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"Financial Markets, Institutions and Policies in the context of Sustainable Development"

Dimensions, Issues and Actors of an Emerging Arena

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8th ESDN Workshop – Background and Discussion Paper

European Sustainable Development Network

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The **European Sustainabel Development Network** (ESDN) is an informal network of public administrators and other experts who deal with sustainable development strategies and policies. The network covers all 27 EU Member States, plus other European countries. The ESDN is active in promoting sustainable development and facilitating the exchange of good practices in Europe and gives advice to policy-makers at the European and national level.

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Introduction

The current situation and challenges

Currently, the global debate about financial reforms is very much ongoing. Recent developments, like the Euro crisis, the financial and economic crisis, dramatic cuts in public budgets etc., seem to suggest that the current set up of financial markets is not adequate any more in economic, social and political terms, neither in a short- nor in a long-term perspective, e.g. the financial system increasingly dominates other parts of the economy; the financial crisis of 2007-08 led to a dramatic reduction in the credit available for individuals, businesses and governments; the subsequent reduction in consumer spending, government expenditure and business investment has had a major impact on economic growth and employment[1]; pressure is mounting by the countries' anxiousness of being downgraded on their credit-worthiness by global rating agencies; this also led to intensive discussions in which policy areas to cut budgets; and these developments, in general, put pressure on sustainable development policy and sustainable investment, production and consumption activities. At the same time, it becomes increasingly obvious that the sustainable development of the economy and society is a crucial and fast growing field for adequate financing, functional financial instruments and markets, and a substantial and crucial area for sustainable finance and finance market policy. For instance, the variety of challenges and incentives for companies, consumer households and public authorities to internalize negative externalities has become a central issue to integrate SD considerations into investment and management decisions[2].

The objectives of the workshop

The workshop intends to scope the mechanisms and operational design of financial markets, explore the functional and dysfunctional aspects from an SD perspective and, on this basis, develop concrete fields of action for SD policy related to financing, financial markets and finance governance. The outcomes of the workshop should provide an orientation for SD policy-makers in the debate around the financial markets and future policy options in their administrations. In addition, it should bring together actors from different fields to discuss and learn from their respective experiences to develop suggestions how the financial markets could better serve SD objectives. The workshop will focus on questions such as: What are the conceptual frames, the framework conditions, mechanisms and recent developments of financial markets? What exact impacts does the current financial market system have on SD policy and practice? How can financial market reforms and additional instruments and institutions be designed in order to enhance SD? How are sustainable investing practices affected by other events and upheavals in financial markets, such as the financial crisis or the current Euro crisis? To what extent do (or should) investors reflect on SD objectives in their investment decisions?

The discussion paper's structure

The discussion paper is divided in three chapters. After this introductory chapter, the first chapter offers an overview of the financial sector, what it provides for the economy and

[1] Hewett, C. (2012) "The Role of Household Savings and Debt in a Sustainable Economy", Background paper, RESPONDER multinational knowledge brokerage event on household finance & sustainable economy, London, 24-25 May 2012, http://www.scp-responder.eu/pdf/events/2012_london/RESPONDER_Background%20Paper%20on%20finance%20-%20final.pdf.

[2] UNEP Finance Initiative (2007) Demystifying Responsible Investment Performance, Geneva, UNEP FI, http://www.unepfi.org/fileadmin/documents/Demystifying_Responsible_Investment_Performance_01.pdf.

how this plays out in practice. Therefore, the logic and concepts of financial markets, different financial institutions and the main actors of the financial sector are outlined, together with the links to the real economy. In the second chapter, we discuss various sustainable development principles and what they imply for policy-making in general and relations with the financial market in particular. Finally, the third chapter analyses the main differences between the financial markets and sustainable development, presents various interventions on the financial sector that could help reducing the distances between the two arenas, and will introduce the theme of financing sustainable development.

1. The financial sector and the 'real' economy

Key messages:

- An efficient financial sector is essential to a well-functioning economy: it allocates capital and manages risks in an efficient way.
- The logic of the financial sector is one-dimensional and mainly related to the maximization of financial profits and, especially, to the return on investment.
- The financial sector is formed by the different financial markets and the various financial institutions.
- Financial markets are markets in which financial assets (securities) can be purchased or sold; they facilitate the flow of funds and, thereby, allow financing and investing. Five financial markets can be distinguished: commodity market, money market, capital market, currency market, and derivatives market.
- Financial institutions provide financial services for their clients and can be differentiated into depository and non-depository institutions.
- To understand the links with the 'real' economy, important issues are to understand how capital is allocated or invested, what reasons determine the decisions over an investment, and which investments are preferred.

1.1. The financial sector and its logic

Financial sector: allocate capital, manages risks, efficiently.

An efficient financial sector is essential to a well-functioning economy. Therefore, it should serve improving the efficiency of the economy as well as increasing its productivity. In other words, it should be a means to the real economy. The financial sector (or system) has, in general, a very straightforward set of tasks: Firstly, it has to **allocate capital**, i.e. making sure that capital goes to areas where its return is highest. Secondly, it should **manage risks** in a way that, using the ability of absorbing risk, it allows capital to go where higher return on investments can be made. Thirdly, it is also supposed to **perform these tasks efficiently**, therefore, at a relatively low cost (Stiglitz, 2010)[3].

The logic

The logic behind the financial sector is one-dimensional and mainly related to the **maximization of financial profits** and, especially, to the **return on investment**. Understood as the net profit over the investment made, the return on investment is the main concern for financial markets. This is also related to a very short time frame where the **pursuit of short-term profits** – or of the immediate gain as close as possible to the present time – is also a crucial feature of the financial sector logic. A distinctive characteristic of financial markets represents the ability to help managing risks and **dealing with uncertainty**. To give an example: thanks to financial markets, businesses make use of the so-called hedging practice, which represents a risk management strategy used in limiting or offsetting probability of loss from fluctuations in the prices of commodities, currencies, or securities[4]. This example shows an extremely important

[3] Joseph Stiglitz's final keynote lecture at the Sustainable Business Series, Edinburgh International Book Festival. (see also: http://www.youtube.com/watch?v=_SfjQl7L-74).

[4] http://www.businessdictionary.com/definition/hedging.html

service that financial markets provides to the real economy, namely managing risks, avoiding high losses, and allowing smoother operations. Conversely, it is also true that, since higher risks leads to higher profits, so if someone is not averse to risk, they will accept the possibility to lose your investment for a larger return. But, this leads also to the possibility that in the financial sector, individuals might be tempted lose their ability to assess risks by large profits that can be made.

Another important aspect of the logic of the financial sector is linked to the risk feature we described above and concerns the evidently inappropriate remuneration structures of some financial institutions. These so-called "**bonuses**" have been a contributory factor of **excessive and imprudent risk-taking** in the financial sector, and, as outlined in the EU's Directive 2010/76/EU on capital requirements for the trading book and for re-securitisations, and the supervisory review of remuneration policies, this partially led to the failure of individual financial institutions and then to systemic problems. It is argued in this Directive that remuneration policies that give incentives to take risks can undermine sound and effective risk management and exacerbate excessive risk-taking behaviour. For instance, as pointed out by Sheng (2011) "[s]ince wages and bonuses make up between 30 to 70 per cent of financial sector costs, there are tremendous incentives to generate short-term profits at higher risk".

The financial sector is also highly technical and employs well-prepared and well-paid specialists that work constantly in an extremely competitive environment. Global opportunities, speed and the need of information are also important features of the sector. Another important feature of the financial sector, that cannot be neglected regards the role of debt creation, is the assumption of constant and continuous growth of the economy.

1.2. The financial sector: financial markets, institutions and key actors

Financial markets

The financial sector is formed mainly by financial markets and financial institutions. A financial market is a market in which financial assets (securities) such as stocks and bonds can be purchased or sold. Funds are transferred in financial markets when one party purchases financial assets previously held by another party. **Financial markets facilitate the flow of funds** and thereby **allow financing and investing** by households, firms, and government agencies (Madura, 2011)[5]. In other words, financial markets are crucial in promoting greater economic efficiency by channeling funds from people who do not have a productive use for them to those who do. Indeed, well-functioning financial markets are a key factor in producing high economic growth.[6]

Households and businesses that supply funds to financial markets earn a **return on their investment**; the return is necessary to ensure that funds are supplied to the financial markets. If funds were not supplied, the financial markets would not be able to transfer funds to those who need them. Those participants who receive more money than they spend are referred to as **investors** (or surplus units). Those participants who spend more

[5] Madura J. (2011): Financial Institutions and Markets, 9th intl. ed., South Western Cengage Learning.
[6] Mishkin F. S., Eakins S. G. (2012): Financial Markets and Institutions; 7th ed., Boston: Pearson-Prentice Hall.

money than they receive are referred to as **borrowers** (or deficit units).

Securities represent a claim on the issuer's future income or assets

Many borrowers, such as firms and government agencies, access funds from financial markets by issuing securities. Also called financial instruments, **securities represent a claim on the issuer's future income or assets** (any financial claim or piece of property that is subject to ownership). Issuing securities enables corporations and government agencies to obtain money from surplus units and thus to spend more money than they receive from normal operations.

Different financial markets

In the financial sector, there are **different financial markets** that are "created to satisfy particular preferences of market participants" (Madura, 2011). Financial markets can be classified in different ways and, therefore, their number can vary. We distinguish between **five financial markets**, as these five seem widely acknowledged in the literature: (1) commodity market, (2) money market, (3) capital market, (4) currency market, and (5) derivative market.

(1) Commodity market

A commodity is defined by the New Oxford American Dictionary as a raw material or primary agricultural product that can be bought and sold (i.e. copper or coffee). Therefore, commodity markets are **markets where raw or primary products are exchanged**. These raw commodities are traded on regulated commodities exchanges, in which they are bought and sold in standardized contracts.

(2) Money market[7]

Money market securities are **short-term instruments with an original maturity of less than one year**. These are financial instruments with high liquidity and very short maturities. Money market securities are used to "warehouse" funds until needed. The returns earned on these investments are low due to their low risk and high liquidity.

(3) Capital market

The capital markets exist to **provide financing for long-term capital assets**. Households, often through investments in pension and mutual funds, are net investors in the capital markets. Corporations and the federal and state governments are net users of these funds. The three main capital market instruments are **bonds**, **stocks**, and **mortgages**.

However, when referring to money market securities or capital market securities, it is important to distinguish between the notions of **primary** and **secondary markets**, essentially because the transactions in the primary market and the transactions in the secondary market are fundamentally different. **Primary markets** facilitate the issuance of new securities and provide funds to the initial issuer of securities (for instance the issuance of new corporate stock or new Treasury securities is a primary market transaction). **Secondary markets** facilitate the trading of existing securities, which allows for a change in the ownership of the securities; hence, these are financial markets in which securities that have been previously issued can be resold (for instance, the sale of existing corporate stock or Treasury security holdings by one investor to another is a secondary market transaction).

(4) Currency

For funds to be transferred from one country to another, they have to be converted from

[7] Mishkin F. S., Eakins S. G. (2012): Financial Markets and Institutions; 7th ed., Boston: Pearson-Prentice Hall.

market

the currency in the country of origin into the currency of the country they are going to. The currency market or foreign exchange market is **the financial market where exchange rates are determined**. The foreign-exchange markets underpin all other financial markets. They directly influence each country's foreign-trade patterns, determine the flow of international investment and affect domestic interest and inflation rates. They operate in every corner of the world, in every single currency. Collectively, they form the largest financial market by far.[8]

(5) Derivatives market

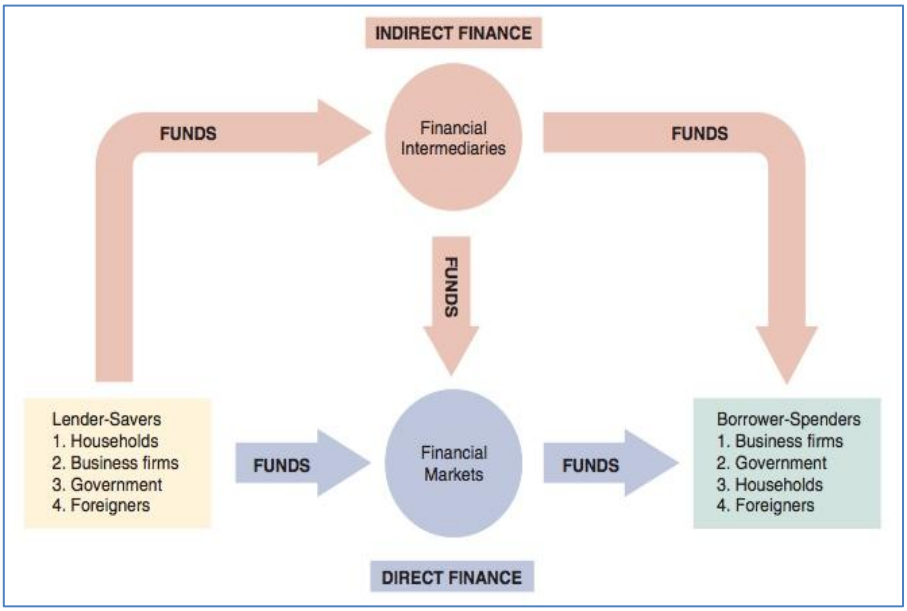
A market for derivatives is also in place and is very important. Derivative securities are **financial contracts whose values are derived from the values of underlying assets** (such as debt securities or equity securities) and are extremely useful risk-reduction tools. Financial derivatives are so effective in reducing risk because they enable financial institutions to **hedge**, which means *to engage in a financial transaction that reduces or eliminates risk*. The most important financial derivatives that are used to reduce risk are forward contracts, financial futures, options, and swaps.

Direct finance and indirect finance

The flows in the financial system are shown in Figure 1 below. Those who have saved and are lending funds (**lender-savers**), are at the left, and those who must borrow funds to finance their spending (**borrower-spenders**), are at the right. Usually, the main lender-savers are households. On the other hand, the most important borrower-spenders are businesses and the government. The arrows show that funds flow from lender-savers to borrower-spenders via two routes. In what is called direct finance, borrowers borrow funds directly from lenders in financial markets by selling them securities (also called financial instruments), which are claims on the borrower's future income or assets. However, funds also can move from lenders to borrowers by a second route, so-called indirect finance[9], which involves a financial intermediary that stands between the lender-savers and the borrower-spenders and helps transfer funds from one to the other. A financial intermediary does this by borrowing funds from the lender-savers and then using these funds to make loans to borrower-spenders. The process of indirect finance using financial intermediaries, called financial intermediation, is the primary route for moving funds from lenders to borrowers.

[8] Levinson, M.2005. Guide to Financial Markets. 5th ed.
[9] Mishkin F. S., Eakins S. G. (2012): Financial Markets and Institutions; 7th ed., Boston: Pearson-Prentice Hall.

Figure 1: "Flows of Funds Through the Financial System"



Source: Mishkin and Eakins (2012)

Financial intermediaries and institutions

Although the media focus much of their attention on securities markets, particularly the stock market, **financial intermediaries** are a far more important source of financing for corporations than securities markets are. Financial intermediaries play an important role in the economy because they provide liquidity services, promote risk sharing, and solve information problems, thereby allowing small savers and borrowers to benefit from the existence of financial markets. Additionally, financial intermediaries play a key role in improving economic efficiency because they help financial markets channel funds from lender-savers to people with productive investment opportunities. Without a well-functioning set of financial intermediaries, it is usually argued that it would be very hard for an economy to reach its full potential. Also in this case, many distinctions can be made. Therefore, the more encompassing notion of **financial institution** is helpful because it allows being more inclusive and containing the financial intermediaries as well. Financial institutions, institutions that provide financial services for its clients or members, can be divided into: (1) **Depository institutions** (e.g. commercial banks, savings institutions, credit unions) that obtain funds mainly through deposits from the public; and, (2) **Non-depository institutions** (e.g. finance companies, mutual funds, securities firms, insurance companies, pension funds) that finance their investment activities from the sale of securities or insurances.

Actors on the financial markets

There is a range of actors that play a crucial role in the financial sector. Although our viewpoint is more directed towards the European Union, some international actors will be also outlined to signify the strong global inter-linkages that characterize the financial sector.

The ECB has to maintain price stability

The **European Central Bank (ECB)** is the main bank for Europe's single currency, the Euro. The ECB was established as the core of the Euro system and the European System of Central Banks (ESCB) with the primary objective of maintaining price stability through influencing money market conditions and steering short-term interest rates. In other

words, the ECB controls both the supply of money (i.e. quantity of money) and its price (i.e. the interest rate).

ESCB, Eurosystem

Together with the European Central Bank, two systems are in place in the European Union: 1) the **European System of Central Banks** (**ESCB)** comprises the ECB and the national central banks (NCBs) of all EU Member States whether they have adopted the euro or not; and, 2) the **Eurosystem** is also in place, and comprises the ECB and the NCBs of those countries that have adopted the euro. The **EU national central banks (EU NCBs)** are also part of this system. They are owned by their respective states but are independent by their constitutions.

ESM

Recently entered into force in September 2012, the **European Stability Mechanisms** (ESM)[10] has been defined as the "cornerstone of the European firewall and an integral part of the strategy to ensure financial stability in the euro area". The ESM is an inter-governmental institution, based in Luxembourg, set up to provide financial assistance to Eurozone Member States experiencing, or being threatened by, severe financing problems, if this is indispensable for safeguarding financial stability in the Euro area as a whole.

IMF

Another important actor is the **International Monetary Fund** (IMF) with its near-global membership of 188 countries. The IMF supports its membership by providing: (i) policy advice to governments and central banks; (ii) research, statistics, forecasts, and analysis; (iii) loans to help countries overcome economic difficulties; (iv) concessional loans to help fight poverty in developing countries; and (v) technical assistance and training to help countries improve the management of their economies.

Rating Agencies and the 'Big Three'

Since 1975, starting in the USA, a few laws and regulations (i.e. Gramm–Leach–Bliley Act of 1999; Sarbanes–Oxley Act of 2002; Credit Rating Agency Reform Act of 2006) gave rating agencies a very important role in the financial sector[11]. A **credit rating agency** (CRA) is a company that is in the business of rating the credit worthiness of debt. It does so by rating issuers of debt obligations and also by rating the debt instruments themselves. Credit ratings are meant to provide easy-to-use measurements of relative credit risk so that investors can make informed choices. The idea is to facilitate transactions and lower costs for both borrowers and lenders. As a matter of fact, the above mentioned laws 'forced' public authorities to ask for the rating of at least one of the so-called 'Big Three' credit rating agencies: Standard & Poor's, Moody's Investor Service, and Fitch Ratings. Moody's (40%) and S&P (40%) control 80% of the market. Third-ranked is Fitch Ratings that has about a 14% market share[12]. The remaining 6% of the market is shared approximately by one hundred smaller agencies.

US Federal Reserve

In this array of actors, **national banks of major and powerful countries** also have an important part in the financial sector, like for instance the US Federal Reserve. The **US Federal Reserve System** (also known as the Federal Reserve, and informally as the **Fed**) is the central banking system of the United States. The Congress established three key objectives of its monetary policy: (1) maximum employment, (2) stable prices, and (3) moderate long-term interest rates.

[10] see also: http://www.consilium.europa.eu/uedocs/cms_data/docs/pressdata/en/ecofin/132734.pdf
[11] See also: Wall Street Journal, 2009 at: http://online.wsj.com/article/SB123976320479019717.html
[12] http://www.fairobserver.com/360theme/credit-rating-agencies

The World Bank

Also a key international actor is the **World Bank Group** that, conceived in 1944 to reconstruct war-torn Europe, has evolved into one of the world's largest sources of development assistance, with the mission of fighting poverty by helping people help themselves. The World Bank Group is formed by five institutions, but only two form the World Bank[13]: (i) the International Bank for Reconstruction and Development (IBRD), which lends to governments of middle-income and creditworthy low-income countries; and, (ii) the International Development Association (IDA), which provides interest-free loans (also called credits) and grants to governments of the poorest countries.

G-SIFIs

In terms of crucial actors in the financial sector, a last mention goes to the so-called **Global Systematically Important Financial Institutions (G-SIFIs)**[14], which are financial institutions whose distress or disorderly failure (because of their size, complexity and systemic interconnectedness) would cause significant disruption to the world's wider financial system and economic activity. At the moment, 29 financial institutions are the G-SIFIs: four are Asian (3 JP and 1 CHN), eight from USA, four from France, four from the UK, two from Germany, two from Switzerland, and one respectively from Belgium, Italy, Netherlands, Spain, Sweden. To give an idea of their magnitude, power and relevance, we provide just one example: **Deutsche Bank** has **assets** of more than **$2,844 billion** (Forbes, 2012)[15], which is a little higher than the sum of the national GDPs of Spain, Portugal, Poland, Austria and Hungary together, countries with a population of around 115 million people. Also, for instance, the European Union has a population of 495 million inhabitants and a total GDP ranging between $16 and 17 trillion. This value is very similar to the sum of the assets of just the first seven 'big banks': Deutsche Bank, HSBC, BNP Paribas, Mitsubishi UFJ FG, Barclays, Royal Bank of Scotland, and JP Morgan Chase[16].

1.3. Links to the real economy

In 2011, Peetz and Genreith concluded their study by arguing that there is a close and mutual relationship between the financial sector and real economy: capital can trigger economic growth. However, they then argue, "financial wealth cannot sustain itself indefinitely without an adequate 'real economy' foundation". As already noted, Stiglitz clearly explains that an efficient financial sector is essential to a well-functioning economy but should serve to improve the efficiency of the economy and to increase its productivity: it should be a means to the economy and not an end in itself (2010).

Additionally, the Fung Institute[17] asked an interesting question: can finance be a perpetual profit machine that makes more money than the real sector? As explained in their article, Sheng (2011), president of the Fung Institute, noted that "in the past 30 years, with growth in technology and financial innovation, finance morphed from being a service agent to a self-serving principal that is larger than the real sector itself". He continues pointing out that "[t]he total size of financial assets has grown dramatically from 108 per cent of global GDP in 1980 to over 400 per cent by 2009 [and if also] the notional value of all derivative contracts were included, **finance would be roughly 16 times the size of the global real sector, as measured by GDP**". This trend has been called

[13] The International Bank for Reconstruction and Development / The World Bank. 2011. A guide to The World Bank. 3rd ed.
[14] See also: http://www.financialstabilityboard.org/publications/r_111104bb.pdf
[15] See also: http://finapps.forbes.com/finapps/jsp/finance/compinfo/CIAtAGlance.jsp?tkr=DB
[16] See also: http://www.forbes.com/global2000/list/#p_1_s_d5_All%20industries_All%20countries_All%20states_
[17] see also: http://www.fungglobalinstitute.org/publications/articles/putting-finance-to-work-for-the-real-economy-the-next-reform-16.html

'Financialisation' and it refers to "the increasing importance of financial markets, financial motives, financial institutions, and financial elites in the operations of the economy and its governing institutions, both at the national and international levels" (Palley, 2007; Epstein, 2001)[18][19].

It seems clear, therefore, that to really assess the financial sector, we need to consider what relations it has with the real economy. The most important aspect one needs to understand is how the financial sector allocates capital in the real economy. In September 2011, a report by 'Forum for the Future', funded by Aviva Investors, ourlined this concern: "Investment is about the future. How the future turns out determines the returns on investments and the volatility of these returns. But, in turn, the pattern of investments (where capital is allocated) itself helps to determine the type of future we get."

In order to understand how capital is allocated or invested, we need to consider essentially what reasons determine the decisions over an investment, and therefore, which investments are preferred. The word **investment** can have different facets, but interestingly two of these can give us the idea of how the financial sector perspective is actually very different from the real economy where governments, cities, households, people are embedded. On the one hand, an investment can be understood as the **action or process of investing money for profit** or material result. A second meaning sees an investment as something that is **worth buying because it may be profitable or useful in the future**. It seems that the first definition perfectly addresses the financial sector perspective where a financial gain is pursued: in fact, in finance, an investment is a monetary asset purchased with the idea that the asset will provide income in the future or appreciate and be sold at a higher price[20]. On the other hand, the second side of the definition addresses what usually is meant in the real economy where money is used 'to do something', i.e. a city decides to invest building a road. In other words, the investment here refers to the production and consumption in the real economy.

[18] Palley, Thomas I., Financialization: What it is and Why it Matters. Levy Economics Institute Working Paper No. 525.

[19] Epstein, G. 2001. "Financialization, Rentier Interests, and Central Bank Policy," manuscript, Department of Economics, University of Massachusetts, Amherst, MA, December.

[20] http://www.investopedia.com/terms/i/investment.asp#ixzz2BjEkWhFL

2. Sustainable development principles

Key messages:

- Sustainable development is development that "meets the needs of the present without compromising the ability of future generations to meet their own needs"(WCED 1987).
- Sustainable development consists of six principles that need to be taken into account when discussing the link to the financial market: 1) Balancing different policy dimensions; 2) Long timeframes and intergenerational equity; 3) Ecosystems limits and planetary boundaries; 4) Equal opportunities and access; 5) Inclusion and participation; 6) Governance for sustainable development

Sustainable development

Sustainable development has become a widely known and applied concept. The most commonly used definition goes back to the Brundtland Commission of 1987 that defined it as development that "meets the needs of the present without compromising the ability of future generations to meet their own needs" (WCED 1987). Since a single and reasonably short definition cannot provide sufficient guidance for implementation, a set of normative principles of sustainable development is often used in addition to the Brundtland definition. The Rio Declaration, itself consisting of 27 principles, and the Agenda 21, the action plan to implement Rio, have often been used as a source and as a basis for the formulation of a process-related set of **sustainable development principles**:

Six SD principles

1. Balancing different policy dimensions;
2. Long timeframes and intergenerational equity;
3. Environment preservation, limits to growth and planetary boundaries;
4. Equal opportunities, access and intra-generational equity;
5. Inclusion and participation;
6. Governance for sustainable development.

1. Balancing different policy dimensions

The first of these criteria is probably the most encompassing one because it comprises many aspects of sustainable development and gives also an idea of how to operationalize the concept. Sustainable development is generally understood as a development that is aims to balance different policy dimensions, mainly economic prosperity, environmental protection and social justice. **Balancing sustainable development dimensions** means that a 'holistic' point of view should be followed and a balanced consideration of economic, environmental, and social aspects should be pursued in the process of development (Forum for the Future, 2004)[21].

2. Long timeframes and intergenerational equity

A second crucial issue is the idea of taking into account **long timeframes**. In fact, sustainable development calls for the necessity of a so-called **inter-generational equity**, which refers to the equality of distribution of resources and risks between the current and future generations. Principle 3 of the Rio Declaration states that "[t]he right to development must be fulfilled so as to equitably meet developmental and environmental

[21] Forum for the Future. (2004). *Learning and Skills for Sustainable Development: Developing a sustainability literate society*

needs of present and future generations", we can derive the principle of inter-generational,

3. Environment preservation, limits to growth and planetary boundaries

As it can be seen also this Principle 3 of the Rio Declaration, the **environment preservation** aspect is very central in the sustainable development discourse. In fact, whilst sustainable development recognises that the Earth has limits and **planetary boundaries** should be considered (Rockström et al., 2009), it also acknowledges that the economy is embedded in the Earth system, relying on its ecosystems to function, and in return producing waste, consuming resources and impacting ecosystems back. The consequence of this line of thinking is that also the economy needs to recognise limits to growth (i.e. Meadows et al., 1972). **Ecosystems conservation and enhancement** is, therefore, a key aspect of sustainable development. Consideration of risks is also crucial and a guiding principle in sustainable development in this regard is the so-called **precautionary principle** that is defined in the Rio Declaration: "where there are threats of serious or irreversible damage, lack of full scientific certainty shall not be used as a reason for postponing cost-effective measures to prevent environmental degradation" (UNCED, 1992, Principle 15)[22].

4. Equal opportunities, access and intra-generational equity

As seen, sustainable development is not only about intergenerational equity but it is also very much interested in **intra-generational** equity, which considers the fairness of distribution of resources and risks within the current generation. This fourth criterion calls for **equal opportunities** and same possibilities in terms of access to resources as important aspect of sustainable development. In sustainable development, a number of terms and concepts are therefore crucial, namely: distribution and re-distribution, well-being, fighting poverty, equal consideration of societies and humans around the world, an urge for democracy and education propagation.

5. Inclusion and participation

As fifth criterion, essentially retrieved from the 10th Rio Declaration's Principle, sustainable development is very much based on **inclusion and participation**.Sustainable development "issues are best handled with participation of all concerned citizens, at the relevant level. At the national level, each individual shall have appropriate **access to information** (…) and the **opportunity to participate in decision-making processes**. States shall facilitate and encourage public awareness and participation by making information widely available. Effective access to judicial and administrative proceedings, including redress and remedy, shall be provided" (UNCED, 1992).

6. Governance for sustainable development

As addressed by a several academics[23] and international organisations[24], a final key criterion that has acquired importance over time is the principle of **'governance for sustainable development'**. The link between governance and sustainable development is fundamental and was already addressed by the Brundtland Commission in 1987. Governance mechanisms are in general crucial for achieving sustainable development. The goal of sustainable development involves a reform agenda that includes reforms in cross-sectoral governance structures and processes, vertical policy coordination, enhanced participation in policy-making, increased reflexivity (e.g. evidence-based

[22] http://www.unep.org/Documents.Multilingual/Default.asp?documentid=78&articleid=1163
[23] See also: Jordan, 2008; Baker and Eckerberg, 2008; Steurer, 2007; Lafferty, 2004.
[24] UN Johannesburg Plan of Implementation, 2002; OECD, 2002.

policy-making), and long-term time frames[25]. The first document to frame sustainable development as a governance reform agenda was Agenda 21[26]. The governance aspects of the action plan were reiterated and complemented at the UN World Summit in Johannesburg 2002 (Rio +10). The World Summit Report pointed out that "good governance is essential for sustainable development"[27].

This concept is developed from the notion of **'good governance'**, which is a specifically normative idea that prescribes certain steering procedures and institutions – based on principles, values and norms, i.e. participation, transparency, rule of law, etc. – that should be adopted to achieve the preferred outcomes. The origin of the concept of good governance is associated with international organisations[28] such as the World Bank and the OECD in the context of development policy. As well defined by the UN Economic and Social Commission for Asia and the Pacific (UNESCAP)[29], good governance has eight key features: 1) participatory; 2) consensus oriented; 3) accountable; 4) transparent; 5) responsive; 6) effective and efficient; 7) equitable and inclusive; and, 8) follows the rule of law. To show how good governance and sustainable development are interlinked in a European policy document, the renewed European Union Sustainable Development Strategy (EU SDS) of 2006 is a good example as it addresses good governance in various policy-guiding principles. To achieve its objectives, the EU SDS sets out an approach to better policy-making based on better regulation and integration of sustainable development criteria into policy-making at all government levels.

[25] OECD, *Governance for Sustainable Development*, OECD Paris, 2002; Lafferty, W.M., 'Adapting Governance Practice to the Goals of Sustainable Development', 2002, http://webs.uvigo.es/dialogos/biblioteca/goals.pdf.

[26] UNCED, Agenda 21, United Nations New York, 1992.

[27] United Nations, *Report of the World Summit on Sustainable Development*, United Nations New York, 2002.

[28] In the European context, the EU has addressed good governance in its White Paper on European Governance (2001).

[29] http://www.unescap.org/pdd/prs/ProjectActivities/Ongoing/gg/governance.asp

3. Sustainable development and the financial sector

Key messages:

- Many differences exist between the sustainable development concept and the financial markets.
- The crucial difference between the two arenas is that while sustainable development has a multidimensional and holistic perspective, in which a balance among environmental protection, social equity and economic development is pursued, the financial sector seeks the one-dimensional goal of the maximisation of financial profits.
- Among the interventions suggested, some are closer to the financial sector rationale: 1) Transaction tax/Tobin tax; 2) Disclosure and Transparency; 3) Regulate speculation; 4) Bonuses regulation.
- Although the financial sector and sustainable development seem far apart from each other, a few suggestions can be made to include the SD perspective into finance: (i) internalization of externalities in the calculation of an investment (i.e. in a company's present value); (ii) assigning a long-term horizon to investments, also as a necessity for maintaining the prospect of safeguarding financial capital for the future; (iii) progressive substitution of financial ratios with sustainability ratios; (iv) a changing perspective on the connotation of financial profits.

3.1. The main differences

When it comes to consider the main differences between sustainable development and the financial markets, many seem to be outstanding and, sometimes even self-evident. Although there may be others, especially in categories that are not immediately related to finance (i.e. democracy), we will analyse in detail those differences that seem to us most prominent and related to the six sustainable development principles outlined in the previous chapter.

(1) Balancing SD dimensions vs. one-dimensional goal

While sustainable development aims to increase the opportunities for all societies, present and future, the financial sector mainly strives for the short-term **maximization of financial profits** and the **return on investment**. Understood as the net profit over the investment made, the return on investment is the main concern for financial markets, which explains why the financial sector has as a largley **one-dimensional** goal that privileges only the economic dimension.

(2) Long timeframes and intergenerational equity vs. short-term profits

Secondly, a very self-evident difference concerns timeframes. The **pursuit of short-term profits** or the search for the **immediate gain** that is as close as possible to the present times, largely defies the idea of considering the long-term span or the idea of caring for the future generations which is addressed as inter-generational equity in the sustainable development discourse.

Another important aspect to take into account when considering timeframes is the role of the practice called '**discounting**' that takes an important part in the financial sector. What the financial sector always provides is a so-called **present value** of investments using discounting techniques that provide a value in the present of the gains that will occur in the future. As argued by Schmidheiny and Zorraquin (1996), financial markets discount the future routinely and heavily while sustainable development is concerned

with the importance of the future. Although we are talking about discounting financial flows, it is also true that these financial flows intervene on the real economy, and, furthermore, no consideration is taken over future capital of future generations, but merely individual gain.

(3) Environment preservation, limits to growth and planetary boundaries

For what concerns the **environmental pillar** of sustainable development, there is no incentive for the financial sector to take this into account for two main reasons. First, as we just argued, the financial sector has a one-dimensional goal; it is only interested in the maximisation of financial profits. This takes us to the second reason: the financial sector does not have a real concern in the quality of its investments as long as they are profitable investments. This means that there is no ethical consideration of investments or no consideration of 'bad' externalities in the calculation of profits. Whether a financial investment is made over a polluting company or a non-polluting company, is from its logic of no concern in the financial sector; and, probably the financial investment will be made in the polluting one since it will perhaps provide higher returns because of the less costs it has in comparison with the non-polluting company that is paying higher costs to take care of the environment.

Another interesting point can be made here in terms of the consideration of risks. For instance, Schmidheiny and Zorraquin (1996) assumed that accounting and reporting systems do not adequately convey potential environmental risks or opportunities. If this holds true, therefore, financial markets are compelled to make decisions based on biased information. In the sustainable development discourse, the **precautionary principle** had a crucial importance in our analysis. If it is true that the financial sector does not take in consideration the environmental dimension, therefore environmental risks can be created when investment decisions are taken; and, these risks could easily assume a real connotation that, starting from a 'bad' investment, has the potential of affecting thousands or millions of people around the world.

(4) Equal opportunities, access and intra-generational equity

If we look at the precautionary principle from a broader perspective and, hence, we consider the precautionary principle as a guiding attitude for societies, we see again a fundamental difference in the way financial markets deal with risk. Financial markets are supposed to help managing risks and dealing with uncertainty, and this is an extremely important support that financial markets give to the real economy, therefore, managing risks, avoiding high losses, and allowing smoother operations. However, in finance, it is also true that higher risks leads to higher profits, which could mean that if one is very attracted by financial profits and not averse to risk, the possibility to lose the investment for a larger return will be accepted.

This concerns very much the so-called **'social' dimension** of sustainable development where intra-generational equity, equal opportunities, access to resources, well-being, and distribution are key aspects of the discourse. In fact, considering financial risks in a 'precautionary' mode could mean that the effects on the real economy and the society are taken into account, for instance, in terms of job loss, company closures or systemic problems to the whole economy. What role could the 'precautionary principle' play in the financial markets to 'safeguard' the society, the environment, and the economy? Is there a chance to develop a "Precautionary Financial Principle"? Interestingly again, the

one-dimensional logic of the financial sector poses serious concerns over the possibility of considering a social dimension in its undertakings.

(5) Inclusion and participation

With regards to the **'inclusion and participation'** principle we underpinned for sustainable development, the first thing that can be noted when looking at differences is the complexity of the financial sector. This is a very technical sector where a high degree of specialty and financial knowledge is needed. The capacity of managing stress, the quantity and speed of information that need to be taken into account, and the ability of taking investment decisions in a very short time and in a highly competitive environment are generally recognised as distinctive requirements for working in the financial sector. Furthermore, the high number of financial instruments that are constructed and the highly complex mathematical foundation of them are probably another distinctive aspect to be considered. All these characteristics have, on the other hand, another connotation: because of this complexity, people feel generally excluded from the financial world and have difficulties in understanding it. This could somehow go against and differ from what we defined as the criterion of 'inclusion and participation' in the sense that *appropriate access to information* and *opportunities to participate in decision-making processes*, as outlined in the 10th principle of the Rio Declaration, are in reality made very difficult and, are practically absent in the operation of the financial markets

(6) Governance for sustainable development

Finally, in terms of governance for sustainable development, the financial sector in many ways defies the features of what has been portrayed as good governance. We touched upon the **participatory** and the **inclusivity** aspects already and this goes largely against the logic of the financial sector. Being **effective and efficient** is most probably the one characteristic that is more addressed by the financial sector in the sense that, as defined before, the financial sector should serve the economy by increasing its efficiency and its productivity, hence its effectiveness. However, what is described in the 'good governance' framework as "effective and efficient" also covers the sustainable use of natural resources and the protection of the environment, and is a slightly different concept meaning that processes and institutions produce results that meet the needs of society while making the best use of resources at their disposal.

Finally, **transparency**, **accountability** and **following the rule of law** are very much linked, especially considering that accountability cannot be enforced without transparency and the rule of law. Transparency also means that information is freely available and directly accessible to those who will be affected by such decisions and their enforcement, and that enough information is provided in a way that is easily understandable. This means, in order to bring the financial sector more in line with good governance procedures, it is necessary that it is transparent to the public and accountable to those who will be affected by its decisions or actions. This is a strong call for societies to decide how much and in what way they are affected by the financial sector, which also means that whenever strong impacts of the financial sector on the real economy, the environment and the society are expected, strong regulations, supervision, control and public debate should be foreseen.

Table 1: Differences

Sustainable development	Financial sector
Balancing SD dimensions: environment preservation, social equity, economic	**One-dimensional logic; maximisation of profits and return on investment**

between SD and financial sector

development	
Long timeframes and intergenerational equity	Short-term perspective; discounting; present value calculation of calculation
Environment preservation, limits to growth and planetary boundaries	Little to no consideration of environmental effects
Equal opportunities, access and intra-generational equity	Little to no consideration of social effects
Inclusion and participation	Highly complex; not inclusive, nor open to participation
Governance for SD	Efficiency oriented; shortage of transparency and accountability

3.2. Regulations and interventions

Although the financial markets rationale and the sustainable development discourse seem far apart from each other, we provide an overview of possible interventions on the financial sector that could help reducing the distances. In terms of regulations, among the interventions that could be implemented, we firstly present those that seem closer to the financial sector and that are already considered at different levels (i.e. EU level): 1) Transaction tax/Tobin tax; 2) Disclosure and Transparency; 3) Regulate speculation; 4) Bonuses regulation. Secondly, we will portray a number of different interventions from a sustainable development perspective that would enable a stronger consideration of the sustainable development criteria in the financial sector.

Regulations for the financial sector

1) Transaction tax/Tobin tax

A Eurozone Financial Transaction Tax (FTT)

Currently European Member States are discussing a way to introduce a transaction tax, as confirmed on 9 October 2012 by the EU Commissioner for taxation. This is in the media usually addressed as Tobin Tax, which comes from the proposal made by Prof. James Tobin of an international tax on foreign exchange transactions with the purpose of "penalize short-horizon round trips" (Tobin, 1996)[30]. As he explained clearly to "Der Spiegel" in 2001[31], his intention was to **limit exchange rate fluctuations** with a simple idea:

> *"on every exchange of one currency for another a small tax would become due, let's say one half of a percent of the transaction. That would scare speculators away. For there are many investors who put their money into currencies for the very short term. If this money is suddenly withdrawn, the countries have to raise interest rates drastically so that the currency remains attractive. High interest rates often are disastrous for the domestic economy, as was demonstrated by the crises in Mexico, Southeast Asia and Russia during the nineties. My tax would restore some room for manoeuvre to small countries' central banks as against the tyranny of the financial markets".* (Tobin, 2001)

[30] ul Haq, M., I. Kaul and I. Grunberg. 1996 The Tobin Tax: Coping with Financial Volatility. Oxford University Press: New York, Oxford.

[31] Der Spiegel. 2001. "They Are Misusing My Name". September 2, 2001 [English translation by Yale Department of Economics: http://www.econ.yale.edu/news/tobin/jt_01-09-02_ds_misusing-name.htm]

Similar to a Tobin-tax, on 28 September 2011, the European Commission adopted a proposal for a Council Directive on a common system of **financial transaction tax (FTT)**[32], aiming at:

- **harmonising legislation concerning indirect taxation on financial transactions**, which is needed to ensure the proper functioning of the internal market for transactions in financial instruments and to avoid distortion of competition between financial instruments, actors and market places across the European Union, and at the same time;
- **ensuring that financial institutions make a fair and substantial contribution** to covering the costs of the recent crisis and creating a level playing field with other sectors from a taxation point of view, and
- **creating appropriate disincentives for transactions that do not enhance the efficiency of financial markets** thereby complementing regulatory measures to avoid future crises.

Although diverse opinions still persist in the EU, ten Member States (Belgium, Germany, Greece, Spain, France, Italy, Austria, Portugal, Slovenia and Slovakia) have addressed formal requests to the Commission to establish an enhanced cooperation for a common system of FTT and that the Commission was asked to submit a proposal to the Council on that manner. They specified that the scope and objectives should be based on the Commission's proposal of September 2011 for a Council Directive on a common system of financial transaction tax.

2) Disclosure and Transparency

Disclosure, transparency, stronger supervision

With more open information and more appropriate reporting systems, a stronger and more effective supervision could help avoid negative effects coming from the financial sector. Disclosure and transparency would, therefore, serve to open up secrecy and make information about financial transactions more accessible for the authorities and the public. A concrete example is the **European Market Infrastructure Regulation (EMIR)** proposal that tries to ensure that the details of any over-the-counter (OTC) derivative contract that have been concluded and any modification, or termination of the contract is reported to a trade repository. A trade repository would then maintain it for at least ten years following the termination of the relevant contracts and would make the necessary information available to relevant supervisory authorities (EU, COM(2010)484/5).

3) 'Regulate' speculation

Ban big speculators

Speculation is intended as the taking of relatively high risks and the acceptance of the possibility of losses in the hope of making large gains[33]. Many say that speculation is a successful instrument for improving efficiency of markets because it allows prices to adapt much quicker than it would happen through short selling. What is not 'good' is not speculation as such, but the **big speculators** who are able, for instance, to use hedging instruments to make big profit and move enormous amounts of money with the peril of causing large systemic losses and cascade effects. In this sense, a good option could be

[32] see also: http://ec.europa.eu/taxation_customs/resources/documents/taxation/com_2012_631_en.pdf
[33] http://glossary.reuters.com/index.php/Speculation

to **'regulate' speculation through 'licensing' participants in the markets** and somehow *banning* those who are too big and able to pose such systemic problems.

4) Bonuses regulation

Regulate bonuses to tackle excessive and imprudent risk-taking

When we talk about bonuses, we usually refer to a compensation system, as a provision of financial incentives to work and reach results. Nowadays, "the purpose of bonuses in the financial world seems to have shifted. Instead of being offered as a reward for a job well done, they now appear to be handed out simply because the job was done" (De Cremer[35]). Also, as outlined in the **Directive 2010/76/EU**, what is evident is that the inappropriate remuneration structures of some financial institutions have been a contributory factor of **excessive and imprudent risk-taking** in the banking sector that partially led to the failure of individual financial institutions and then to systemic problems. It is especially said that remuneration policies that give incentives to take risks (…) can undermine sound and effective risk management and exacerbate excessive risk-taking behaviour. The mentioned EU directive[36] 2010/76/EU was therefore put in place to regulate this aspect of the financial sector, where a major problem was detected in the wrong incentives that led to excessive risk-taking, which at the end impacted the whole real economy.

5) Recent developments in the USA

Recent regulation of the financial sector in the USA

On July 12, 2010 president Obama in the USA signed a new regulation for the financial sector with four main objectives[37]: (1) To promote the financial stability of the United States by improving accountability and transparency in the financial system; (2) to end 'too big to fail'; (3) to protect the US taxpayer by ending bailouts; (4) to protect consumers from abusive financial services practices. In Table 2 below, we summarise the main highlights as reported by the US Senate Committee on Banking, Housing & Urban Affairs.

Table 2: Dodd-Frank Wall Street Reform and Consumer Protection Act[34]

The Dodd-Frank Wall Street Reform and Consumer Protection Act	
1) Consumer Protections with Authority and Independence	Creates a new independent watchdog with the authority to ensure American consumers get the clear, accurate information they need to shop for other financial products, and protect them from hidden fees, abusive terms, and deceptive practices.
2) Ends Too Big to Fail Bailouts	Ends the possibility that taxpayers will be asked to write a check to bail out financial firms that threaten the economy.
3) Advance Warning System	Creates a council to identify and address systemic risks posed by large, complex companies, products, and activities before they threaten the stability of the economy.
4) Transparency & Accountability for Exotic Instruments	Eliminates loopholes that allow risky and abusive practices to go on unnoticed and unregulated - including loopholes for over-the-counter derivatives, asset-backed securities, hedge funds, mortgage brokers and payday lenders.
5) Executive Compensation and Corporate Governance	Provides shareholders with a say on pay and corporate affairs with a non-binding vote on executive compensation and golden parachutes.
6) Protects Investors	Provides tough new rules for transparency and accountability for credit rating agencies to protect investors and businesses.

[34] http://banking.senate.gov/public/_files/070110_Dodd_Frank_Wall_Street_Reform_comprehensive_summary_Final.pdf
[35] see also: http://bsr.london.edu/lbs-article/583/index.html
[36] http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2010:329:0003:01:EN:HTML.
See also: http://ec.europa.eu/internal_market/bank/regcapital/legislation_in_force_en.htm#maincontentSec5
[37] http://www.gpo.gov/fdsys/pkg/PLAW-111publ203/html/PLAW-111publ203.htm

7) Enforces Regulations on the Books	Strengthens oversight and empowers regulators to aggressively pursue financial fraud, conflicts of interest and manipulation of the system that benefits special interests at the expense of American families and businesses.

Interventions from a sustainable development perspective

The four interventions outlined above had in common that they aim to restrict the financial sector with legal, economic and/or financial tools. However, it seems that more could be done, especially from the perspective of sustainable development, taking into account the six SD principles previously defined. We outline four possible interventions: (i) internalization of externalities in the calculation of an investment (i.e. in a company's present value); (ii) assigning a long-term horizon to investments, also as a necessity for maintaining the prospect of safeguarding financial capital for the future; (iii) progressive substitution of financial ratios with sustainability ratios; (iv) a changing perspective on the connotation of financial profits.

(i) Internalization of externalities

Internalization of externalities in investment decisions could potentially contain and answer to many of the sustainable development concerns towards the financial markets because environmental, social and economic threats could be quantitatively assessed and taken into account in financial transactions. This would enable to consider balancing different policy dimensions.

(ii) A long-term horizon

Assigning a long-term horizon to investments, also as a necessity for maintaining the prospect of safeguarding financial capital for the future, might also be a possibility. For instance, it could be suggested that a certain percentage of investments need to be 'saved' for the future or that a 'precautionary financial principle' is included in investment decisions in order to avoid the creation of too high risks that have the potential of posing systemic risks to the real economy.

(iii) Sustainability ratios

The third intervention could be to progressively substitute the base for investment decisions and policies from financial ratios to **sustainability ratios**. The downturn for this suggestion is unfortunately very visible: whether sustainable development could be achieved without having to revise current norms and values or the current worldview in which modern society is dominated by economic materialism[38].

(iv) A changing perspective

Related to the previous one, a fourth and last suggestion is probably the most controversial, but maybe the most effective in terms of prospects for genuine change. Among different instances, the experience of the so-called "Common Welfare Economy" (Felber, 2012)[39] shows the basic elements of an **alternative economic framework**, where, among others, economic success is no longer measured with monetary indicators, such as financial profit. In this case economic success is defined by providing and/or improving basic needs, quality of life, communal values, etc. In this case, market values and social values are no longer contrasting.

[38] Jeucken, M. 2001. Sustainable Finance and Banking. The Financial Sector and the Future of the Planet. London: Earthscan Publications Ltd
[39] Felber, C. 2012. *Die Gemeinwohl-Ökonomie.* Ed. Deuticke

3.3. Potentials to enable sustainable development financing

In September 2011, Forum For the Future completed a report in which they showed investors how they can help create a resilient, stable and sustainable economy by investing wisely and using their power to shape the development of capital markets.

ESDN case study on Sustainable Investment

An important part for a more sustainable financial sector with high potential for enabling sustainable development financing can be played by the so-called Socially Responsible Investments (SRIs). Parallel to this discussion paper, the ESDN Office has prepared an ESDN Case Study entitled "**Sustainable investment: options for a contribution to a more sustainable financial sector**" (ESDN Case Study No 11, 2012), which we suggest for a richer overview on this topic. SRI is the most applied and well-known term that represents inter-alia a larger array of instruments all connected with sustainable, green, or ethical investing. The term "socially responsible investment" (SRI) became the most widespread and may actually be used interchangeably with the term sustainable investment since it also relates to practices that are central to the concept of sustainable development (i.e. considering economic, social, environmental aspects). Therefore, we will use the term SRIs to comprehend this larger picture and will use the case study as the main source for this section.

Socially Responsible Investments (SRIs)

SRIs have been created to describe investment strategies that seek to consider both profit and societal well-being. Socially responsible or sustainable investors encourage corporate practices that promote issues such as environmental stewardship, consumer protection, human rights, quality of labour and jobs, as well as sustainable use of natural resources. Today, SRI is an established industry offering a variety of specialised and standardised products to both retail[40] and institutional investors[41].

In this regard, the European Sustainable Investment Forum (EUROSIF, 2012) offers a comprehensive classification scheme that covers the wide range of SRIs and other responsible investment strategies. EUROSIF developed a framework that identifies seven distinct processes, referred to as strategies, displayed in Table 3 below. In fact, these seven processes represent the strategies used by asset managers that incorporate sustainable development into their investment decisions or take into account ESG criteria in various shapes and forms.

Table 3: Overview of SRI investment strategies (EUROSIF, 2012)

Strategy	Definition
1. Sustainability Themed Investment	Investment in themes or assets linked to the development of sustainability. Thematic funds focus on specific or multiple issues related to ESG.
2. Best-in-Class Investment Selection	Approach where leading or best-performing investments within a universe, category, or class are selected or weighted based on ESG criteria.
3. Norms-based Screening	Screening of investments according to their compliance with international standards and norms
4. Exclusion of Holdings from Investment Universe	An approach that excludes specific investments or classes of investment from the investible universe, such as companies, sectors, or countries.
5. Integration of ESG Factors in Financial Analysis	The explicit inclusion by asset managers of ESG risks and opportunities into traditional financial analysis and investment decisions based on a systematic process and appropriate research sources.
7. Engagement and	Engagement activities and active ownership through voting of shares and

[40] A retail investor is an individual investor possessing shares of a given security

[41] An institutional investor is an investor such as a bank, insurance company, retirement fund, hedge fund, or mutual fund, that is financially sophisticated and makes large investments

Voting on Sustainability Matters	engagement with companies on ESG matters. This is a long-term process, seeking to influence behaviour or increase disclosure.
8. Impact Investment	Impact investments are investments made into companies, organizations, and funds with the intention to generate social and environmental impact alongside a financial return. Impact investments can be made in both emerging and developed markets, and target a range of returns from below market-to-market rate, depending upon the circumstances.

Performance and trends of SRIs

According to the Global Alliance for Banking on Values (GABV, 2012), **the concept of sustainable finance and investment continues to grow**, especially in the wake of one of the most devastating financial crises in history. This includes responsibility from the corporate side (CSR) as well as the investor side (SRI) of the capital markets. In this respect, some of the key findings on a comparison of sustainable banks and Global Systemically Important Financial Institutes (GSIFIs)[42] by GABV (2012) showed that sustainable banks have:

- much higher levels of equity to total assets, with slightly higher levels of BIS 1 capital ratios (especially in recent years) than GSIFIs.
- generally better or comparable Return on Assets and Returns on Equity over the time period covered. The returns of Sustainable Banks are also less volatile than those of GSIFIs.
- significantly higher growth in loans and deposits leading to higher growth in assets and income than GSIFIs.

Most common SD related themes for investments

Among the **most common sustainable development related themes** for investment is **clean tech**, with investors making allocations to, for example, renewable energy, resource and energy efficiency, and waste technology. On the social side, **microfinance** remains popular with PRI signatories as well as other sectors such as global health, education, and social infrastructure. Regarding future trends of investment, while sustainable forestry has traditionally been an important asset class for many asset owners, sustainable agriculture is also gaining increasing attention[43] (UNEP, 2012).

Table 4: Aggregated market growth (€ billions) of 14 European countries (EUROSIF, 2012)

Investment strategy	2009	2011	Growth (CAGR)
Sustainability themed	€ 25,361	€ 48,090	37.7%
Best in Class/Positive Screening	€ 132,956	€ 283,206	45.9%
Norms-based screening	€ 988,756	€ 2,346,308	54.0%
Exclusions	€ 1,749,432	€ 3,829,287	47.9%
Engagement/Voting	€ 1,668,473	€ 1,950,406	8.1%
Integration	€ 2,810,506	€ 3,204,107	6.8%

Future development trends

Concerning **future development trends** for SRIs, EUROSIF (2012) argued that continued and increasing focus on investors by national and EU legislators through regulations such as the European Social Entrepreneurship Funds Framework will be beneficial for the increase in SRIs, which according to the study, will be the second most important factor for growth in SRIs. Further growth for SRIs will be expected also due to other factors such

[42] A study commissioned by GABV and funded by the Rockefeller Foundation and GABV compared the performance of 17 values-based banks with 29 of the world's largest and most influential banks including Bank of America, JP Morgan, Barclays, Citicorp and Deutsche Bank.

[43] This trend concerns only signatories of the United Nations-backed Principles for Responsible Investment (PRI)

as: 1) demand from institutional investors; 2) international initiatives; 3) external pressure; and, 4) demand from retail investors.

SRIs are comparatively small

An investigation of a series of case studies on SRIs (EUROSIF, 2012) revealed that allocations to SRIs often remain small in comparison to investors entire *assets under management* (AuM) due to the following reasons: (i) deal size; (ii) lack of historical performance data; (iii) lack of knowledge about these investment areas; (iv) high real or perceived risk levels.

Potential strategies for facilitating SRIs growth

Potential strategies and changes are needed in order to further spur the future growth of SRIs. Therefore, it remains crucial to facilitate removing barriers for these investments on sustainable development. These potential strategies can be summarised as follows:

1. Promoting and further developing innovative and successful products and services with a positive environmental and social impact to attract clients;
2. Applying robust reporting and assessment is key for enhancing the credibility of sustainable investment;
3. Putting in place regulations in order to remove investment barriers to small-scale sustainable enterprises.

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Annex I Glossary

Term	Definition
Assets	Assets are items of value to a business that can be converted into cash. They can be tangible items such as factories, machinery or securities or intangible items such as goodwill, the title of a newspaper or a product's brand name. They appear on the company's balance sheet.
Bonds	A bond is a legal contract in which a borrower such as a government, company or institution issues a certificate by which it promises to pay a lender a specific rate of interest for a fixed duration and then redeem the contract at face value on maturity. In theory, corporate bonds are safer than stocks because they have a fixed maturity and are repaid before any payments are made to shareholders. But if a company fails its bond holders may suffer just as much as its shareholders.
Capital	Capital refers in a general sense to financial resources such as cash or securities or, more specifically, to assets which can be liquidated and turned into cash.
Central banks	A central bank is the major regulatory bank in a nation or group of nations' monetary system. Its role normally includes control of the credit system, the issuing of notes and coins and supervision of commercial banks. It also manages its country's foreign exchange reserves and acts as its government's banker. Central banks in developed economies are also responsible for the conduct of monetary policy.
Commercial banks	Financial institutions that operate both in the wholesale banking and retail banking markets. Commercial banks attract customer deposits and offer cheque-clearing facilities and also handle the business of large companies and financial institutions. They are allowed to borrow from their respective central banks when they need short-term funds. Commercial banks contrast with investment or merchant banks, which specialize in raising funds for companies rather than concentrating on lending and the transmission of money.
Commodity	Raw materials used in the production of foodstuffs and in manufacturing industries. Commodities include metals, grains and cereals, soft commodities such as sugar, cocoa, coffee and tea and vegetable oils such as palm oil, soya bean oil and sunflower seed oil. Exchange-traded commodities are quoted in specific lots of a specific quality for specified delivery. Commodities are also traded in futures and options markets.
Credit rating	Credit ratings measure a borrower's creditworthiness and provide an international framework for comparing the credit quality of issuers and rated bonds. Rating agencies allocate three kinds of ratings: for issuers, for long-term debt and for short-term debt. Of these, issuer credit ratings are the most widely watched. They measure the creditworthiness of the borrower including its capacity and willingness to meet its financial obligations. A top rating means there is thought to be almost no risk of the borrower failing to pay interest and principal. Ratings are derived from an examination of a company or a government's past financial history, its current assets and liabilities and its future prospects. The higher the rating the less the borrower will need to pay for funds.
Debt	An obligation to repay a sum of money. More specifically, it is funds passed from a creditor to a debtor in exchange for interest and a commitment to repay the principal in full on a specified date. Bonds and other debt instruments have a defined life, a maturity date and normally pay a fixed interest rate or coupon.
Derivatives	Derivatives are securities or financial instruments whose value is derived from the value of another, underlying asset. They can be bought, sold and traded in a similar way to shares or any other financial instrument. The underlying assets or instruments on which derivatives can be based include commodities, equities, residential mortgages, commercial real estate, loans, bonds, interest rates, exchange rates, stock market indices, consumer price indices and weather conditions. The main types of derivatives are forward contracts, futures, options and swaps. Credit derivatives are based on loans, bonds or other forms of credit. The pricing and performance of derivatives is often based on that of the underlying asset,

	although the reverse may also be true. Derivatives can drive the underlying market and the volumes traded in certain futures and options contacts can exceed those in the underlying cash markets. Derivatives can be traded on an exchange or in an over-the-counter (OTC) market. Global derivatives traded market volume is in the hundreds of trillions of dollars annually.
Equity	Equity is the holding or stake that shareholders have in a company. Shareholders equity is calculated by subtracting total liabilities from total assets. Equity capital raised by the issue of shares is one of the two main sources of finance for a company, the other is debt.
Financial intermediation	Financial intermediation is the bringing together users of capital, such as businesses and governments, with suppliers of capital such as pension funds and private investors. The term is usually used to describe the activities of commercial and investment banks.
Financial markets	Markets in which funds are transferred from people who have a surplus of available funds to people who have a shortage of available funds
Inflation	Inflation is a persistent rise in the prices of goods and services.
Investment bank	A financial institution that raises capital for clients, that trades in securities and financial instruments for clients and on its own account and advises on corporate mergers and acquisitions (M&A).
Interest rates	The charge or the return on an asset or debt expressed as a percentage of the price or size of the asset or debt. It is usually expressed on an annual basis.
Maturity	The length of time between the issue of a bond or other security and the date on which it becomes payable in full. Most bonds are issued with a fixed maturity date. Those without one are known as perpetuals.
Monetary policy	Government policy that deals with the availability and cost of money. It is changed by making adjustments to the money supply and the level of short term official interest rates. Monetary policy has a direct effect on the overall level of economic activity and inflation. Governments often delegate the implementation of monetary policy to their country's central bank.
Money market	A wholesale market for the buying and selling of money. Money markets normally trade in short term debt instruments with maturities of 12 months or less. Most activity is by banks borrowing and lending to each other and interest rates are often set with reference to the London Interbank Offered Rate (LIBOR). Instruments traded on the money market include banker's acceptances, CDs, repurchase agreements, treasury bills, commercial paper, eurodollar deposits, municipal notes and fed funds.
Over the counter (OTC)	Abbreviation for Over The Counter. An OTC market or trade is one conducted directly between dealers and principals via a telephone and computer network rather than via an exchange. In contrast to exchange trading, there is no automatic disclosure of the price of deals to other market participants and deals and traded instruments are not standardised. With a trade on an exchange a clearing house steps in when a counterparty defaults, ensuring that the transaction is completed. But most OTC trades are not cleared, exposing firms – and the financial system – to counterparty risk. As of 2009, there is increasing political pressure for OTC trades to move to public exchanges and be handled by clearing houses.
Present value	The current value of future cash flows, discounted at an appropriate interest rate. Cash earned in the future is worth less than cash earned now because today's cash can be invested and earn interest.
Speculation	The taking of relatively high risks and the acceptance of the possibility of losses in the hope of making large gains. It may involve the purchase or the short-selling of securities or assets in the hope of profiting from relatively short term price changes. Speculators normally, though not always, have no professional interest in the securities or assets they trade in. Speculation can be contrasted with investment which is the long term purchase of assets or securities in the hope of income and capital appreciation. Speculation is sometimes referred to in a pejorative sense. However, speculative trading adds capital and liquidity to financial markets and in normal times reduces price fluctuations. But in periods of economic or political crisis it is likely to exaggerate market movements.
Stock	The amount of money employed by a company in its work-in-progress, raw materials and finished goods, also known as inventory. The word can also refer to a certificate that represents part ownership of a company and the right to receive a share in the profits of the company. Also called a share.

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