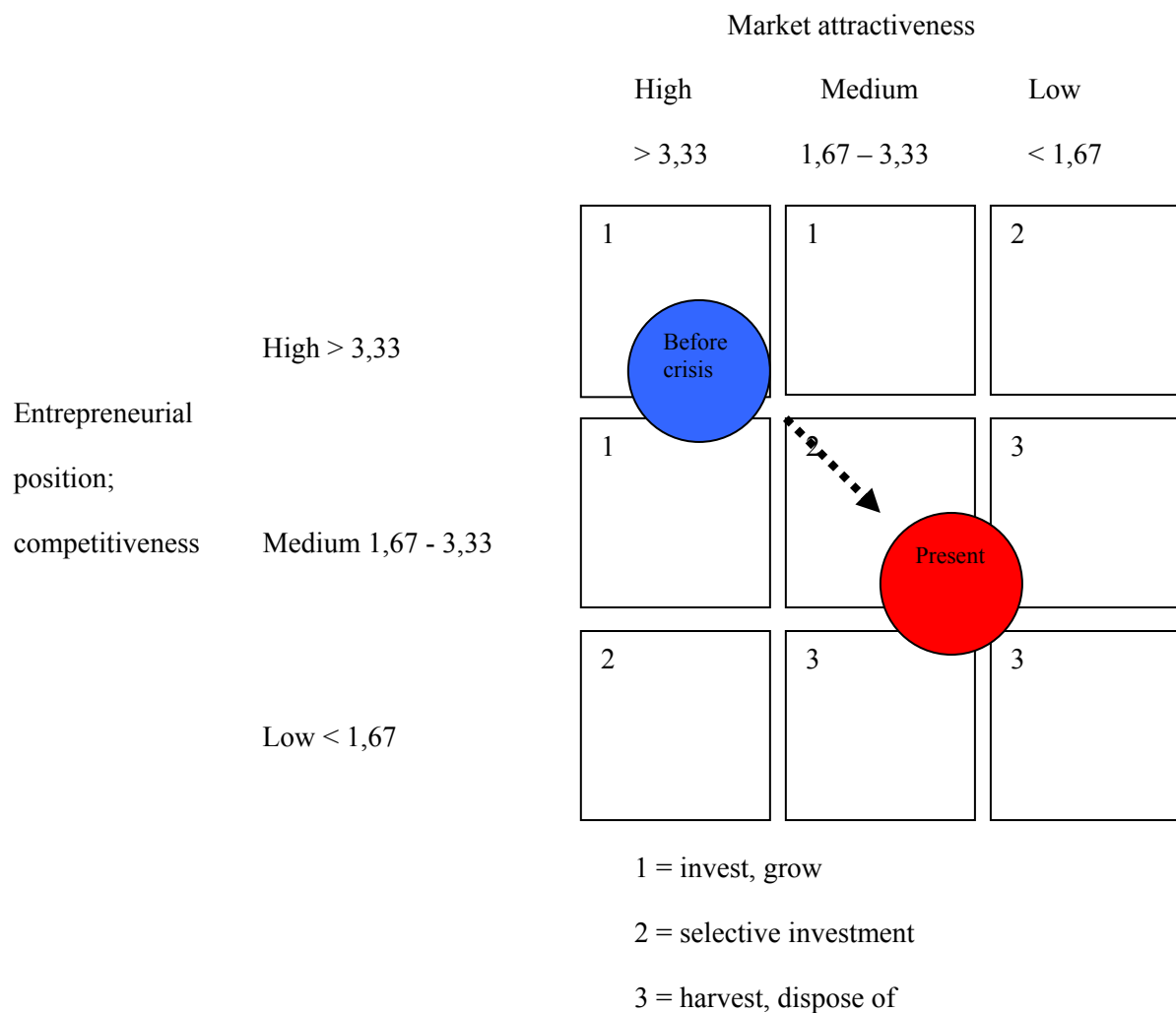


Figure 1 MABA analysis visual

The vertical axis displays the market attractiveness, for which relevant factors that influence the PMC are also selected, such as cost development, market growth, market yield and the risk profile for the market. By awarding values varying from 1 to 5 to the various factors, their position in the matrix can be determined. When this model is implemented twice, once for the situation before the financial crisis and once for the current situation (the present), it provides an insight into how much the attractiveness of this PMC has changed for the banking market.

The definition of the various aspects is a critical factor in the process, and this was carefully implemented by the five project members. However, the factor definitions, the weighting, and the scores themselves are based on qualitative input obtained in the interviews. We realise that this can lead to a subjective and not entirely representative result. We nevertheless regard the use of and reference to this analysis in this study as a valuable addition that visualises the effect of the financial crisis using a theoretical model and links it to the information obtained in the interviews. To confirm the result, the results from this model can be tested using criteria and representative parameters that were obtained objectively.

Based on the result of the MABA analysis as implemented in this study, it can be deduced that the climate for investment by banks in sustainable energy has been seriously damaged by the financial crisis. This confirms the suspicion that banks are no longer queuing up to invest in sustainable energy projects. The big question, however, is what will turn this situation around. The banks themselves are making the first moves in this direction. In the run-up to the climate conference, a collective declaration from the ten largest Dutch banks<sup>14</sup> contained the following statement about achieving the climate targets and the investment climate: *“The Dutch banks also acknowledge this [the need for a transition to mainly renewable energy sources] and will pay more attention to sustainable energy in financing and investments. However, there will then have to be a sufficient number of energy projects with a risk that is acceptable to banks.”*

The banks also declared the following: *“It is therefore necessary for Governments to create advantageous and structural conditions. In particular, we would ask the Dutch Government, as soon as the ink has dried on the climate treaty, to create realistic and workable conditions in order to vigorously stimulate sustainable energy in the Netherlands so that the targets*

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<sup>14</sup> ABN AMRO, AEGON Bank, ASN Bank, Friesland Bank, Fortis Bank Nederland, ING, Rabobank, Robeco Bank, SNS Reaal, Triodos Bank (29/11/2009)

*formulated in Copenhagen can actually be realised. The banks advocate the introduction of a long-term, unambiguous (statutory) system that gives all market players the resources and the confidence to make substantial investments in sustainable energy projects.”*

### **4.3 Information supply**

When an organisation is interested in investing in sustainable energy, the first question to be asked is how that interest was aroused in the first place. This might have been through projects in the organisation’s immediate environment, contact with colleagues or companies in the same sector, information from the media or information from the banking sector or the Government. This study has not focused on the extent or effectiveness of this information. Perhaps this could be researched in more depth in a follow-up study.

Another important aspect of information supply is the extent to which the need for information is satisfied when such information is being actively sought and/or requested. This information can generally be obtained through two channels: the websites of the various banks or at the offices of those banks.

The websites of the various banks include a great deal of information and products related to sustainability, sustainable investment and investment in sustainable energy. When we entered the search string “sustainable energy”, we found the following information:

<i>ABN AMRO</i>	<i>: clear information in the shape of products such as Milieulease (environmental lease) and Groenlening (green credit)</i>
<i>ASN Bank</i>	<i>: sustainability as part of the business model, strong focus and clear product overview</i>
<i>Friesland Bank</i>	<i>: no result other than a reference to the 29/11 statement by the banks</i>
<i>Fortis Bank Nederland</i>	<i>: clear information about sustainability-related products and a reference to the MeesPierson/Triodos cooperative venture</i>
<i>ING</i>	<i>: reference to Green Choice</i>
<i>Rabobank</i>	<i>: strong focus on sustainability and link to various products, such as Rabo Groenfinanciering (green financing).</i>
<i>SNS Reaal</i>	<i>: reference to the ASN green project fund</i>
<i>Triodos Bank</i>	<i>: sustainability as part of the business model, strong focus and clear product overview</i>

*EIB : clearly quantified amount of credit (EUR 4 billion) for  
“sustainable energy” projects*

*The above overview is based on the search text “sustainable energy” and searches conducted in the ‘financial’ area, ‘investments’ sub-area.*

Based on this information, we may conclude that the (initial) need for information can be met relatively easily by the Internet, a conclusion confirmed by the study conducted by VBDO (see frame). Given the adequate information supply through the websites, we can ask the same question about the information supply through the offices of the banks. The study conducted by VBDO showed that banks score badly in this area.

**Banks score badly for information about sustainable investment**

Mystery shoppers award 19 of the 27 banks they visited a dismal score for the information they provide on investing and saving sustainably. They visited branches of Postbank (now ING), Rabobank, ING, SNS Bank, ABN-AMRO and Fortis. A study of the websites shows that some banks provide extensive online information but others provide no sustainability information whatsoever.

The mystery shoppers asked point-of-contact employees a number of relatively simple questions. According to the bank employees, for the bank the concept of ‘sustainability’ mainly means green energy and an embargo on investments involving controversial weapons or child labour. Just 5% of employees were able to provide information about the returns from sustainable products. They often remarked that sustainability and returns do not normally go together.

The study was conducted by the Association of Investors for Sustainable Development (VBDO). Director Giuseppe van der Helm described the results as ‘lamentable’. The VBDO will ask the banks in question to arrange better training for their personnel. After a subsequent and more detailed study, it will also be announced which banks are performing best in this area.

Source: Algemeen Dagblad, p. 15; 1/2 p. (10-3-2009)

This shows a certain element of uncertainty avoidance. Geert Hofstede and Gert-Jan Hofstede (2007) define this in the following way: “*Uncertainty avoidance should not be confused with the avoidance of risks.*”; and “*Uncertainty avoidance does not lead so much to fewer risks as to less vagueness.*” This statement could be freely translated as “fear of the unknown”. What kind of value is there when a strategy communicated from head office is not actively implemented by the local offices? This is evidently an area that the banking sector can improve by strengthening its information supply and product knowledge about sustainable investment at the bank offices.

## 4.4 Summary of the banking facilities

How does the information in this chapter help us to answer the second sub-question (*“To what extent are the facilities in the (international) banking sector sufficient to stimulate investments in sustainable energy?”*)? Based on the recent declaration by ten banks in which they express their intention to release sufficient facilities, a predominantly positive answer would seem to be fitting. However, the banks are now saying that the ball is in the Government’s court. So is this declaration from the Dutch banks a form of altruism or is it purely in the banks’ own interests?

Due to the diminishing value of the subsidy schemes and to the financial crisis, the banking sector seems to be adopting a waiting role, and a shift from inside-out to outside-in can be observed. What needs to be done to change this attitude? Well, the banking sector can continue to play that waiting role, where it simply reacts to developments on Government level (read: subsidy flow). Or the banks can innovate their business model so that customer value and market focus lead to the desired results. Needless to say, one of the preconditions for the required incentive will be the recovery of the financial market. And the factor of security is also a major concern in the banking sector at the present time. Nevertheless, an active sustainable energy policy can help to repair the dented image and reputation of the banking sector, a policy in which the role of marketing is not to be underestimated.

## 5 Facilities provided by the Government

The third and last sub-question relates to the extent to which the facilities provided by Government are consistent with the wishes of the target group. When answering this question, it is important to remember that there are two sides to the story: the Government is not just a facilitator but is itself also part of the target group. After all, the climate targets can only be achieved if the Government supports the business sector: *you scratch my back and I'll scratch yours*. Mr. Rijnten is aware of the Government's management and information role in relation to the target group. We will begin this chapter by analysing this type of inside-out thinking.

During the interview with the Province, we were unable to establish whether the basic principles of strategic marketing are being applied (Andreasen, Kotler, & Parker, 2008; Kotler & Andreasen, 1997). It was our assumption that the target group and positioning had already been chosen – for example, using the 4 P's: Price, Product, Promotion and Place. However, this was not the case, or at least nothing had been put down on paper. That is why we want to encourage people to think outside-in. In doing so, we want to go a step further than the traditional<sup>15</sup> 4 P's and find out which marketing approach would work best for the Province.

### 5.1 The information function

There are many different views on how best to implement information management. Given that information management has been associated for more than 25 years (Tieleman, 1974) with the relationship between business and ICT (Abcouwer, Maes, & Truijens, 1997), we want to analyse this view in more detail. The Province (Mr. Rijnten) and the MORE4NRG project (Mr. Pels) both expressed a clear need to optimise their information supply, not just to reach the target group by means of good-quality and reliable information but also to provide the cooperating partners in the project with good information. Incidentally, except for the study into

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<sup>15</sup> The 4 P's were discussed during the first semester. Because of the importance of the learning process, we also want to explore other methods.

the investment psychology<sup>16</sup>, the definition of “good information” is not analysed in detail in this paper<sup>17</sup>. We therefore limit our focus to the strategy used by the MORE4NRG project to manage its information.

### **Less is more**

The Government is providing more than enough information! Each of the interviewees was able to effortlessly name numerous websites, articles and contact persons through which they could find information about sustainable energy, a possible strategy, policy and regulations, etc. Moreover, during our desk research we discovered that the issue is more about filtering information than about finding it. We sometimes even had to get rid of information to prevent clutter and retain a good overview of the situation. In our opinion, this perfectly illustrates the organisational paradigm we are facing. People often think that the information era is all about knowledge and information, but that is not really what distinguishes it. Information and knowledge have played an important role throughout history. So it is not information that is important but rather information systems (Gazendam, 1999).

### **Information systems**

MORE4NRG is a knowledge-intensive project. The cooperating partners depend on the availability of information systems so that they can share knowledge with each other. Besides the regular email facilities, Mr. Rijnten says that people also want to have a system that enables them to share knowledge. This system should also function as a monitoring tool so that the interim results of the overall environmental targets – on a regional level – can be made transparent. Mr. Rijnten says it is important to first create a support base before introducing such a monitoring tool. This is because nobody wants a website on which everybody can ‘dump’ the results as a PDF file without first formulating a plan about what to do with that knowledge. As an example of a successful website we can mention the existing toolkit of the World Bank. The main points of functionality are:

- Storing and searching for documents
- Comparing case studies
- Relevant regulations

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<sup>16</sup> The investment psychology is discussed in detail along with the ABC model in section 3.1.

<sup>17</sup> Working out the meaning of “good information” will in all probability be discussed in the 4<sup>th</sup> semester.

- Tender procedures
- Combining data

The above summary of the functionality and the visual attractiveness of the sites clearly show that we are very enthusiastic about the World Bank's toolkit. Obviously, there are more information systems available. MORE4NRG may even consider using an Open Source<sup>18</sup> licence. The following are some examples.

Large-scale toolkits:

- EU bookshop (which went live on 15 October 2009)<sup>19</sup>
- World Bank toolkit for sustainable energy<sup>20</sup>
- Development programme for the United Nations<sup>21</sup>.

Small-scale toolkits:

- IDeA benchmark & toolkit (IDeA = Improvement and Development Agency for local government)<sup>22</sup>
- BESS, with e-learning functionality (Benchmarking and Energy Management in small and medium-sized companies)<sup>23</sup>.

Every beginning is difficult, of course, and further improvement and refinement of the preferred functionality for the MORE4NRG tool will necessary to make it truly successful. There appear to be enough examples of systems that have gone through the same development process, so it may be useful to contact the users of those examples personally to exchange experiences. We believe that besides the choice of layout, format and design, attention should be paid to collecting documents from the participating partners. The dilemma what can be faced during the process is a typical information management paradox. Creating order by having a website does

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<sup>18</sup> Open Source software is freely available software code (example: Wikipedia)

<sup>19</sup> EU Bookshop: [http://www.bookshop.Europe.eu/eubookshop/index.action?request\\_locale=NL](http://www.bookshop.Europe.eu/eubookshop/index.action?request_locale=NL)

<sup>20</sup> World Bank toolkit:

<http://web.worldbank.org/WBSITE/EXTERNAL/TOPICS/EXTENERGY2/0,,contentMDK:22144967~menuPK:6032261~pagePK:210058~piPK:210062~theSitePK:4114200,00.html>

<sup>21</sup> United Nations: <http://www.undp.org/fssd/>

<sup>22</sup> IDeA benchmark & toolkit: <http://www.idea.gov.uk/idk/core/page.do?pageId=8783769>

<sup>23</sup> BESS: [http://alpha.cres.gr/bess/servlets/bessStatic/nl/dartimg\\_simple.html](http://alpha.cres.gr/bess/servlets/bessStatic/nl/dartimg_simple.html)

not appear to be the solution. Moreover, there is another motivating factor required to make progress, and this is discussed in detail below.

### **Paradox as source of progress**

Henk Gazendam (1999) writes that we live in a turbulent world, but that the greatest turbulence exists inside organisations. He says there is no shortage of information in organisations, but there is indeed a shortage of focus on the people who work with that information. The information era is really all about the people who work with information systems. And those people are vital in a learning organisation (in other words, for knowledge management). According to Fayol (1950), good knowledge management requires a stable core of personnel. And we must not forget that there are limits to the recruitment power of financial and material rewards, and that intrinsic motivation plays a particularly important role in knowledge-related work. The MORE4NRG project has a virtual project organisation. The participants are spread all over Europe and they use information systems to pass on information to each other. Therefore, the important question for the MORE4NRG virtual organisation is whether it has a stable core of personnel with learning ability:

- How well do the people actually know each other?
- To what extent are the people prepared to learn from each other?
- What is their intrinsic motivating factor for sharing knowledge?
- How can the information systems be deployed in the best way possible?

If the MORE4NRG participants find even these questions too difficult to answer, what kind of interaction will they have with citizens, companies and other organisations? After all, according to Gazendam the use of information systems should enable us to create more transparent organisations, but we are also witnessing a counter-movement towards less transparency in an attempt to protect policy space and avoid any political risk. In an article by Paul Pierson (2000), this 'law to preserve policy space' is called 'obfuscation'. He says that the role of obfuscation in this sense is to pursue a political agenda with the lowest possible costs in terms of (potential) electoral losses.

Are we going too far by relating the information function to a strategic, political agenda? We don't think so. Indeed, the paradox we described above is really challenging policymakers and administrators. And these challenges will make sure that the ability to organise adequately will

increase. In the next section, which discusses the Government's management function, we describe how this is now being tackled and we point out where improvements can be made.

## 5.2 The management function

Reconsidering the intended toolkit for regional strategies, we see that there is already a Government initiative in the Netherlands to keep the business sector informed about the relevant regulations on a range of subjects. This initiative is called "Answer for Companies<sup>24</sup>" and is aimed at helping businesses to deal with the raft of regulations (source: [antwoordvoorbedrijven.nl](http://antwoordvoorbedrijven.nl)). This makes it the successor to the Bedrijvenloket (Information Centre for Businesses) and its aim, in combination with the Services Directive, is to not only make the relevant regulations available but also to stimulate the free movement of services in Europe.

### Who is the manager?

The intended one-stop-shop idea is reserved for the local municipality, which will therefore fulfil the management role. By linking its information systems to national information sources, the municipality will be able to efficiently answer questions from local entrepreneurs rather than endlessly searching for a) the right source of information and b) the right regulations. Here we see again that the focus is not on the information but on the quality of the information systems and the links between them. In her weblog, Ms. Bliet, a member of the Flevoland Provincial Executive writes:

*"One thing is clear: the **municipalities** will organise the information point that citizens and companies in their municipality will soon be able to turn to. Before that, starting on 1 January 2010 we will go through a transition period of several years in which, for a few of those years, the **provinces** will actually be responsible for granting all permits to the companies to which they are already granting permits."*

The main instrument that will help the municipality to fulfil its information function properly is the Environmental Licensing Bill (WABO), which will most likely come into effect in 2010. This Act combines regulations for the physical environment on subjects such as the natural surroundings, the environment, construction and listed buildings. The aim of this single

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<sup>24</sup> See <http://antwoordvoorbedrijven.nl/>

information point is to make the procedure from application to realisation much more transparent (and faster) for local entrepreneurs. However, this does not answer the question about who has control of management. We will therefore have to examine the concept of management in more depth and will use the term ‘transaction economy’ from Butter (2007) to do so, because in his lecture he says that management and trade are the developments on which the future depends.

### **Transaction economy**

According to Butter (2007), the worldwide fragmentation of production is making it increasingly important to connect the links in the chain, because it is this connection that creates value. When we associate the word production with the production of information, we again see that connecting information systems and connecting organisations (the links in the chain) are the essence of management. Butter and Gazendam agree on this point. However, we wonder whether one of the partners participating in MORE4NRG can gain a comparative advantages with this type of production. In other words, what are the benefits of management? In his lecture, Butter says that the emphasis should be on lowering transaction costs. Organisational innovations and innovations that result in a better connection between the various links (people and information systems) in the production chain, that lower the transaction costs and that therefore create value lead to greater productivity in the management function.

Based on the target of the Environmental Licensing Bill, Ms. Bliëk’s weblog, the desk research and the above-mentioned theory, we suggest that the management function can be associated with the transaction economy, even when it involves transitory information. Needless to say, we think that quality and the pooling of regulations is important, but the financial result of management is equally important. The book “The Dutch Encounter with Asia” (Zandvliet & Blussé, 2002) includes a striking example of how the Netherlands has always treated the financial result as part of the management function. Even in the days of the Dutch East India Company, the Chinese understood how we did that:

*“... the Hollanders are acquisitive and astute, have an in-depth knowledge of precious goods and are very clever in turning things to their own advantage; they go to any lengths to make a profit and nowhere is too far for them to travel. (...) These people are also very competent and*

*resourceful, they make sails like spiders' webs that can rotate and catch the wind in every direction, so that whichever way they turn they have the wind in their sails..."*

### **5.3 The marketing function**

According to Bressers and Klok (1988), the Government also has a role to play as a marketer for sustainable energy, a role that is less obvious than the Government's information and management function. With their ideas on the deployment of policy instruments, Bressers and Klok had a considerable influence on the way Government functions in the abovementioned transaction economy. It is actually the problem around sustainable energy that inspired the policy instrument theme. In itself, that is logical because the 'policy area' of sustainable energy is one of the most recent policy areas and is also of considerable social importance (Dommerholt, 2009). Due to this importance, the popularity of the subject grew and policy instruments were soon introduced. Particularly in the mediagenic sector, a national laboratory was established in which everybody in the country was allowed to take part. Whether it involved a solar-powered car race in Australia or The Best Idea in the Netherlands, nothing was too outlandish. But these were initiatives from the market and not from the Government: the solar-powered car was sponsored by Nuon and The Best Idea was a television show devised by television channel SBS6.

Is (local) government therefore not capable of operating in a mediagenic or marketing-oriented way? We want to answer this question by reconsidering the traditional school of policy instruments. We believe that this is the way to find out why it is so difficult to see the Government as a marketer.

#### **Traditional policy instruments**

The public administration and policy sciences use a classification consisting of economic, legal and communicative instruments. Van der Doelen (1989) has added a specification consisting of stimulatory and repressive forms. This produces the following overview, to which we have added our own examples.

	Stimulatory	Repressive
Economic instruments	Subsidy	Charge

	(MEP and SDE scheme)	(Deposit amount)
Legal instruments	Agreement (reduce regulatory pressure)	Order, prohibition (anti-drugs zones)
Communicative instruments	Information (public information campaign)	Propaganda (EU constitution)

Table 1 Traditional policy instruments

A fourth policy instrument is often added to the above, the spatial instruments, which appears to complete the set – for the traditional civil servant at any rate. In the framework of this project, we advocate adding a fifth instrument, namely the marketing policy instruments. The main reason for adding this fifth policy instrument is to be found in the “New Green Deal”. This is a political concept used to stimulate environmentally friendly initiatives in times of the economic crisis. Because of the relevance of this political concept, we want to explain it below.

### **Green New Deal**

Inspired by US President Roosevelt’s measures to tackle the Great Depression of the 1930s (the New Deal<sup>25</sup>), the UNEP (United Nations Environment Programme) proposed a programme at the G20 meeting in London in April 2009. Of the USD 3 billion invested worldwide in economic measures, around a third should be spent on investments in green initiatives. Environment Minister Cramer was also present at this G20 summit in order to prepare for the G20 meeting in Pittsburgh (September 2009) and the climate summit in Copenhagen (December 2009). Back in the Netherlands, she announced a “massive package of incentives<sup>26</sup>” for sustainable energy. According to Cramer: *“The new, extensive system for financing sustainable energy is ‘a true green revolution’”*. She fully supports the agreed Government-wide green approach. *“Every line of this agreement is in the spirit of the sustainable economy. It is the focus of the plans of all of my colleagues with whom I will be cooperating closely. May this package rightly be called the New Green Deal.”*

<sup>25</sup> The New Deal is most familiar as a strategic concept: [http://nl.wikipedia.org/wiki/New\\_Deal\\_\(VS\)](http://nl.wikipedia.org/wiki/New_Deal_(VS))

<sup>26</sup> Source: <http://www.vrom.nl/39105>

But how does the package look financially? Can entrepreneurs, banks and other stakeholders rely on the Government to play the role of sustainability advocate? The following overview displays the eight main initiatives, which are worth a total of 1.4 billion euros.

	Amounts in millions of euros	2009	2010	2011 et seq	structurally
FES* Environment and Sustainability projects		116	116		
Sustainable business sector		30	20	10	
Sustainable agricultural sector		30	20		
Energy: energy savings for homes		160	160		
Energy: demolition scheme in car sector		35	30		
Energy: offshore wind (following tender SDE scheme)			15	160**	160
Implementation Van Geel Motion on spatial economy		60	55	50	
FES Projects Spatial Economic Policy		190	190		
<b>* FES=Fund to strengthen the Economic Structure</b>		621	606	60	160
<b>**=from 2014</b>					

Table 2 Financial impact of the eight main initiatives

Although not all initiatives are directly related to sustainable energy (the Van Geel Motion, for example), despite the economic crisis extra initiatives are still being taken on top of the existing initiatives. Any projects being submitted may therefore count on the Government's keen interest. However, none of the entrepreneurs, banks or other stakeholders that we interviewed ever spoke or asked about the existence of the Green New Deal even though the Provinces themselves are indeed taking the initiative with planned green investments<sup>27</sup> of 178 million euros. On the one hand, this may be because we did not ask about the Green New Deal ourselves, while on the other hand it might point to a "marketing problem". Hans Rijnten confirmed this by saying that the local administration (including the Provinces) may have a marketing problem.

We realise that the term 'marketing instrument' could mean that one party is pulling the strings but that is not good for the interaction between the parties. Moreover, it is impossible to regard the instruments separately from each other – for example, the legal instruments, which require more than a reduction in regulatory pressure to enable investments to be made in sustainable energy. In other words, a combination of economic, legal, communicative and marketing policy

<sup>27</sup> 178 million euros for provincial green investments: [http://www.ipo.nl/20-Provincies\\_investeren\\_extra\\_in\\_groene\\_projecten.html?article=8548](http://www.ipo.nl/20-Provincies_investeren_extra_in_groene_projecten.html?article=8548)

instruments will be the best solution for the abovementioned investment agenda. The marketing policy instrument is ideally suited to that interaction, and we believe that this is the definitive reason for adding marketing to the list of policy instruments. We will show *what* is necessary to do this and *how* it can be tackled. To make this exercise as practical as possible, we will focus again on the Province of Flevoland.

### **What is required for marketing?**

A distinction can be made between market-driven, non-market-driven and mixed developments. We are focusing particularly on market-driven developments and their relationship with the Government. This approach means the following:

- ... competition between producers and technology will be stimulated
- ... an advanced, financial long-term planning schedule will be drawn up for energy production
- ... trade in green certificates may play a role in the future.

The formulation of a marketing strategy, based on the approach above, could turn out well for the Province of Flevoland. By the way the Provincial Executive member Bliet is already seeking out the media – for example, through her weblog – the gap to environmental marketing could quickly be bridged. In a way, she is acting as Chief Marketing Officer, a role in which she can increase the influence of marketing on the organisational culture (Frambach & Leeflang, 2009) at the Province of Flevoland. That completes the basic ingredients for pursuing environmental marketing: a focus on a particular approach, a simple vision and maximum support from within the organisation.

### **How can environmental marketing be tackled in the provinces?**

According to Mr. Douma<sup>28</sup> there are still benefits to be gained in marketing by connecting the regions and involving the population. He is referring, for example, to the locations of wind turbines. The residents must also benefit, as this increases the chance of people accepting “horizon pollution”. But we still regard connecting regions more as a management function (see the previous section) and more a consequence of marketing policy than as part of the environmental marketing strategy.

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<sup>28</sup> Mr. Douma works at LTO North

To ensure that the residents referred to by Mr. Douma are indeed heard (*the voice of the customer*, according to Naumann & Giel (1995)), a market survey can be implemented to mark the start of environmental marketing. In this market research, the stakeholders can be tackled together by means of segmentation. This segmentation is necessary because not all stakeholders will react the same to the marketing strategy (de Wit, 2003). It can be done, for example, on the basis of the geographical location, the demography or the psychography<sup>29</sup> of stakeholders. There are a number of important criteria to make the segmentation effective, and these are explained in the following overview.

Insight into ...	leads to ...
measurability	segmentation on the basis of adoption category
accessibility	distributive and communicative advantages
scale	sense of urgency
homogeneity / heterogeneity	interaction within and between the segments

Table 3 Relationship between insight and effectiveness of segmentation

This segmentation, once completed, is followed by a positioning manoeuvre, based on the principle that a particular group of stakeholders is *asking for* sustainable energy and another group is *offering* it. We do not wish to make it more complex than this, with all respect to the facilitative, supportive and legislative parties. This is because we have learned from the economic principles we described in the Investment Psychology chapter that the game of supply and demand is the crux of the matter. This is also evident from the description of the *transaction economy* in this chapter.

The positioning of the Flevoland market for sustainable energy could be placed in a national or even an international framework. The comparative advantages of Flevoland (high wind catchment, low population density) in combination with the comparative advantages of the Netherlands as a logistical hub (use of existing gas pipelines, good infrastructure) can ensure that the basic principles for investment must be viewed in a broader context. In our opinion,

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<sup>29</sup> Psychography is the influence on people of a particular lifestyle.

therefore, it cannot be ruled out that (for example) Greek investors<sup>30</sup> and the Government should be able to play a role on the Flevoland market for sustainable energy. We established above that money flows follow the subsidy flows. We now want to reverse this principle by suggesting that with the right marketing the subsidy flows could well follow the money flows.

## 5.4 Summary of the Government facilities

When attempting to answer the third sub-question (“*To what extent do the facilities meet the wishes of the target group?*”), we realise that we do not precisely know which facilities are available, we are not really aware of people’s wishes, and the target group has not been defined. Given that the spectrum of possible wishes and stakeholders is so broad, we cannot actually answer the question, not even if we make assumptions. By asking these questions, however, we have implicitly shown that the marketing function needs to be introduced in the Province of Flevoland. In this chapter, we have suggested *what* is needed to do this and *how* it can be tackled. We have also examined the more traditional role of the information and management function and identified a paradox in knowledge management. The management of MORE4NRG and the Province of Flevoland in general are faced with a challenge here and they must realise that intrinsic motivation is an important key for success.

To conclude, we have demonstrated that even in the case of management, the main focus is the financial result. Back in the Golden Age, the Chinese had already seen that the Dutch are masters at this. The Province of Flevoland can utilise these qualities by taking a fresh and innovative look at its landscape, population and investment climate. There are plenty of opportunities nationally and internationally. So the question is not so much whether there is enough money in the market, but whether the province has the capacity to extend its current strategy.

## 6 Conclusions and recommendations

A total overview of the conclusions and recommendations is a logical follow-on from the research report. To ensure that the Province of Flevoland can agree with the conclusions, a

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<sup>30</sup> According to Hans Rijnten, a large amount of money is available in Greece for sustainable energy projects.

management review was held on 2 December. In a short presentation, we showed our provisional results to Ms. Blik, Mr. Pels and Mr. Rijnten. We discussed the fine distinctions that they wanted to make and, where necessary, integrated them into the report.

## 6.1 Conclusions

Given that the sub-questions have already been answered extensively in the previous chapters, we have now decided to position them in another way. After all, the question and the answer do not always reflect the degree of flexibility in the strategy. Although it seems as if the conclusions in this section are purely points for improvement, we would like to emphasise that many good things are also happening. How else could the province be leading the way in the Netherlands and be already producing 56% sustainable energy? We therefore look forward to achieving the remaining percentages required to reach the target.

	Answer (basic outline)	Our main conclusions
<i>Which information is necessary in order to consider making an investment and how must that information be made available?</i>	<ul style="list-style-type: none"> <li>• Relevant ROI information</li> <li>• Unambiguous tax conditions</li> <li>• Best practices</li> <li>• Single information point</li> </ul>	<p>Entrepreneurs are still struggling with the raft of measures, subsidy options, procedures.</p> <p>Information about investments in sustainable energy is accessed in different ways.</p> <p>New sustainable methods to produce energy are having to compete with the traditional methods (such as the costs of connecting to the existing energy network and demolition costs after the technical life span).</p>
<i>To what extent are the facilities in the (international) banking sector sufficient to stimulate investments in sustainable energy?</i>	<ul style="list-style-type: none"> <li>• Crisis playing a role</li> <li>• Long-term strategy, short-term policy</li> <li>• Ball in Government's court</li> </ul>	<p>For small-scale projects, the possibilities are limited, which means that the majority of the available subsidy will go to the larger strategic players.</p> <p>The banking sector is presenting itself as sustainable but is not backing this up with hard facilities in the area of sustainability.</p> <p>The average level of knowledge of employees at banks about the available regulations is inadequate.</p> <p>Companies want to invest in sustainability, but it must have a positive influence on their</p>

		profitability.
<i>To what extent are the facilities of the Government consistent with the wishes of the target group?</i>	<ul style="list-style-type: none"> <li>• Priorities by Governments</li> <li>• Differing interests of stakeholders</li> <li>• Guarantee stipulations/guarantees</li> <li>• Decentralisation management function, central policy (WABO)</li> <li>• Different roles of the Government (mediator, director, marketer)</li> </ul>	<p>The available subsidy schemes are still too limited to make profitable investments in sustainable energy.</p> <p>Because of the lack of long-term reliable agreements, there is a negative perception about the subsidy climate in the Netherlands.</p> <p>Businesses need a “sustainable” investment climate for investments in sustainable energy. This involves subsidy schemes and certainty about the yield.</p>
<i>Analysis of the monitoring tool</i>	<ul style="list-style-type: none"> <li>• Database or tool?</li> <li>• Knowledge management paradox</li> </ul>	<p>The European regulations on subsidies for sustainable energy is not yet uniform (for example, no common targets and units of measurement, different national incentive measures).</p> <p>The practices of pooling forces in Europe and sharing best practices are still on a low level.</p> <p>The information system alone is sometimes more important than the knowledge itself.</p>

## 6.2 Recommendations

We want to make sure that the recommendations are as concrete as the conclusions. We realise, of course, that measures based on these recommendations will not be taken lightly. Moreover, it is up to the Province to make choices that are consistent with the strategy on the one hand and extend the strategy on the other hand.

	Our recommendations
<i>Which information is necessary in order to</i>	Uniform way of taking measurements in the area of sustainable energy (CO <sub>2</sub> emission reduction, what is sustainable, who is polluting, how do you

<i>consider making an investment and how must that information be made available?</i>	<p>measure it?) in Europe.</p> <p>Active exchange of best practices in a European context so that the wheel does not have to be reinvented in different countries.</p>
<i>To what extent are the facilities in the (international) banking sector sufficient to stimulate investments in sustainable energy?</i>	<p>Stimulate investment in small-scale projects.</p> <p>Banking sector should not only claim that it wants to invest in sustainability (or rather facilitate special loans) but should also ‘put its money where its mouth is’.</p> <p>Uniform approach by all banks – for example, one integral green financing scheme.</p> <p>Raise knowledge level of bank employees or create a one-stop-shop (for each region). For example, in each region ABN-AMRO has one specialist in the area of sustainability and all financing options.</p>
<i>To what extent are the facilities of the Government consistent with the wishes of the target group?</i>	<p>Make the available subsidy schemes sustainable.</p> <p>Determine long-term yield energy prices.</p> <p>Introduce uniform regulations in Europe in the area of subsidies. This creates the same investment climate for all countries, which means we do not compete with each other in Europe.</p> <p>Equal treatment of traditional energy recovery and sustainable energy recovery (ban on unfair competition).</p>
<i>Analysis of the monitoring tool</i>	<p>Uniform way of accessing all available information.</p> <p>Active information by the Governments to higher plan.</p> <p>(Binding) incentive measures for use of sustainable products by consumers (punishment and reward).</p>

### 6.3 What next?

The use of the interview method and desk research have led to a number of conclusions. During the management review held by the Province of Flevoland on 2 December, these conclusions were already tested to some extent and explained to the Member of the Provincial Executive, Ms. Anne Blik, MORE4NRG Program Manager Bob Pels and Policy Employee Hans Rijnten. We are convinced that the conclusions are an excellent basis for further study. However, it will have to be possible to market this further study, and not just within Flevoland’s borders. Its applicability for the European partners, using the right approach, can also be examined. We

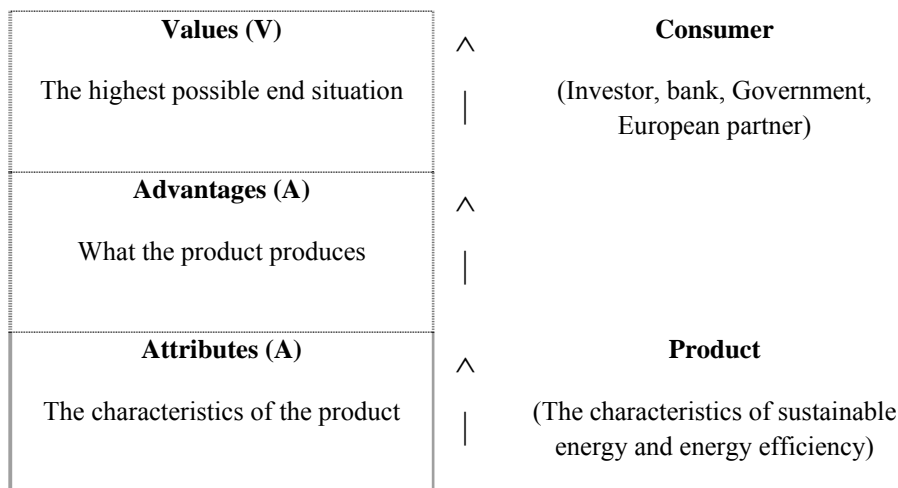
would be happy to advise on the type of approach because that would complete the cycle in an international context. To do this, the following is relevant:

- Focus on advantages for the investor, bank, Government, European partner and the advantages of sustainable energy.
- Do not focus on technology, transport, quality of regulations, etc.

With this approach, therefore, it is not so much the technical characteristics of the sustainable energy product that are being examined but the value that it generates in an international context and cross-culturally. The Means-End Chain Research (MEC) (Audenaert & Steenkamp, 1996) creates this type of framework to illustrate the perceived association between the product and its value. We learned about the MEC during the master class given by Dr. de Beuckelaer at Windesheim and want to use it because of its potential to link to the incentive to invest to the cognitive structure associated with the product of sustainable energy. In practice, we particularly see the MEC framework being applied to assess consumer behaviour, such as comparing people's perceptions when they buy apples from a farmer versus the large supermarket (Vannoppen, Verbeke, & Van Huylenbroeck, 2002). In the MORE4NRG situation, we can clearly see a number of similarities with the behaviour of investors, banks and Governments – for example, the way the Government uses sustainable energy as a marketing object versus fossil energy. While speaking with Mr. Rijnten, we found that considerable improvements are particularly possible in the area of marketing. In the next section, we make Means-End Chains (MEC) practical and workable.

## How it works

The Means-End Chains (MEC) framework is based on an assumption that a hierarchy of associations exists, starting at the bottom of the ladder at Attributes. This is followed by Advantages and Values:



In the example below, we use the principle of “a ladder”. In a one-on-one interview, consecutive questions are asked about an association in order to identify the highest possible value. Because it is necessary to keep asking questions, it is not possible to prepare all the questions in the interview. Only the first question and the structure of the interview will be known. This means that the next question will always be asked on one abstraction level higher in order to arrive at the highest possible value. This constant switching to a higher abstraction level is called “laddering”. An example of such an interview using laddering is displayed below.

Interview structure (I = Interviewer, R = Respondent)	Code	Ladder (read from bottom up)
I: You say you want to invest in sustainable energy because this is what you prefer. Why do you prefer this? R: <i>Sustainable energy helps me make <b>money</b>.</i>	> <u>Attribute</u> : preference <u>Advantage</u> : makes money	Appreciation of entrepreneurship ^ 
I: Why is it necessary for sustainable energy to make money? R: <i>If it didn't make money it would be difficult to <b>run</b> my company.</i>	> <u>Advantage</u> : contributes to the business result	Success ^ 
I: Why is it necessary to run your company in that way? R: <i>A <b>better result</b> makes me more <b>successful</b>.</i>	> <u>Value</u> : a good company makes the owner successful	Business result ^ 
I: Why is it important for you to be successful? R: <i>It proves that I'm a real <b>entrepreneur</b> and am <b>valued</b> for it.</i>	> <u>Value</u> : entrepreneurship is valued	Money

Table 4 Example of an interview using laddering

The essential basic principle when launching this type of international round of interviews is the first question because this must correspond with the report conclusion. That makes it possible to assess whether the conclusions also lead to particular recognisable values. The balance can be recorded after holding numerous interviews in Flevoland – and the interviewer can decide how many this will be. Enough experience has then been gained to start using the method internationally to display the cross-cultural differences in values: it may turn out that the value of entrepreneurship in the Netherlands is in a totally different dimension than in Bulgaria? We can imagine that the travelling distance and travelling time are too excessive to work with such an intensive method. That is the reason for introducing Steenkamp's association pattern technique (APT) (1994) as well as the ladder.

The APT is an arithmetical method for assigning a score to Attributes, Advantages and Values. Instead of an interview, the method uses questionnaires that can be completed both on paper and

digitally. The resulting data set will indicate a trend that results in the answer to the highest possible values. The example below illustrates this.

	Technically simple (Attribute)	Banks cooperating (Attribute)	High level of visibility (Advantage)	Good financial result (Advantage)	Genuinely sustainable solution (Value)	Appreciation for my company (Value)
Wind energy	[0.21]	<b>[0.63]</b>	<b>[0.84]</b>	<b>[0.56]</b>	[0.23]	<b>[0.57]</b>
Solar energy	<b>[0.61]</b>	[0.41]	[0.30]	[0.12]	[0.23]	[0.45]
Bio energy	[0.56]	<b>[0.82]</b>	[0.12]	[0.24]	<b>[0.83]</b>	[0.54]
Energy from water	<b>[0.71]</b>	[0.24]	[0.33]	[0.32]	<b>[0.78]</b>	<b>[0.71]</b>

Table 5 Example of a measurement of **the perception of association** of sustainable energy types with Attributes, Advantages and Values in the Netherlands.

When different people, including those in the other European regions, have completed the questionnaire (preferably digitally) by filling in a 1 or a 0, the values can be averaged to display the perception of an association. In the example, the figures displayed in red are the acknowledged perceived associations because of their high value. This information is very valuable for the way organisations can be stimulated internationally and cross-culturally to deal with investments in sustainable energy.

To conclude, we have devised examples to explain the practical use of both methods in combination with our conclusions. This *connects* the methodological character of our project to the future as well as to the European regions. In this way, we hope to help the MORE4NRG project to a new start after September 2011.

**"When a wind of change is blowing,  
some people build shelters.  
Others build wind turbines."**

## 7 References

1. Veleslava Abadzhieva, Euro Perspectives Foundation, Bulgaria
2. Cor Alberts, Corporate Lawyer Prodeon
3. Maartje van den Berg, Senior Associate Clean Tech at the Food & Agribusiness Research and Advisory department at Rabobank
4. Anne Bliet, Member of the Provincial Executive Province of Flevoland
5. Edward Calthrop, Sector Economist for Energy, Transport & Environment at the European Investment Bank (EIB)
6. Egbert Dommerholt, Senior Researcher/Lecturer Sustainable Entrepreneurship, Windesheim University
7. Alex van Doorn, Business Operations Manager East Flevoland Housing Department
8. Henk Douma, Agricultural and Market Gardening Organisation North
9. Frits Iordens, Manager Kubbeweg Wind Farm
10. Bob Pels, General Manager European Territorial Cooperation
11. Hans Rijnten, Policy Employee Climate and Energy, Province of Flevoland
12. Herman Vermeer, Project Adviser Flevoland Development Company BV
13. Hage de Vries, Senior Sustainable Business Developer at Electrabel

## 8 Bibliography

- Abcouwer, A., Maes, R., & Truijens, J. 1997. Contouren van een generiek model voor informatiemanagement. *Tijdschrift Management & Informatie*, 5(3): 92–102.
- Andreasen, A. R., Kotler, P., & Parker, D. 2008. *Strategic marketing for non-profit organizations* (7th ed.). Upper Saddle River, NJ [etc.]: Pearson Prentice Hall.
- Audenaert, A., & Steenkamp, J.-B. E. M. 1996. *Means-end chain theory and laddering in agricultural marketing research*. Leuven: Katholieke Universiteit Leuven, Departement Toegepaste Economische Wetenschappen.
- Baarda, D. B., Goede, M. P. M. d., & Teunissen, J. 2005. *Basisboek kwalitatief onderzoek : handleiding voor het opzetten en uitvoeren van kwalitatief onderzoek* (2e, geheel herz. dr. ed.). Groningen: Stenfert Kroese.
- Boutillier, R. 2009. *Stakeholder politics : social capital, sustainable development, and the corporation*. Stanford, Calif.: Stanford Business Books.
- Bressers, H., & Klok, P. 1988. Fundamentals for a theory of policy instruments. *International Journal of Social Economics*, 15(3-4): 22-41.
- Butter, F. A. G. d. 2007. *Nederland als transactie-economie : regievoering en handel hebben de toekomst*. Haarlem: [Koninklijke Hollandsche Maatschappij der Wetenschappen].
- Crane, A., & Matten, D. 2004. *Business ethics : a European perspective : managing corporate citizenship and sustainability in the age of globalization*. Oxford [etc.]: Oxford University Press.
- de Wit, M. 2003. *Segmentatie: hoe doe je dat?: doelgroepen veranderen*. Kluwer.
- Doelen, F. C. J. v. d. 1989. *Beleidsinstrumenten en energiebesparing : de toepassing en effectiviteit van voorlichting en subsidies gericht op energiebesparing in de industrie van 1977 tot 1987*. Enschede: Universiteit Twente, Faculteit der Bestuurskunde.
- Dommerholt, E. 2009. *Corporate sustainability performance : constructs, measures and investors' responses*. [S.l.: s.n.].
- Fayol, H. 1950. *Administration industrielle et générale : prévoyance, organisation, commandement, coordination, controle*. Paris: Dunod.
- Frambach, R. T., & Leeflang, P. S. H. 2009. *Marketing aan de top : 10 problemen, 10 oorzaken, 10 oplossingen*. [Amsterdam]; Amsterdam: FT Prentice Hall ; Pearson Education.
- Gazendam, H. 1999. Overheidsorganisaties na 2000 Paradoxen en dilemma's van het informatietijdperk.
- Hamel, G., & Prahalad, C. K. 1994. *Competing for the future* (5th print. ed.). Boston, Mass.: Harvard Business School Press.

- Hermans, D., Eelen, P., & Orlemans, J. W. G. 2007. *Inleiding tot de gedragstherapie* (6e, geheel herz. dr. ed.). Houten: Bohn Stafleu van Loghum.
- Hofstede, G., & Hofstede, G. J. 2007. *Allemaal andersdenkenden : omgaan met cultuurverschillen* (23e dr., geheel vernieuwde ed.). Amsterdam [etc.]: Contact.
- Jacobs, D. 2009. *Creatief innovatiebeleid?:* Centraal Boekhuis.
- Kotler, P., & Andreasen, A. R. 1997. *Strategic marketing for nonprofit organizations* (5th [rev.] ed.). Upper Saddle River, N.J., [etc.]: Prentice Hall.
- Myers, N., & Opzeeland, W. v. 1985. *Spectrum atlas van de aarde : draaiboek voor een leefbare wereld* (1e dr. ed.). Utrecht [etc.]: Het Spectrum.
- Naumann, E., & Giel, K. 1995. *Customer satisfaction measurement and management : using the voice of the customer* (4th print. ed.). Milwaukee, Wis.: ASQ Quality Press.
- Pierson, P. 2000. The limits of design: Explaining institutional origins and change. *Governance: An International Journal of Policy and Administration*, 13(4): 475-499.
- Porter, M., & Kramer, M. 2006. Strategy and society. *Harvard Business Review*, 84(12): 78-92.
- Pot, F. 2009. Sociale innovatie als inspiratie. *year: 2009*.
- Rijn, B. e. v. 2008. Projectenboek windenergie.
- Skinner, B. F. 1979. *Behaviorisme*. Deventer: Van Loghum Slaterus.
- Sociaal-Economische Raad. 2000. De winst van waarden advies over maatschappelijk ondernemen, *Publicatie / Sociaal-Economische Raad nr. 00/11*: 144 p. Den Haag: SER, Sociaal-Economische Raad.
- Steenkamp, J.-B. E. M., & Trijp, J. C. M. v. 1994. *Task experience and validity in perceptual mapping : a comparison of traditional compositional mapping and two consumer-adaptive techniques*. Leuven: Katholieke Universiteit Leuven, Departement Toegepaste Economische Wetenschappen.
- Stephan, L., & van Raaij, W. 2004. De Relatie tussen Nieuws, Consumentenvertrouwen en Consumentengedrag.
- Tieleman, T. 1974. *Management informatie en informatiemanagement : enige beschouwingen over theorie en praktijk van management informatiesystemen*. Amsterdam [etc.]: Agon Elsevier.
- Tietenberg, T. H., & Lewis, L. 2010. *Environmental economics and policy* (6th ed.). Boston: Addison-Wesley.
- Vannoppen, J., Verbeke, W., & Van Huylenbroeck, G. 2002. Consumer value structures towards supermarket versus farm shop purchase of apples from integrated production in Belgium. *British Food Journal*, 104(10): 828-844.
- Zandvliet, K., & Blussé, L. 2002. *De Nederlandse ontmoeting met Azië, 1600-1950*. Amsterdam