



Netherlands Enterprise Agency

Natural Capital and Financial Institutions

Transitioning towards a Green Economy



July 2015

Sharon Hesp (NewForesight), Caroline van Leenders (RVO.nl)

Abstract

Nature provides for goods and services that drive our economy. To continuously depend on our natural capital the use of our natural resources needs to be well-managed. By incorporating natural capital in its decision-making, the financial sector can push for inclusion of natural capital in all business operations. As investors in business, the financial sector is in a unique position to become the driving force in moving entire markets towards sustainability. At present the financial sector is starting to include natural capital in its decision-making processes. Although individual environmental issues are being included in risk assessment criteria, there is no umbrella strategy that does justice to nature's interrelatedness. Instead of a rearview mirror approach, such as risk assessment, financial institutions should adopt a forward looking methodology that acknowledges future scenarios in which natural resources become scarce and valuable. At the moment many opportunities exist for business cases that include natural capital. Stimulating the development of these business models with financial policies will contribute to more knowledge and expertise in this area, and can lead to best practices that have the power to structurally change our economy.

Contents

Introduction

Natural capital and the financial sector	3
The mechanism behind an unsustainable system	3

Sustainable market transformation

Going beyond CSR activities	4
The Sustainable Transformation S-curve	4

The financial sector moving forward

Analysis of natural capital in financial sector decision-making	6
Moving to the next phase	7
Competition to push the financial sector up the S-curve	8

References	9
------------	---

Acknowledgements	9
------------------	---

About the authors	10
-------------------	----

About NewForesight and RVO.nl	10
-------------------------------	----



Introduction

Natural capital and the financial sector

People, planet, profit. Three words that have become intrinsically interlinked. No self-respecting company can do without a CSR policy that addresses social and environmental issues related to the company's core business. However, the inclusiveness of social and environmental issues in CSR policies can differ greatly.

The financial sector can have a significant impact on companies' CSR policies when deciding to direct their money to green or grey projects: loans and investments determine whether a company has the capital to stay in business. Every bank has risk assessment criteria and policies that determine which companies to finance. To what degree do these policies take social and environmental sustainability into account when making investment decisions? To assess this we focus on the financial sector and natural capital: the capability of nature to provide goods and services on which humans depend and have influence. For a financial institution, integrating natural capital in its core business translates to investing in companies whose activities safeguard the environment.

To place the transition towards inclusion of natural capital in financial sector decision-making in context we first discuss the mechanisms behind moving towards sustainable markets. For this we take advantage of lessons learned in agriculture. Then we look into the current status of the financial sector regarding natural capital, and define how to accelerate the process of full inclusion in investment criteria and policies.

The mechanism behind an unsustainable system

Our actions have consequences. Depletable resources will run out. Too much greenhouse gases in the atmosphere result in global warming and extreme weather conditions. Regenerative capacity of nature is not endless. These are well-known facts. We feel the sense of urgency, but find it difficult to act with the hands-on mentality needed to change our future outlook.

Why? One of the underlying reasons is that changing behavior for the greater good in the long run does not pay off for the individual stakeholder in the short run. Most markets are designed in such a way that market players are rewarded for seeking short-term benefits. If they do not act upon this incentive somebody else will.

Moreover, the consequences of collective actions are often indirect and apparent further in time. For example, overfishing the oceans will, over time, reduce fish stocks to zero. More fish are caught than the populations can replace through reproduction, which will soon result in putting all fishermen out of business. Yet the individual fisherman has no incentive to extract less from the sea for he will not only reduce his income today, but also suffer the consequences of the industry's overfishing in the long run. He is thus trapped in a market system that does not reward sustainable practices.

The same goes for the financial sector. Since limits of most ecosystem services are not visible in the near future, they do not appear in financial institutions'



For change to occur a crisis or sudden realization is needed that in the near future consequences will become apparent.

risk assessment protocols. For change to occur a crisis or sudden realization is needed that in the near future consequences *will* become apparent.

At present, for example, water is running out in places like California and the effects of global warming are

being felt. These drastic wake-up calls are needed to break the downward spiral and work towards preservation of natural capital by changing the incentives that drive the sector.

Sustainable market transformation

Going beyond CSR activities

Including social and environmental issues in business for many companies still translates to practicing business as usual while attempting to include social

and environmental elements to the company's activities. This can mean anything from funding a project with social and environmental benefits to sourcing only sustainable supplies. The focus though is always on the company and how it can act responsibly within the existing system and not on the market in which it operates. The market remains unsustainable. Changing market conditions so as to favor sustainability in the market is what defines a sustainable market

transformation. For this to occur, all key stakeholders need to work together. A sustainable market transformation goes beyond individual company CSR practices.

For market players with seemingly opposing interests to work together a pressing reason is essential. Examples of stakeholders working together to change the forces that determine the uptake of sustainable practices in the sector can be found in international agriculture. Over 1 billion people work in agriculture,

making it the second largest source of employment worldwide. Yet, many farmers live in poverty. On top of this, the numerous agricultural practices that bring food to our tables every day deplete and pollute valuable soil, use 70% of all the fresh water in the world, diminish biodiversity and accelerate climate change.

The impact of agriculture and the urgency for a sustainable market transformation in this sector led to collective actions in several agri-sectors. For example in the cocoa industry, eleven of the largest cocoa and chocolate companies joined forces and committed to a joint strategy to transform the sector unsustainable practices drove ADM, Barry Callebaut, Blommer, Cargill, ECOM, Ferrero, The Hershey Company, Mars Incorporated, Mondelēz International, Nestlé and Olam to agree upon interventions on a farm and community level focused on improving productivity and empowering women and children. Their strategy, CocoaAction, was introduced by the convener World Cocoa Foundation at the World Cocoa Conference in Amsterdam at the end of June 2014 and further elaborated on at Chocovision in Geneva shortly after.

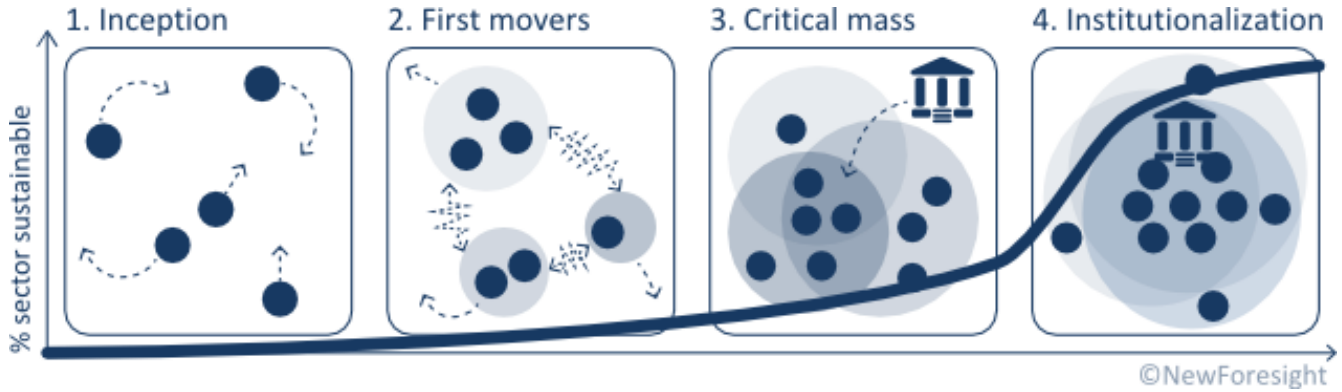
The Sustainable Transformation

S-curve

By studying sustainable market transformations such as the one in agricultural commodities, patterns and phases of change can be identified. Those insights can help identify tipping points, and initiate, accelerate and drive systemic change. In general, a market's transition towards sustainability follows the



Changing market conditions so as to favor sustainability in the market is what defines a sustainable market transformation.



sustainable transformation curve (S-curve) as depicted in figure 1.

The adoption of sustainable practices increases as the sector advances along the S-curve, which signifies that sustainability progressively matures and enters the mainstream. In the first phase, the inception phase, there is no comprehensive approach to sustainability within the market. Unsustainable practices are considered normal. Market demand for sustainable products remains niche. Frontrunners are small and value driven. There is little regulation and no generic tools, instruments or standards. A crisis or event changes this status quo and inspires calls for change. NGOs and other stakeholders start projects pushing for sustainability in isolation.

Then, in the second phase, the first movers phase, market demand leads to the emergence of more organized and visible sustainability initiatives. Frontrunners are growing and mainstream players experiment with green products and services. Broader interventions involving multiple stakeholders are created. Competition between initiatives leads to innovation in business models, new players on the market, the start of international standards and first examples of regulations. Inefficiencies, lack of a clear and convincing business case and duplication of efforts are also an outcome of this phase. Problems remain, but sustainability has become a part of the strategic agenda.

Inclusive and structural change takes place in the third phase, the critical mass phase. Stakeholders work together to tackle obstacles that inhibit

sustainability. CEO's and other influential stakeholders express moral leadership. Governments institutionalize the agenda and expand the drivers of change. Standardization of methods, tools and instruments take a flight. A rapid growth of a new infrastructure is visible. In the fourth and final phase, institutionalization, the sector has effectively put an end to practices that are environmentally damaging or socially undesirable. In this phase sustainability becomes mainstream and institutionalized.

In each of these phases tipping points can be identified that shift a transition into the next phase. The first phase starts when a crisis happens and it becomes clear that action is required. Small and symbolic projects are the response, but when many of those fragmented projects exist people realize that time and money are being spent on window dressing.

The second phase is characterized by more focused projects that aim for impact. Companies realize that responsibility goes beyond immediate self-interest and sustainability is seen as an opportunity to score points in the public domain, enhance reputation and increase brand value. Yet, since the root causes are not addressed the problem

In each of these phases tipping points can be identified that shift a transition into the next phase.

continues to grow and become more pressing. Companies are starting to get seriously worried, which opens the floor to a new approach, and to phase three. In this phase companies that otherwise are competing, need to learn to trust each other, share information and agree on high-level collaborative strategies. This includes working

together with national governments to align strategy and efforts. If this phase is managed successfully, the entire sector is on the verge of a tipping point with a level playing as the end result.

The financial sector moving forward

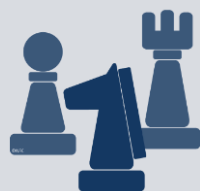
Analysis of natural capital in financial sector decision-making

This theoretical model provides a helpful framework to analyze the transformation of the financial sector and the inclusion of natural capital in its decision-making.

So far the financial sector has been a laggard in moving towards sustainable business practices. Although niche players like the Triodos Bank, ASN Bank and a few impact funds go back as far as the 1960s, sustainability came to the attention of the most financial sector's players in the '90s. Mainstream banks opened green investing opportunities for value driven clients. At the time, green projects and products with small-scale environmental impacts were funded. These projects were not directly linked to the rest of the financial sector activities, but were rather stand-alone initiatives with high marketing value.

In the 2000's a broader view was adopted and the environment was recognized as potentially valuable in the market place. Economic benefits and business opportunities regarding green energy, biological farming and energy efficient real estate were

identified, which led to integrating natural capital themes in financial sector decision-making. Conscience consumers started to hold banks accountable for their environmental policies and the first rankings appeared that scored banks and insurance companies on topics such as climate and nature. Mainstream banks and other financial institutes underwrote UN's Global Compact as well as standards by IFC.



The strategy in this first phase is mainly focused on exclusion combined with niche practices of "green" impact investing.

Companies are demonstrating that they are putting efforts to reduce their undesirable impacts on the environment. Certain practices are disqualifiers to getting funding, for example a palm oil company that burns down the Indonesian rain forest to plant oil palms. But companies are still allowed to have a negative impact on the environment. ESG-KPIs and tools are mainly used for risk assessments, to calculate how sustainable a business case is in the long run.

Still, having less negative environmental impact cannot be compared to having a positive impact on the environment. The "doing good" strategy means a financial institution invests in companies that contribute to a resilient and thriving ecosystems. These companies can safeguard future ecosystem services, but are also founded on a new type of business model that does not necessarily fit in

our economic system today. At present the value of natural capital isn't monetized as to have it included in current economic business models. The return on investment is unclear. The strategy in this first phase is mainly focused on exclusion combined with niche practices of "green" impact investing.

Increasingly it is becoming clear that exhaustion of natural capital and not taking account of the limits of our ecosystems has major consequences for the economy: unhealthy employees; scarcer resources from mining to forests; increased hazard risks with extreme weather conditions and diminishing natural coastal protection to name a few. The financial sector has taken some important steps to include various specific sustainability issues in investment decision making. This opens the door for a more comprehensive approach to sustainability. Companies are putting natural capital on their agenda and momentum is growing in the financial sector to integrate all natural capital themes in their decision-making processes.

Moving to the next phase

As a result of the financial crisis, a loss of trust, combined with growing societal pressure and the rise of attention to natural capital themes such as climate change, the sector is entering the second phase, the phase of first movers. Financial institutions are starting to require more information from their clients. Transparency and performance on environmental, social and governance (ESG) issues are more and more important for proper risk assessments. ESG-KPIs and tools have been developed for companies to report on and outcomes are being included in financial sector decision-making. Also, the infrastructure grew with the Dow Jones Sustainability and MSCI index.

New financial players are entering the spotlight such as pension funds and crowdfunders, and new instruments like Green Bonds are popping up. International standards are becoming tailor made for specific financial target groups like the UN-PSI, UN-PRI, and the Natural Capital Declaration, a financial sector initiative to integrate natural capital

considerations into financial sector decision-making, was launched in 2012 at Rio+20.

To create the momentum to move the sector as a whole more initiatives are needed that convene multiple stakeholders, develop best practices and help eliminate institutional barriers that inhibit structural change. Competition drives new and better practices, groups and business ideas are required that represent winning strategies to include natural capital in financial sector decision-making.

Financial institutes can develop competitive business ideas that are aligned with their mission and role. FMO for example is looking into access to finance for natural capital initiatives, making use of its extensive experience in emerging markets. Banks, pension funds and insurance companies; different types of financial institutions have started to develop different products or services related to natural capital. VBDO is currently developing a benchmark guide for the financial sector including best practices for natural capital. ASN Bank developed with Ecofys an open source method to include

carbon footprint in its decision-making. The bank has stopped investing in fossil fuels completely and has set the goal for 2030 to be completely climate neutral in its investments. It is now working on an impact strategy for biodiversity. Health insurance company, De Friesland Zorgverzekeraar is considering investing in nature since a study showed that being in nature diminishes health problems. Achmea, is looking into financing so called "green rooftops". These rooftops



can regulate water drainage during excessive rains that can cause flooding for which insurance company Achmea would have to pay.

Competition to push the financial sector up the S-curve

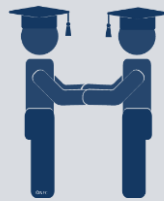
More structural projects to include natural capital in financial sector decision-making are emerging as the call to natural capital action is becoming louder. The Guardian is the first large newspaper to start campaigning against climate change under the title 'keep it in the ground' and 43 CEO's of big brands call for a price on carbon. Besides climate change, water is becoming a pressing natural capital theme. The World Resource Institute developed an instrument that maps the state of water systems all over the world: Aqueduct is part of the Bloomberg database and used more and more by investors. Having said that, natural capital themes 'biodiversity' and 'ecosystem restoration' are still in the phase of inception.

For the second phase to really kick in a new way of thinking is required. The prevailing method to include natural capital themes in decision-making is still through risk assessments. These often look at the past, while we know that in today's world the past does not reflect the future. Resources are actually becoming scarce and in many sectors, such as cocoa industry, the limits of our ecosystem are becoming clear. Technology is developing exponentially and a new dawn is rising. When we stop looking at the past and start looking forward opportunities open up. Tools are available to think differently. Financial

institutions can learn from their front running clients and leap-frog forward. What is needed is (moral) leadership: who will show him/her-self as the Paul Polman of the financial sector?

Competition followed by learning can provide the necessary insights to move to the third phase of market transformation in which collaboration for structural and systemic change can lead to mainstreaming natural capital themes in financial sector decision-making. Tangible projects

with a sound business case can push the sector up the S-curve and bring the tipping point to a truly sustainable sector closer on the horizon.



Competition followed by learning can provide the necessary insights to move to the third phase of market transformation.

References

L. Simons (2015), “Changing the Food Game”, *Greenleaf Publishing Limited*

“CoP FiNC”, <http://www.rvo.nl/onderwerpen/duurzaam-ondernemen/groene-economie/community-practice-financial-institutes-and-natural-capital>

“State of Green Business: Companies take stock of natural capital”, Joel Makower, Greenbiz.com February 18, 2013, <http://www.greenbiz.com/blog/2013/02/18/state-green-business-companies-take-stock-natural-capital>

“Natural Capital Platform”, <http://naturalcapitalforum.com/about/>

Duiker, Wagemans & Fijt (2014), “VBDO: Benchmark Responsible Investment by Pension Funds in The Netherlands 2014”, VBDO, <http://www.goed-geld.nl/assets/Uploads/Benchmark-Responsible-Investment-by-Pension-Funds-2013.pdf>

Mulder, I. (2007) “Biodiversity, the Next Challenge for Financial Institutions?” Gland, Switzerland: IUCN. xiv + 60pp.

Jonkers, Lambooy & Hordijk (2010), “Identification and development of opportunities for biodiversity information services by sustainability rating agencies”; Nyenrode Cfs, IUCN-NL, FFI, VROM

Acknowledgements

Special thanks goes out to Richard Kooloos – Head Sustainable Banking (ABN AMRO), Irene de Jong – Advisor Sustainable Policy & Research (ASN Bank) and Eef Spronk- Manager Corporate Social Responsibility (Zwitserleven) for their input and second opinion.

This article is the results of an assignment given to strategic consultancy NewForesight by the Netherlands Enterprise Agency (RVO.nl). To increase the momentum and accelerate the transition towards inclusion of natural capital in financial sector decision-making, a Community of Practice (CoP) has been formed in The Netherlands in 2014. Important financial sector stakeholders grouped and founded the CoP Financial Institutes & Natural Capital (CoP FiNC) as a means to increase knowledge on natural capital and facilitate inclusion of natural capital in decision-making. Participants share their best greening practices by exchanging information and experience in private and online meetings. Participating companies include ABN AMRO, Achmea, ACTIAM, ASN Bank, FMO Bank, De Friesland Zorgverzekeraar, ING, J. Safra Sarasin, MN, NPM-Capital, Rabobank, SPF Beheer, StartGreen Capital, Toniic and Triodos. The Ministry of Economic Affairs (EZ) supports the CoP by providing professional process facilitators from the Netherlands Enterprise Agency (RVO.nl).

About the authors



Sharon Hesp, sharon.hesp@newforesight.com

Sharon has over 10 years of experience with sustainable development projects in an international setting. Her focus is on incentivizing sustainable economic development by stimulating and facilitating frontrunners. In the Netherlands she did so at NCDO, stimulating conscious consumption and fair trade. In Latin America Sharon strengthened social enterprises in Chile and Brazil. As a consultant at NewForesight Sharon has worked on several sustainable market transformations in agriculture, such as cocoa and cotton.



Caroline van Leenders, caroline.vanleenders@rvo.nl

Caroline van Leenders has been working on transitions towards a sustainable future for over 20 years. After a PhD in environmental science she has stimulated change from a government perspective (Dutch Enterprise Agency) in sectors such as sustainable energy, food and biodiversity. Her experience led to a book titled "10 tips for clever change". She is specialized in facilitating Communities of Practice and at present facilitating one in the financial sector on natural capital.

About NewForesight



NewForesight is a strategic consultancy firm based in the Netherlands that drives sustainable market transformations. We do so by facilitating innovative intervention strategies, uniting stakeholders around a transformative vision for their sector and assisting key stakeholders in implementing their strategies. NewForesight is a thought leader in complex systems thinking and system transformation. To learn more, please visit: www.newforesight.com.

About RVO.nl



Netherlands Enterprise Agency

Netherlands Enterprise Agency encourages entrepreneurs in sustainable, agrarian, innovative and international business. It helps with grants, finding business partners, know-how and compliance with laws and regulations. The aim is to improve opportunities for entrepreneurs and strengthen their position. The Agency works at the

instigation of ministries and the European Union. Netherlands Enterprise Agency is part of the Ministry of Economic Affairs. To learn more, please visit: www.rvo.nl.