

Corso di Laurea magistrale (*ordinamento ex D.M. 270/2004*) In Economia dell'Ambiente

_

Ca' Foscari Dorsoduro 3246 30123 Venezia

Tesi di Laurea

Sustainability Reporting: A procedure for University

Relatore

Ch. Prof.ssa Chiara Mio

Laureando

Carlo Neri Matricola 827931

Anno Accademico 2011 / 2012

Acknowledgements

Sincere gratitude goes to all who contributed to this work, in particular my supervisor Prof. Chiara Mio, who drove my idea and its development along this period; Re.So. project's teamwork, which shared with me the experience of the first sustainability report of Ca' Foscari; everyone who help me to gather information about my research; Università Ca' Foscari and Venice International University to gave me the possibility to study abroad and improve my English language; my friends and my family to support me; anyone that will find my work useful to approach sustainability.

Abstract

Given the role of universities in the sustainable development's context, the

sustainability report is a valuable document which can improve the engagement of

stakeholders and the connection with local and international communities. The aim of

this work is to create, from concrete examples, a standard procedure which can help

universities or higher education institutions to disclosure their environmental, economic

and social performance in the sustainability report.

Key words: sustainability, reporting, university, education.

ii

Table of Contents

Introduction			
1. Sustainable Reporting	5		
1.1 Sustainability	5		
1.2 Reporting	8		
1.3 Sustainability report	14		
2. Universities and Higher Education Institutions (HEIs)	25		
2.1 Education and Sustainability	25		
2.2 Sustainability Reporting in Universities	34		
3. Case studies	39		
3.1 Sustainable development report 2010 – University of Waterloo, Canada			
3.2 Responsible Futures – Sustainability Report 2010 – La Trobe University, Au	stralia		
	43		
3.3 Sustainability Report 2009 to 2010 – ETH Zurich, Swiss	45		
3.4 Sustainability Annual Report 2010 – University of Michigan, USA	47		
3.5 Ca' Foscari Sostenibile: Il Report 2010 – Università Ca' Foscari, Italy	49		
3.6 Findings	51		
4. Università Ca' Foscari, Procedure experience	55		
5. Conclusions and Procedure for University	65		
5.1 Conclusions	65		
5.2 Procedure for University	67		
References	74		

Introduction

Since its first "official" definition by WCED in 1987, sustainable development has been spread all over the World and it has evolved in different, and sometimes divergent, ideas and aspects, according with cultures, lifestyles and needs of peoples and countries. Such diffusion is the product of a series of international efforts to sensitize population to voluntarily adopt sustainable lifestyles, according with their own conditions and possibilities, without binding them with international or local legislations which may create advantages for some people to the detriment of others. At the same time, the integration of environmental and social aspects with the financial analysis has brought organisations (both privates and publics) to consider wider dimension beyond their classic spatial and time borders, developing new methods in decision-making process. In particular, the stakeholders engagement approach has highlighted how much it is important for businesses to take into account in their strategies all the needs and interests of each group and category of stakeholders, as well as to provide them values, performances and future goals of the company. In this way, organisations have begun to issue voluntary documents, which contain as more as possible useful information for their stakeholders, including management and administrative staff.

Among all the communications issued by organisations, the sustainability report is considered as one of the most indicated and used document to provide company's information about sustainability, as it contains environmental, economic and social perspectives and their respective relationships; it is a voluntary report, so that contents and structure are related to strategy and targets of companies, making reports different each other. However, the actual quality of sustainability reports has been criticised to be

not fully exhaustive, even though data are presented in monetary and not-monetary quantities, or to represent only a better image of the organisation. Reasons of this partial disclosure might come from the lack of knowledge and tools to analyse and evaluate sustainability: for example, environmental and social impacts can produce consequences in different places, outside the organisation's borders, or in the future, with a high level of uncertainty, so that it is difficult for companies to calculate a monetary return of their investment in a single period, as well as the Financial Report.

Thus, research centres, universities and education in general are now playing an important role to lead present knowledge and technologies towards that sustainable future which should give the same possibilities of present generations to the future ones. However, as indicated in this work, it is possible to note that the number of sustainability reports issued by universities or similar institutions is unusually lower than the number of those which have included sustainability concerns in their curricula; it means that reporting difficulties found by companies are more or less the same found by educational institutions, with the substantial difference of the scope between the organisations: education for university rather than profit for company. Although efforts have been made in order to create guidelines and frameworks to help companies in sustainability reporting, there are not specific guidelines focused on the structure and targets of universities; moreover, in these guidelines is not specifically included an important aspect of education institutions: the academic perspective.

The present work wants to be an incentive to help universities and higher education institutions to approach the sustainability report, which represents an effective instrument to engage stakeholders in strategic decisions and to develop the university's role inside local and international communities. The analysis carried out about the

present situation of university's disclosure will show which are the contents that institutions consider crucial to insert in their first sustainability reports and how to present them, highlighting the most common difficulties which universities run into. Then, the evaluation of Ca' Foscari's experience about its first sustainability reporting process will be described and compared with the most used guidelines, in order to create a simple procedure to incentive universities and Higher Education Institutions to approach sustainability reporting.

The structure of the present work is divided in 5 main Chapters: Chapter 1 will show the meaning of sustainable development and how the concept of sustainability has evolved in different countries and contexts; the second part of the same chapter is focused on the sustainability report: a general introduction will be followed by its motivations, contents, stakeholders engagement, main guidelines, critics and other useful information about it, especially from the point of view of enterprises and companies, as such document is well developed in this reality. Chapter 2 concerns with the relation between sustainability and education, as well as universities and Higher Education Institutions; a focus on the present situation of sustainability reports issued by these institutions has been inserted to explain in general how this report is used by universities and which improvements should still be done. Chapter 3 and Chapter 4 will present the analysis of case studies: in Chapter 3, five sustainability reports are analysed, as they are the first reports issued by five different universities from different regions of the World; findings will present the contents, the structure and other important conclusions about what is included in these reports. Chapter 4 explains the experience of Università Ca' Foscari Venezia, about the reporting process of its first report in 2011 (data of 2010); this experience represents an effective example for other universities, especially in the

Italian context, to better understand how to start the reporting procedure and to achieve the final draft of the report. Lastly, Chapter 5 will show the main conclusions of this work, with the presentation of a standard procedure for universities, highlighting which are the difficulties normally found in the process and underlining the fundamental steps which characterise the sustainability reporting by education institutions.

1. Sustainability reporting

1.1 Sustainability

The concept of "sustainable development", and its related "sustainability" term, arose in the 1980s, when the perception of the Earth as a closeted eco-system with a limited carrying capacity has driven growing attention and meaningful debate by scientific and civil society. The most frequently quoted definition of sustainable development is given by Our Common Future, better known as Brundtland Report, during the 8th Meeting of the World Commission on Environment and Development (WCED) in 1987: sustainable development, at that time, has been defined as development "... which meets the needs of the present without compromising the ability of future generations to meet their own needs" (WCED, 1987). Even though this definition can be considered as "official", it has been criticised by many authors as "concept so general that everyone can agree to it" (Davidson, 2011); as it is evident, the simple described approach does not define a practical way to achieve sustainability, as many would have wished, and therefore it is considered ambiguous and controversial. In fact, afterwards the Brundtland Report, there was no general agreement on the meaning of sustainability: different opinions, other definitions and, especially, many opposite interests to the sustainable development led to the creation of more than 100 "definitions", according to Banerjee and Bonnefous (2011), each of them underlines a specific shade of sustainability, depending exactly on the interest and view of the author. However, this "fuzziness" has been useful to spread sustainable development's debate and consensus (Bebbington and Gray, 2001). Without linger over the examination of each definition, it is necessary to mention how the concept of sustainability evolved over recently years and to examine some important points of view, starting from the criticisms raised against the WCED.

The word which won more opposite opinions (and it is still doing it) has been the meaning of "needs": as the Brundtland's definition implies, it is clear that actual needs are different from the needs of future generations, as needs of past generations are different from present needs; however, needs of past, present and future generations diverge according to countries, cultures, religions and lifestyles. Thus, development might follow the characteristics of each region where needs are similar. Then, the Earth Summit in 1992, and in particular with the institution of Agenda 21 and the Kyoto Protocol, moved the debate from the needs' concept to a "right-based" approach, linked to the neo-liberal economic agenda of the 1990s and the growing interest in economical issues, such as human and natural capital, property rights, environmental justice (Redclift, 2005). Thus, increasing public interest, Non-Governmental Organisations (NGOs) and other "green" associations have promoted the participation of economic activities in the sustainability context, stressing the damage of natural calamities caused by human activities. Moreover, to help companies to shift from "business-as-usual" modus operandi to sustainable day-by-day operations, scholars and scientific community specified different shades of sustainable development: none of them is in contrast with others, even if this production of literature has increased the confusion around the definition of sustainability, leaving the concept opened to the perception of anyone. For example, Bonn and Fisher (2011) stress the role of sustainability in decision-making process, underlying the "long-term maintenance of systems" between the interaction of environmental, economic and social aspects; Crittenden, et al. (2011),

pointed up the market-oriented sustainability, replacing the development term with consumption, which can "continue indefinitely without the degradation of natural, physical, human and intellectual capital"; Clugston and Calder (1999), instead, focused more on social justice and sustainable communities, while Farneti and Guthrie (2009), supporting the Organisation for Economic Cooperation and Development (OECD), examined the role of public sector's organisations, as they might able to better understand the "long-term perspective about the consequences of today's activities". It is also interesting to note how most literature associates different adjectives to sustainability, to highlight the specific scopes and actions related to the examined topic; for example, the Dow Jones Sustainability Group Index reports that corporate sustainability "is a business approach that creates long term shareholder value by embracing opportunities and managing risks deriving from economic, environmental

Facing the attention towards economic aspects, other reviews refer about the oxymoron "sustainable development": critics argue that renewed resources cannot grow fast enough to match the level of consumption and that they are not adequate substitutes of natural capital, especially for what has been already used and damaged. Development in a sustainable way, they continue, is only an accommodated "version of environmental protection that does not pose a threat to the current economic structures of modern industrial societies" (Davidson, 2011). However, what is not cited in many argumentations is the concept of development utilised by the Brundtland Commission: in the speech attached to the homonymous report, Mrs Brundtland refers to the environment as that place "where we all live" and development as "what we all do within that abode ... wherever man is active." (WCED, 1987). In the attempt to margin

and social developments" (Banerjee and Bonnefous, 2011).

the discussion between different points of view, a convention has been arose to define at least two types of sustainability: *weak* and *strong* sustainability; the former allows the human-made capital to compensate the non-renewed resources, such as habitats, species, eco-system functions, (...), while the latter, simply, "does not" (Gray, 2009).

1.2 Reporting

In general, it is accepted by almost all the definers that sustainable development deals with the integration of three main aspects: Environment, Economy and Society. A direct representation of these three Elements' interrelation is given by a simple system of connected circles, also known as the 3 Es (see Figure 1). From the Environmental or Ecological perspective, sustainability requires an efficient management of natural capital, taking into account that "humans are one strand in nature's web and

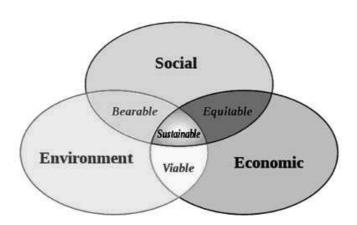


Figure 1 - A systemic perspective of sustainable development. Source: DeWeese (2009)

[consequently] all living creatures are considered equal" (DeWeese, 2009); it also requires a decisive response to climate change, in particular by reducing biodiversity

loss, pollution's production and emission of Greenhouses Gases (GHGs), by spreading and developing renewable energies in spite of non-renewable resources, and by creating the condition to avoid natural calamities (ozone hole, desertification, water scarcity, etc.). The Economical sustainability supposes that organisations assume the responsibility of the entire life-cycle of any production and consumption, accounting in their long-term economic performances every impact on the society and on the environment generated by human activities. In the Social Equity perspective (the third E of the integrated system), notions of fairness and social justice enhances the term of sustainability: it embodies different values, such as gender equality, reduction of poverty and hunger rates at global dimension, universal education at least at primary school level, health conditions versus contagious diseases (Jucker, 2002; Scîntee and Galan, 2005; Bonn and Fisher, 2011).

Some author prefers to integrate these three pillars with other specifications: for example, Jucker (2002) inserts the key element of empowerment, arguing that self-determination of affected people is a decisive way to avoid that "somebody else ... determine[s], for example, the resource's use of a given population". Interesting is also the analysis of Milne (1996), who, focusing on the dimension of time, created a complex but efficient scheme to help economists in decision—making process, with a broader perspective.

In essence, sustainability is a manifold concept that requires a fundamental re-think about human lifestyles, likely "unsustainables", using an integrated approach since the beginning of every single decision-making process: Environment, Economy and Society, and their respective interrelationships, are the actual focus of scientific,

political and social community, with the main object to increase the spreading of sustainable day-actions to as more as possible organisations and people.

Nowadays, the most diffused worldwide economic discipline that organisations are following in their operational processes is based on the principles of capitalism. Simplifying the assumptions of the concept¹, the development which apparently allows economic growth is driven by rational actors who "move funds from less economically desirable ends towards more economically desirable ends", according to "rational" economic information published by organisations (Gray, 2006). The main way to communicate these information is throughout the Financial Report, a document issued at least once per year by each company, which contains the financial performances achieved during the examined period, together with a brief analysis to motivate the results produced and to determine some main objects for the next period. In an elegant similarity, financial report (or annual report) may be seen as a business card of the company, from which it is possible to design a quick and comprehensive picture of the firm. However, this is not fully explanatory: as business card says few things about the person behind it, financial report can provide stakeholders superficial information about the organisation (Daub, 2007) or, even worst, disguise the true conditions of the company. In fact, many companies are used to present in their financial reports an optimistic condition of the organisation and it is difficult to understand through it the real situation in which the company is working.

In the 90s, with the increasing public awareness in sustainable development, companies have gradually taken into account both environmental and social aspects in their

_

¹ For the purposes of this work, it can be complicated and rambling to analyse capitalism economy's theories in all their aspects. It is more important to address the link between the economic approach to the concept of development and compare it to the integrated elements of sustainable development. For further and detailed analysis on capitalism assumptions and implications see Gray (2006)

accountability, despite there was a lack of knowledge in the accountability system, which did not allow companies to consider detailed methodologies or principles to measure environmental and social impacts in monetary terms. In fact, there are natural goods that it is hard, probably not possible, to impute them a monetary value, because they are public goods (common goods), so that everyone can give them a different value based on own perception, or because they cause impacts in a period far away, so that it is impossible to calculate a significant return and count it in a statement report, made for just one year. Thus, at the beginning, companies introduced environmental and social aspects inside their financial reports, using the same principles of the financial dimension. This happened especially in firms who did not (and still do not) want to be involved in the publication of a different and specific document for environmental and/or social impacts; it is also a practise used by those companies that are worried only to underline their approach to "eco-efficiency" processes of resource's management. Moreover, another important point to remind here is that financial reports, without environmental and social considerations, are regulated by States' laws all over the World, in the attempt to "permit the allegedly desirable mechanisms of liberal economic democracy to function" (Gray, 2006).

Documents that are apart from the financial report are called properly Social Report and Environmental Report. The former appeared in response to 1970s demands on measure social dimension, which takes into account social aspects of company's activities. One of the first countries to develop the social report has been France, which made law the *bilan social* in 1977, related to enterprises with 300 or more employees (Eurofound, 2009); following France, other countries, especially in Europe, enhanced the adoption

of the "Corporate Annual Report", such as German-speaking countries, where the German Trades Union Federation (DGB) created in 1979 a catalogue of 10 points, most of them borrowed from France, as minimum recommendations (Daub, 2007). However, it is necessary to mention that social report is a voluntary document in most countries and often it has been issued by company without a frequent deadline. The latter, instead, quickly became widespread in the 90s and still deals specifically with the environmental status of companies. It focuses on environmental impacts, risks, strategies, costs, performances, policies, targets, etc. of a specific firm. As social report, environmental report is not mandatory, but the growing attention and sensibility of markets towards environmental protection spurred companies on certify the quality of their products or their production processes, throughout international certifications, like ISO 14000 and SA 8000 certifications, or institutionalised systems, like the European Eco-labels and Eco-Management and Audit Scheme (EMAS) (Rossi, 2008). These certifications and other sort of regulations are not binding companies to publish separate documents from the financial statement, but they are only an indirect stimulus or a loud encouragement from governmental institutions. Table 1 offers an overview, for a range of countries, about the attempt from some regulators to improve the sustainability issues in their reporting's process, creating a form of standardisation for company's disclosure.

Table 1: Overview of government sustainability reporting requirements and explicit encouragement. Source: Kolk (2005); adapted and partially updated with II Sole 24 Ore Radiocor (2010) and Pahuja (2009).

Country/region	Reporting Legislation
Australia	Reporting on environmental issues in annual report (1999), plus subsequent extensions to social issues related to (financial) products
Denmark	- Publication of environmental report at the site level (1996)
	- Reporting on environmental issues in annual report (2001)
Netherlands	Publication of environmental report at site level (1999)

² The Italian « Bilancio Sociale »

12

Spain	Reporting on environmental issues in annual report (1998)
Norway	Reporting on environmental issues in annual report (1999)
Sweden	- Reporting on environmental issues at site level (1990)
	- Reporting on environmental issues in annual report (1999)
France	Reporting on environmental and social issues in annual report (2002)
Belgium	Only in Flemish part: publication of environmental report at site level (1996)
UK	Review of company law in the direction of requirement to publish a statutory operating and financial review that includes environmental and social issues
China	Environmental Report for participated companies (2010)
Country/region	Government encouragement
Germany	Explicit support for EMAS
Austria	Support for EMAS
UK	Threats and appeal to publish environmental reports
	Environmental reporting guidelines (Department of Environment)
EU	EMAS
	Recommendation on environmental and social disclosure in annual reports
	Initiatives to encourage sustainability reporting
Japan	Guideline for environmental reporting (Ministry of the Environment)
	Guideline for environmental performance indicators (Ministry of the Environment)
	Environmental accounting guidebooks (Ministry of the Environment)
	Environmental reporting guidelines (Ministry of Economy, Trade and Industry)
USA	Reporting on environmental issues to EPA and to Securities and Exchange Commission

The general trend, developed in particular in the last two decades, is to incorporate environmental and social reports in a single document, albeit to divide the financial management from the other two dimensions can give stakeholders a partial and not integrated vision of the company's performances. Thus, the most inflated term of sustainability began to appear as title of companies' reports, where the three aspects of Economy, Environment and Society are taken into account in a single report.

1.3 Sustainability Report

As sustainability has been defined in different ways, also for these reports there is no a single and universally accepted definition; here some of the most cited:

- "Sustainability reporting is the practice of measuring, disclosing, and being accountable to internal and external stakeholders for organisational performance towards the goal of sustainable development" (GRI, 2011);
- "... public reports by companies to provide internal and external stakeholders with a picture of the corporate position and activities on economic, environmental and social dimension" (WBCSD, 2002);
- "It is a broad term used to describe a company's reporting on its economic, environmental and social performance" (KPMG, 2008).

From these definitions it is possible to outline some important points. First, as already said, sustainability reports contain the three dimensions of sustainable development, that are environmental, economic and social aspects. Second, reports are specifically addressed to a particular and heterogeneous audience: "internal and external stakeholders" is only a compact expression to include a wide range of people, organisations and associations who are interested in strategies and performances of the company (stakeholders engagement will be carefully examined later). Third, even not included in the cited definitions, sustainability report is a document issued *voluntarily* by organisation; this characteristic implied a surge of guidelines and frameworks to create a sort of standardisation against the lack of detailed legislations; also motivations which drive organisations to issue sustainability report will be showed later. Fourth, sustainability report is a "broad" term: it is often possible to find in many texts

sustainability reporting used as synonymous of environmental reports, sustainability accounting, triple bottom line or integrated accounting. However, each of these terms mean a different process and purpose about how and which kinds of information companies want to provide their stakeholders: environmental reports should concern only with the environmental impact of organisations, while the concept of report is an evolution of accounting principles, different from the Triple Bottom Line. The phrase "Triple Bottom Line" (TBL) has been coined by John Elkington in 1997, in the attempt to underline that organisations are not only economic entities, but they also have to consider environmental and social impacts (and performances) of their activities, "working away from a single (financial) bottom line" (Gray and Milne, 2002). The method developed in TBL, in its primary configuration, is to use the same principles of the financial statement. Reminding the comparison between financial reports and business cards, it is obvious how the TBL cannot be effectively a TBL, but only a "financial bottom line with a little bit of social and environmental added" (Gray and Milne, 2002). Moreover, the concept of financial statement follows the principle of the balance sheet, where activities and liabilities are opposed in two different sides; instead, sustainability report is a volunteer document, which can have a free structure and can contain both quantitative and qualitative, monetary and non-monetary data (Mio, 2001). Even prominent organisations often associate words like "reporting" "accountability", or consider synonymous sustainability report and TBL, such as KPMG and GRI. It is nevertheless true that the purpose of these organizations is different from define an univocal terminology about company's disclosure: the main object is to enhance companies to take into account environmental and social dimensions, as well as the financial one, providing stakeholders with a transparent picture of business strategies, performances and operations.

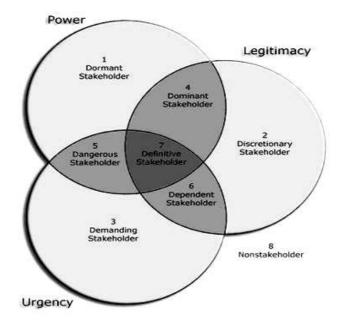
In essence, the sustainability report has a bigger value than the annual report: it has seen not anymore like a "business card", but as a strategic report, through which companies create a narrower connection between their activities and the interest of their stakeholders, including the strategic decision-making processes in environmental and social aspects. In particular, it should contain a presentation of the company, with core values, vision and corporate governance; all the relevant elements of sustainability should be reported both on separate and integrated basis, with a special focus on challenges and opportunities that sustainable development can bring to the business and to the industry sector; public policy positions, risk management procedures and governance commitment should also be part of the report, where stakeholders can become fully engaged (ACCA, 2005).

The stakeholder engagement represents a fundamental step in sustainability reporting: the aim of reports, in general, is to show the results, produced by an activity or an investment, to subjects that are not involved in the management and to the same management group, in order to improve such results towards new targets. In the case of sustainability reports, subjects who are not directly involved in the business' management are becoming bigger, due to the widespread interest towards sustainability issues. Without any pretension to list all the possible stakeholders, the main groups are represented by employees and trade unions, shareholders and investors, customers and suppliers, local and international communities and governments, regulatory bodies and analysts, Non-Governmental Organisations (NGOs) and business/social associations (KPMG, 2008). Each of them is considered by organisations in different way,

depending on the power of influence (and thus the importance) on the strategy and on the activity of the company. Even managers of the same company can be considered as part of stakeholders, because, as it will be showed later by Bowers (2010), they can improve the concept of sustainability inside the organisations and the strategies for future targets. Thus, as stakeholders are numerous and heterogeneous, literature tried to identify systems to select and catalogue them in groups with similar characteristics, in order to better understand the needs and the influence on the organisation. Starting with the simple subdivision in internal and external stakeholders, Banerjee and Bonnefous (2011) have proposed three groups, depending on the power to influence company policies; groups are listed as follows:

- *supportive* stakeholders: they agree with the vision and the mission of the company and, then, they support the management to continue in the direction taken;
- *obstructive* stakeholders: they totally disagree with the activities of the company and they are ready to obstacle every single decision;
- *passive* stakeholders: this group consider those stakeholders who do not represent a strong support or obstacle to the strategies of the company; they provide, in a sense, tacit support to the mission of the organisation.

Quaddus and Siddique (2011), instead, propose a more complex analysis, based on three main attributes, and divide stakeholders in eight different groups. The main attributes are represented by a) the power of stakeholders to influence the company, b) the legitimacy of the relationship between stakeholders and company, and c) the urgency of stakeholders' claim. The interconnections between the attributes create the different categories, as showed in Figure 2. The analysis then focus on 4 classes: stakeholders



marked with numbers 1, 2 and 3 have only one of the attributes and their salience for the company is low; numbers 4, 5 and 6 are stakeholders with two attributes and so they receive more attention than the others; definitive stakeholders (number 7) receive the highest salience from the organizations, because they are the primary group which has all the three attributes; lastly, "nonstakeholders" (number 8) represent the group of those who don't have a specific attribute and thus don't have any kind of interest in the activities of the company. However, it is necessary to consider that "stakeholder relationships are always dynamic because the attributes power, legitimacy and urgency change over time" (Quaddus and Siddique, 2011).

Even though the pressure from the stakeholder engagement can be a strong justification for companies to begin to disclose their strategies, there are many other reasons which give them motivations for initiating sustainability reporting: many authors, in the attempt to foster other organisations, have conducted different analysis on the experience of organisations who adopted since many years the sustainability report as a

key element of their strategies. For example, Bebbington, Higgins and Frame (2009) tested the "institutional theory framework" on a sample of New Zealand Business Council for Sustainable Development (NZBCSD) members, to show that "a wide range of regulative, normative and cognitive influences are contributing to the institutionalisation of sustainability reports". They focused their attentions on the role of public institutions, in particular in New Zealand, as they are considered as those stakeholders who can bring the highest level of pressure (and influence) on companies, understanding, however, that the process behind the managerial decision-making to report "sustainability" performance depends on a number of organisational dynamics (Bebbington, Higgins and Frame, 2009). Buhr (2002), instead, used a different theory to motivate the company's disclosure: in his study, based on two large Canadian pulp and paper companies, the "structuration theory" has been used to show that "structures are in place to ensure that companies reveal their financial performance [and] they do spill over into the environmental area, [to] dictate a minimal amount of disclosure"; environmental reports alone can be used also to pursue a "symbolic legitimation strategy", while structures are the base on which the report can indicate a genuine effort to present changes in both performance and communication (Buhr, 2002).

Another disclosure's point is presented by Bowers (2010); his interesting analysis shows which are the differences between the most recent sustainability report of 10 global companies and an earlier version of the same organisations. While in their early reports companies tried to align sustainability with economic opportunities, in their more recent reports the main focus is on social and environmental performance aligned with economic themes: it is possible to notice an "increasing reporting of initiatives designed to develop environmentally and socially responsible products that can increase

revenue and market share" (Bowers, 2010). The achieved results proved a better understanding about the meaning of sustainability by companies and how environmental and social problems can be translated in valuable opportunities, bringing a substantial competitive advantage in their business.

Again, other authors present only a list of motivations. For example, Adams and Frost (2008) conducted a survey on the development of Key Performance Indicators (KPIs) in planning and performance management. Their interviews, with personnel of four British and three Australian companies, found main reasons of company's disclosure as follows:

- high impact nature of their operations on the environment;
- to be accountable to, and build trust with, key stakeholders such as NGOs and local communities
- privatisation and resulting competition
- to influence business leaders and key opinion formers
- differentiating themselves from competitors with a view to increasing market share and improving profitability
- following competitors
- influence of tools such as GRI Guidelines.

Daub (2007) showed how the institutional power might represent an incentive, influencing negatively the annual revenue: sustainability reports has seen also as a good instrument for the attempt to reduce potential costs of future regulations and the threat of sanctions on sustainability issues, by adopting a pro-active approach. Bebbington and Gray (2001) considered costs and benefits to produce the report and they provided a series of studies and researches which show that companies can obtain higher benefits: to mention one of them, costs arising from data collection and primarily negative impacts on share prices are lower than benefits produced by reduction in perceived risk

and "political" perception of government and other stakeholders. However, they remind "that disclosure depends, primarily, upon the culture of the company" (Bebbington and Gray, 2001).

Finally, particular incentives are provided by those associations who have developed tools which help organisations to understand the meaning of sustainability, the environmental and social dimension inside their activities and the material to include into the sustainability report. Following the disarray examined for sustainability and sustainability reports, it is not a surprise to count (in 2007) over 50 online software companies in Europe and in USA who offer data management services for sustainability reporting (Brown, Jong and Levy, 2009): it seems like a creation of a new market, or separate industry, for accounting systems besides the traditional one for the financial statement.

In 1989, following the Exxon Valdez oil spill, the Coalition for Environmentally Responsible Economies (CERES) has been founded, with the attempt to provide companies with sustainability "codes of conduct". Since the CERES Principles (10 points), numerous and popular codes and frameworks have been developed by national and international institutions, individual companies, business associations and intergovernmental organisations, such as OECD, UN Global Compact, GRI, ILO, KPMG, FEE, ACCA, etc.

One of the most quoted and well-known organisation is the Global Reporting Initiative (GRI). Conceived by the Boston department of CERES, GRI has been founded in 1998 and became an independent institution in 2002; since 1999 it is officially collaborating

with the centre of the United Nations Environment Programme (UNEP) and its mission is to develop and to disseminate globally applicable sustainability reporting guidelines³. Managing worldwide both mandatory and voluntary reporting commitments, the organisational structure of GRI is designed to enhance the multi-stakeholder process: in fact, the Stakeholder Council, its parliamentary body, is composed by 50 members which come from NGOs, social associations, industry directors and consultants from all over the World. The first guidelines (G1) has been published in 2000 and the last one (G3.1), has been issued in 2010, as en evolution of the previous one (G3).

The GRI Framework consists of a set of guidelines for sustainability reporting, which indentify principles and performance indicators common to all organisations. These indicators are divided in the three aspects of sustainability (Economy, Environment and Society), with a larger focus on Society in the last guideline, as implementation of the previous frameworks. Moreover, GRI provides a standard disclosure, which should fit with all the organisations, and separate supplements, which contains other information that are important for specific sectors not fully reflected in the guidelines (Pineno, 2011), for example the recent supplement specifically addressed to the public sector. Small and medium size enterprises (SMEs) have a really small part inside the GRI field, too. This is partially due to the original decisions taken by GRI founders, who focused all their energies on the participation of large international businesses (Brown, Jong and Levy, 2009). Since its foundation, there has been the hope that implementing the GRI multi-stakeholder process would facilitate the diffusion of the GRI principles and practices into the broader field of Corporate Social Responsibility (CSR). In 2010, as showed in Figure 3, around 1,800 reports have been voluntarily adopted the GRI

³ http://www.globalreporting.org/AboutGRI/WhatIsGRI/History/

guidelines, with a constant growth since the foundation, to demonstrate that a lot of work and incentive should be done.

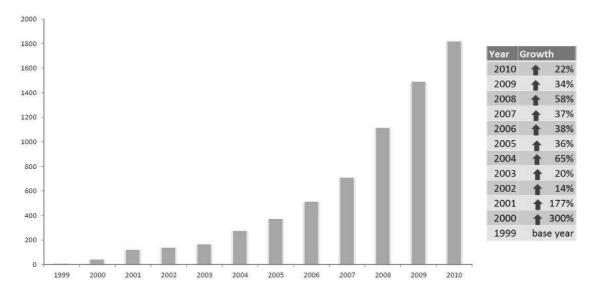


Figure 3: GRI reports from 1999 to 2010, with indication of % growth. Source GRI (2010).

So far, it is true that companies have issued their sustainability reports, but literature did not get away the opportunity to compare them with the theory, advancing some constructive criticisms. Contents, structure of the document, reasons to publish, quality of data and, in general, each part of the report have been analysed to evaluate whether current reports are really sustainability reports or documents which look like them. At the same time it is also true that the freedom rate included in reporting leaves companies the decision of how and which information provide in their reports. Starting from the different interpretation of sustainability, every company can proclaim itself to be responsible of its actions (Ball and Osborne, 2011), or, simply, provide a positive picture of its performance, highlighting what it is doing only with reference to sustainability issues. Davidson (2011) reminds "the notion that the value of any resource lies in its monetary worth" under the neoliberal concept of sustainable development; from his point of view, indicators do not have to be interpreted only in a

financial way: the addition of quality and non-monetary indicators should improve the comprehension of projects and performances. Motivations and stakeholders engagement (important parts of the reporting process) might entail negative consequences, especially when there are not right targets in the managerial decisions: pressures from internal and external parties may lead companies to issue sustainability report in order to achieve the resulting perceived opportunity, such as political, reputational and market opportunities (Burritt and Schaltegger, 2010); reports addressed mainly to the same management should be considered as internal documents and not real sustainability reports (Kolk, 2008), which focus more to stakeholders who do not have to power to control internal decisions. Lastly, as mention above, it is difficult to analyse the true impact of each action of companies, because it requires an evaluation that it is not achievable by each organisation and with present analysis tools.

In conclusion, as other many authors have been underlining since many years, sustainability report should contains as much as possible significant information, in order not only to communicate performances to stakeholders, but in the way this process can improve and spread a better sensitivity and knowledge of what is really sustainability, reminding the "official" definition of the WCED: meet the needs of the present without compromising the ability of future generations to meet their own needs.

2. Universities and Higher Education Institutions (HEIs)

2.1 Education and sustainability

Nowadays, the sustainability concept is embodied as general principle in most of all human activities and it influences decisions and operations in the private sector as well as in the social and public system. As seen, sustainability's debate is dealing especially with economic



organisations, given that they are considered as the primarily responsible for pollution, global warming and unsustainable human lifestyles. However, sustainable development

does not concern only with these activities: other important players of the debate are noprofit organisations, social associations and the public sector. In particular, a key role is

played by education: from early childhood schools to Higher Education Institutions

(HEIs), present and new generations can learn the current knowledge, discover and

experiment new theories, improve the quality of human lifestyles and engage

communities towards sustainable future. Education is considered by Nelson Mandela as

"the most powerful weapon which you can use to change the world" (UNESCO,

2011a). Institutions such as universities and HEIs represent the connection between

students and firms, researchers and community, as they educate new decision-makers

and because they are centres of innovation, research and development, problem solving

and community linkages.

Since the 1970s, in order to increase international actions and initiatives on proposed themes, United Nations dedicates a period of ten years to specific critical global

concerns, such as poverty, rural regions, water, transport and communications, etc. (UN, 2011). Given the role of education, the UN General Assembly in December 2002 declared the period 2005-2014 as the "Decade of Education for Sustainable Development" (DESD), recognising education as a "human right and primary agent of transformation towards sustainable development" (Brandon and Lombardi, 2005). The basic vision of the DESD is to give the opportunity to everybody to learn values, behaviour and lifestyles for a sustainable future; four main objectives are developed (Calder, 2005):

- create interaction, exchanges and connections among stakeholders in Education for Sustainable Development (ESD), increasing public understanding and awareness of sustainability;
- 2. increase quality of teaching and learning of ESD and spread it to all citizens;
- 3. help countries to attain Millennium Development Goals (MDGs) through ESD efforts;
- 4. incorporate sustainability into education reforms and educational programs, providing also training in private and public sector.

The United Nations' DESD is supported also by a series of declarations, developed in international meetings and summits between presidents, rectors, chancellors and other representatives of universities and HEIs from many countries of the World. These declarations, summarised in Table 2, are an efficient example to show how the debate of sustainable education has been developed by university context. Usually, attention is turned to the role played by university's management or to the community's role; some declarations have detailed actions to adopt inside university processes, while others

have more summarised concepts; in almost each of them, are presented steps achieved and next objectives for the future.

The most cited declaration is the Talloires Declaration, made in 1990 when twenty-three presidents and chancellors met in Talloires (France) to analyse the "state of the World"

Table 1: Higher education Declarations with international culture of sustainability. Sources: Jones, Selby and Sterling (2010); The G8 University Summit (2008); Vogt (2009).

Declaration	Contents
Tbilisi – 1977	Developed by the UNESCO/UNEP Intergovernmental Conference on Environmental Education; first declaration about holistic approach to the environment within higher education; it enhances sustainability initiatives among faculty, students and support staff
Talloires – 1990	Engagement of university heads mobilize university resources to respond the urgent challenge; involvement of as more universities as possible; sustainability as obligation to be implemented inside HEIs
Halifax – 1991	Focused more on Canadian universities; current leadership role may play serious risks for the environment: university communities must contribute to sustainable development; geographical scale: local, national and international level
Kyoto – 1993	Closed to Agenda 21; clear vision of how to achieve sustainability within universities; sustainable development as a practical implication, even in physical operations of universities
Swansea – 1993	Social approach and parameters; evident differences between richer countries and less wealthy nations; programs for well-being universities to help less developed countries
Thessaloniki – 1997	Involvement of all levels of society (students, employees, local and international communities); interdisciplinary nature of sustainability concept: poverty, population, human rights, health, cultures
Lüneburg – 2001	Made as a preparatory document for Johannesburg 2002 meeting; review of past declarations and the problems encountered on them; endorsement and implementation of previous declarations
Ubuntu – 2002	Emphasis on science, technology and education combined together for sustainable development
Graz – 2003	Focused on European Universities; it follows the Bologna Process; incentives to institutions to apply COPERNICUS framework; policy framework for the period before the DESD
Sapporo – 2008	Role and responsibility of universities to contribute sustainability; specific actions to undertake that responsibility

from an educational point of view and to indicate university's key actions to develop a sustainable future. In fact, although it is not the first declaration on environmental education, its importance is due to its binding characteristic for subscribers: the

adoption of the "ten point action plan" is voluntary, but once institutions sign it, they are bound to observe those points in their activities. So far, more than 400 universities from more than 50 countries signed it, spreading sustainable development in their systems, programs and communities (ULSF, 2011). The ten points in the Talloires Declaration are the following:

- 1. increase awareness of environmentally sustainable development
- 2. create an institutional culture of sustainability
- 3. educate for environmentally responsible citizenship
- 4. foster environmental literacy for all
- 5. practice institutional ecology
- 6. involve all stakeholders
- 7. collaborate for interdisciplinary approaches
- 8. enhance capacity of primary and secondary schools
- 9. broaden service and outreach nationally and internationally
- 10. maintain the movement. (Tuft European Center, 1990)

Following declarations have been mainly based on these ten points, so that it is possible to consider them as a starting point for HEIs who want to include sustainable development in their activities for the first time and, after, to develop an internal and more appropriate awareness of sustainability. Many other further practical steps have been taken and analysed inside the university context, with the contribution of different institutions and organisations, such as, for example, the association of University Leaders for a Sustainable Future (ULSF)⁴, founded in 1992 after the Talloires Declaration, and the European University Association (EUA)⁵, established in 2001 to support European universities' activities through specific targets aimed to build a strong Europe.

1

⁴ www.ulsf.org

⁵ www.eua.be

Over the years, the product of these associations has concurred to specify in detail the sustainability concept within the university and to take note of the value that their activities produce for sustainable future.

Before the DESD, in 1992 Rio de Janeiro's conference, United Nations established Agenda 21, an action programme which links global, national and local plans about every human activity which impacts on the environment. Even Agenda 21 considers the key role of education as "critical for promoting sustainable development and improving the capacity of people to address environmental and development issues" (Jones, Selby and Sterling, 2010).

To point out sustainability within HEIs, Filho (2009) re-defines it as the promotion, the practical collaboration, the cross discipline problem solving and the community involvement into sustainable culture in all decision making, starting from university staff. The engagement of internal and external stakeholders is a fundamental step in the decision-making process of HEIs, as well as for private and public economic organisations. Universities are (and need to be) strictly connected with people and communities where they have been placed: engage in partnership with or listen to the needs of the community is a better solution rather than a top-down or a prescriptive approach. This "moral vision" can give HEIs the opportunity to achieve eminence without losing sense of place, roots and commitment of local community which they serve (Smith and Stephens, 2003). The link between universities and communities is also analysed by the work of Trani and Holsworth (2010), in which they studied the economic development of different regions generated by "indispensable" universities' activities. Examples come from Richmond in Virginia, North Caroline and China, where, especially in the latter, it is dominant the advantages brought by their "social

capital" resources. Moreover, this community engagement's process can create competitive knowledge, recognised also by communities themselves and government's leaders, who, the latter, press university's managers to assume responsibilities in development-based strategy of their surrounding neighbourhoods, at local, regional and national level. This pressure, when it is well managed, can produce great results for the economic development: it has been evident in the Irish Celtic Tiger period, when government policies and supportive academic climate enabled Ireland to make significant progress within the global economic structure, with a remarkable increase of the Irish GDP (Trani and Holsworth, 2010).

Inside the structure of Higher Education Institutions, two figures may be fundamental to spread sustainability concept at decisional levels: university leader and sustainability's responsible. About the former, there are different titles in each country to name it, such as president, chancellor and rector; in this case, these titles are used to indicate the role of the highest representative power which can (directly or indirectly) influence or take decision together with the administration organ. In fact, even though the administration structure of Higher Education Institutions is based on a collegial decision-making organ (Sammalisto and Arvidsson, 2005), it is possible to associate the president of an university to the Chief Executive Officer (CEO) of business companies. This paragon is notable also into the Italian university system, especially through a current slow process that makes Italian universities more autonomous from the State, complying with the international model. For years, president's role has played the function of a symbol about decisions and priorities taken by the collegial administration organ, while, in the last years, this ongoing process is modelled more on the role played by corporations' leadership, allowing the same presidents to define mission and resource's allocation of

the university (Trani and Holsworth, 2010). In this way, careerist administrators can undermine the principle of collegiality and be far from the traditional tasks for the "good of the institution", but, on the other hand, they can enhance a competitive behaviour between national and international HEIs, in a positive or negative perspective. Another problem connected to university leader's role is analysed by Del Sordo and Orelli (2008): based on Italian universities, their study shows that "modern costing tools are at an initial stage of experimental study", mainly because of management authorities, who are not used to "act in terms of goals and results". This means that there is the possibility that presidents, without the support of the collegial organ, may not have the knowledge and the managerial accounting tools to gather, and then evaluate, performances between the different levels of a complex structure as university, bringing it towards wrong directions. The latter figure, indicated as "sustainability's responsible" by Arcani and Grasso (n.d.), is a new role that Higher Education Institutions are adopting in the last years in a growing trend. Close the topadministration, its duties are to enhance a sustainable governance, to be a landmark for internal and external stakeholders, to account sustainable impacts of the institution, to promote sustainable projects and, sometimes, to maintain the principle of collegiality, against the emergence of careerist administrators. Usually, the responsible for sustainability is a single person, nominated by the administration, among the professors and collaborators inside the institution; in addition, it could be an independent office inside the organisational structure, or, sometimes, it is represented by an external organisation, created by two or more universities, with the specific tasks to be the centre of research and development of sustainability issues.

The increasing internationalisation and globalisation of economic activities, transports and communications made Higher Education Institutions accountable not anymore to their own country's stakeholders, but also to "international community at large" (Stensaker and Harvey, 2011), such as students and professors who participate to exchange programs all around the World, creating strategic partnerships between universities, countries and local firms. An international growing phenomenon is to compare performances of educational institutions, making an ordered list based on established indicators. Rose in the Anglo-Saxon context, to compare first public administration and then higher education sector, rankings grew due to the increasing cross-border supply and demand on professional education; they represent an effective tool to help students and families to choose and compare universities, their values and their training offers. Moreover, the prestige associated with the highest places in rankings has led universities to emphasise the competitive aspect of this instrument, so much as there is not only one official international ranking, but there exist many of them, based on different indicators produced by respective authors and promoters. In fact, each research institution (newspapers too) has chosen specific indicators to show or select determinate aspects and results to compare universities worldwide. It is possible, thus, to find the same university in different places, according to each rank. In the following list, among some of the most cited ranking, two institutions have been used to show the different ranks in each classification: Harvard University and the Massachusetts Institute of Technology, MIT:

Academic Ranking of World Universities (ARWU)⁶: drawn by The Institute of Higher Education of Shanghai Jiao Tong University, it compares the first 500

6 www.arwu.org

universities in the world; in the latest ranking (2011), Harvard University is at the first place, while MIT ranks third

- The Times Higher Education Supplement World University Rankings ⁷; promoted by the Times Higher Education (THE) Supplement, it compares the top 400 universities in the world; in the 2011-2010 report, Harvard University has second place, together with Stanford University, while MIT is classified in seventh place
- Leiden Ranking⁸; drawn by the Center for Science and Technology Studies (CWTS) of Leiden University (Netherland), it compares the first 500 universities in the world; in the 2011-2012 ranking, Harvard University ranks third, while MIT has the first place.

Many other countries have their own national and international ranking for universities and HEIs: on the webpage of Higher Education Evaluation & Accreditation Council of Taiwan (HEEACT, 2008) it is possible to see a list of ranking organisations, including the Italian "La Repubblica-Censis" ranking⁹.

The parameters considered by these rankings deal with education, research and cited documents, international degree of institutions, relations between students and teachers, etc.; as it is possible to note, sustainable indicators have not been inserted yet and thus these classifications need to be updated with environmental and social performance indicators. Sustainability, as Filho (2009) indicates, should be taken into account into seven critical dimensions: some of them are already considered by current rankings, like curriculum, research & scholarship, student opportunities, and outreach & services,

_

⁷ www.timeshighereducation.co.uk/world-university-rankings/

⁸ www.leidenranking.com

⁹ The correct link for the cited ranking is http://temi.repubblica.it/guide-universita-2011/ for 2011-2012. Further detail about university rankings and their methodology to classify and order universities are explained in Checchi et al. (2008)

while the others still need to be evaluated (institutional mission, structure & planning, operations, faculty and staff hiring, development & rewards). In other words, HEIs should provide sustainable education by "practicing what they teach" (Jones, Selby and Sterling, 2010), integrating with practice the three fundamental dimensions of universities: learning and teaching; research; internal and external social responsibility.

2.2 Sustainability reporting in University

Sustainability report, seen in Chapter 1, can be applied also to universities, as the document which can provide stakeholders with economic, environmental and social performances and targets of Higher Education Institutions. Classifications, rankings and comparisons may be easier when all information about the university, such as structure, culture, targets, results, stakeholders engagement, etc., are summarised in a single document, as the sustainable report. However, its worldwide application is not well developed, as said before, and a small number of universities are issuing this document, albeit such number is increasing year by year. For example, the stress generated by many authors to address the attention on such themes is producing its effects: in Italy, the number of universities who publish social reports has doubled from 2008 to 2009 (Del Sordo et al., 2009).

As for all private and public economic organisations, sustainable reporting is a voluntary act and there is not a standard and binding way to present information. Guidelines and accounting tools are presented and analysed by several associations and authors, but they stand for a smaller number than the guidelines which help economic

organisations. GRI Framework, for example, has integrated in its last version (G3.1) numerous social indicators, previously dedicated only to the public administration

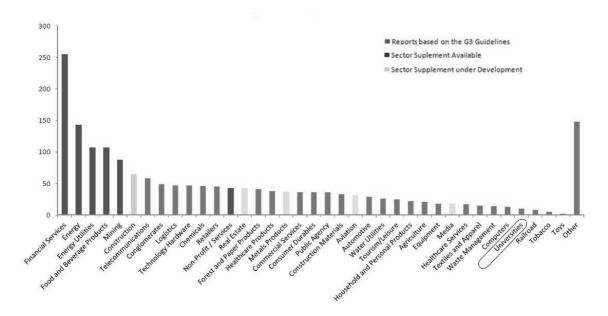


Figure 1: GRI reports divided by sector. Source: GRI (2010), adapted.

sector. Difficulties to include university system in the GRI framework are presented by the complex characteristics of education institutions' structure and the interdisciplinary analysis that sustainability reporting requires among activities and operational processes. This complexity set up difficulties also for the other assessment tools. As showed in Figure 4, the number of universities that published sustainability reports according to the GRI Framework is less than 30 and the sector is one of the last as number of contributions.

An attempt to integrate the GRI framework with the analysis of university's core competence (education) has been made by Lozano (2011), who created the Graphical Assessment of Sustainability in Universities (GASU) tool, which allows an easier manner to show sustainability performance. The GASU tool is based on GRI 2002 guidelines and it includes other 30 indicators about the additional educational dimension. His analysis, conducted on 12 universities from different countries,

concludes that the GASU tool can be improved (probably using the latest version of GRI guidelines), while the results show that universities are currently focused more on economic and environmental dimensions. The same conclusion is achieved by Sammalisto and Arvidsson (2005)'s study, based on the analysis of Swedish universities: the governmental incentives to issue documents like the sustainability report enhanced universities to focus more on the environmental dimension, rather than social aspects, in particular thanks to the Environmental Management System and the ISO 14001 certification. A different result, instead, is showed by Del Sordo et al. (2009)'s analysis, which compares Italian Corporate Annual Reports: these documents take into account managerial issues, especially related to research and teaching activities; few reports are related to social aspects and even less to environmental dimension.

As well as GRI framework and GASU tool, other sustainability assessment tools have been developed: Shriberg (2002) presented a table which compares strengths and weaknesses of eleven different cross-institutional sustainability assessments, such as "Sustainability Assessment Questionnaire", "Campus Ecology" and "Grey Pinstripes with Green Ties". The main focus of these assessment tools is addressed to those indicators which can allow a sustainable analysis of university's campus, as it represents the physical space and people community where all the university activities take place. Shriberg does not want to establish whether there is a better or worst tool than others: he only analyses them, leaving the responsibility to each Higher Education Institution, to choose the most appropriated instrument according to the development of sustainability concept within the current operational activities, and with the possibility to change it when conditions are different.

So far, sustainability reporting in universities has been studied by several authors (some of them have been already cited; fur further analysis, see Fonseca, Macdonald, Dandy and Valenti, 2011; Litten, 2005; Pineno, 2011; Arcari and Grasso, n.d.). Analysis take into account different aspects of the relation between university system and sustainability report, depending on the study carried out; nevertheless, it is possible to note the following as the main considered variables: current state of sustainable reports in specific areas or countries or, in general, at international level; information that HEIs decide to disclose; performances of institutions; quality and improvements of reports; engagement of communities and relations with other universities. These studies show that there are lot of improvements that could be implemented: for example, number of involved universities in reporting sustainability has to increase, contents and quality of disclosed data can be improved, the three dimensions of sustainability (environment, society and economy) need to have the proportional attention they require.

In conclusion, it is evident the role of education for sustainable development through Higher Education Institutions, where education is a basic step in order to research, experiment, develop and apply the sustainable future. However, "it is an illusion thinking that education will solve all our problems" (Jucker, 2002): universities themselves have to put in action every single steps that it is possible to do, beginning through the introduction of sustainable curriculums and programs. Then, processes like "learning organisations" (Cortese, 2003) and the implementation of sustainability projects (Brunetti, Petrell and Sawada, 2003) should help universities to better understand the meaning of sustainability and to spread sustainable culture in all the operational activities, strategies and decision-making processes. It is important to remind how HEIs are called today to practice what they teach, creating places for

present generations, such as campus and communities, where it is possible to learn, research, experiment and monitor new paradigms for business opportunities and behaviours (Brandon and Lombardi, 2005).

3. Case studies

Among the many instruments of communication, Internet seems to be one of the most used by organisations to supply information to their stakeholders: the rate of speed through which information can flow around the World, free access, free consultation and, many times, free download of documents and knowledge, account Internet as the most suitable instrument to spread initiatives, programs, researches and achievements, also for sustainability issues. Besides companies, the Web is also used by HEIs to reach students, staffs and other stakeholders to provide them all the information related to the institutions and the academic offer, as well as sustainable topics. In fact, surfing the Network, it is possible to find many university's websites with sections or links dedicated to actions, plans and documents adopted by the institution and related to sustainability.

For the purpose of this study, an analysis has been carried out on sustainability reports just found on the website of some universities around the World, with the shared and fundamental characteristic to be the first report on sustainability made by the examined university. This property is important to understand and evaluate how universities moved their first steps in their sustainability knowledge and to analyse the structure, the contents and the quality of the information contained into their first report. To be precise, these reports, related to the year 2010, have been analysed and compared with the same university's sustainability reports of the following year, 2011, when the latter document has been already issued and available on internet. Moreover, comparing the 2010 report with the following 2011, it is possible to evaluate many other aspects: whether the sustainability concept has been evolved inside the organisation; how the

2011 report's structure changes from the 2010 report; if there is more participation of and engagement with stakeholders; whether 2010 targets have been achieved and if new targets have been proposed for the future; lastly, whether new methods have been used to gather information and if new indicators are reported.

Sustainability reports and universities have been chosen according with the following criteria:

- as already said, examined reports are the first sustainability report issued by each university;
- report do not concern only with campus' assessments or specific departments,
 but with it is related to the entire organisation;
- universities are located in different areas around the World, so that it is possible to see how sustainability concept is understood and developed;
- reports are presented in a single document, with almost the same number of pages, so it is clear how universities arrange information in that space (in some cases, reports contain links to more detailed documents);
- reports are available in English language, besides, eventually, the native language; exception has been only made for Università Ca' Foscari, in Italian language;
- reports refer to data of 2010 in the first report and 2011 in the second one (when it is already available).

Unfortunately, as said in the previous chapter, nowadays there are not many universities which issued their sustainability report, constantly, in English language, and available on internet; thus, these are the organisations from which examined reports come from:

- University of Waterloo, Canada

- La Trobe University, Australia
- ETH Zurich, Swiss
- University of Michigan, USA
- Università Ca' Foscari Venezia, Italy

Below, for each of them, it is presented the analysis carried out on their sustainability report, evaluating the structure and the information reported, and compared with the report of the following year too (when it is available).

3.1 Sustainable development report 2010 – University of Waterloo, Canada¹⁰

The report is well structured and leaves large space to main topics, such as environment, social, economic and academic perspectives; the document counts 40 pages, included appendix (1 page) and front and back covers. Before the Index (third page), there are university information (foundation year, students and staff numbers, address and map of the campus) and message from the president; in this letter it is explained how University of Waterloo committed itself to sustainability, that is through the sign of the "Ontario Universities: Committed to a Greener World", the sustainability pledge of the Council of Ontario Universities, in 2009. Together with the index, in 2 pages are reported some information connected to the report itself, such as performance's data period, advisory committee members and key performance highlights with "success stories" and "outstanding challenges".

_

 $^{^{10} \, \}underline{\text{http://www.sustainability.uwaterloo.ca/documents/july152011finaluniversityofwaterloosdr2010.pdf}$

Then, the four perspectives are examined, starting from the environmental section, which takes about 10 pages; in this area, 5 specific aspects have been considered: energy, water, land use, waste management and CO₂ emissions; graphs and charts, with trends from 2006 data, complete the text, that shows also some projects linked to the environment. Social leadership, the following section, analyses in 5 pages students and employee health, diversity, employment equity and personal development; 5 charts integrate the description of projects created or signed by the university itself, distinguishing student and staff community. Economic health is divided into 4 areas: fundraising, research awards, asset management and community outreach; one or more pie charts have been added to the different areas, to make more visible how assets are collected and invested, together with the explanation of some new projects funded by university. The last area is dedicated to "academic excellence"; part of this section are co-operative education, research institutes, faculty-based schools and student engagement; as the previous aspects, there are some graphs and charts to integrate the text, however it is more discursive to highlight the university's prestige in education and research performance, recognised also by local and national rankings.

One page of future directions concludes the 2010 sustainability report of University of Waterloo.

Although the environmental area is the largest section, for pages and technical level of information, the report is well structured, all the four fundamental aspects of a university's sustainability report are presented and it is clear and understandable; graphs and charts help the visual comprehension, without take up too much place of the pages. Instead, university information are lacking: mission, vision and organisation chart are missing; future directions et challenges (of the key performance highlights) do not

indicate the period within achieve those goals, even though it is implied the reference to a wider and more shared policy of the Council of Ontario Universities. Moreover, there is not a detailed list of stakeholders: linkages or references are only addressed to students, staff e research centres. For reporting, it seems that specific and recognised assessment methods have not been used and indicators are reported according with importance given them by the university.

Unfortunately, during the analysis period of the present study, 2011 sustainability report is not available yet.

3.2 Responsible Futures – Sustainability report 2010 – La Trobe University, Australia¹¹

With a job started in 2007, to benchmark Australian and international university performance on sustainability issues, an internal Taskforce has been created in 2009 to develop La Trobe's approach to sustainability and in 2010 others responsible figures have been appointed to make operative the decisions. In fact, this report represent a tangible step of the "Vision 2015", a five-year plan launched in 2010 which considers sustainability a key element for success in a rapidly changing higher education environment. *Responsible Futures* is the first sustainability report of La Trobe University and reporting has been done following the Global Reporting Initiative's Sustainability Reporting Guidelines and AccountAbility's AA1000 Principles. The report, and its related work, won the award for the best first-time report at the

 $^{^{11} \,} http://www.latrobe.ed\underline{u.au/_data/assets/pdf_file/0015/131127/ResponsibleFutures2010SR.pdf$

Association of Chartered Certified Accountants (ACCA) Sustainability Reporting Awards in August 2011, due to the fact of having been verified by an external assurance certification; independent assurance statement, GRI certification and table are parts of the report, placed at the end of it.

After Contents, the message from the president and a detailed description of the approach to sustainability form the first section of the report, in which it is possible to have information about the university, its vision and mission, sustainability governance, goals for different future periods, sustainability management committee and the list of stakeholders and their related "stakes" in La Trobe's performance.

As University of Waterloo, the Australian report presents all four aspects of sustainability for universities: academic perspective (education and research) is the first section to be examined, with explicit direction towards future generations, in 5 pages. Environmental impacts section contains data and projects about Greenhouse Gas emissions, energy consumption and production, commuting, water and paper use, waste and recycling and biodiversity (6 pages in total). Social impacts are divided into two sections: staff and students; the former analyses performance for gender equity, staff turnover and engagement, equal opportunities and training, staff engagement and anticorruption; the latter concerns with equality and diversity of students' categories, graduate experience and satisfaction and undergraduate engagement. Lastly, economic and supply chain impacts are briefly presented into 2 well structured pages with tables and descriptions of economic performance, investment practices and living costs and wages. Each perspective has one or small tables with indicated the 2011 actions and their appointed responsible.

Creating Futures¹² is the sustainability report related to 2011 data; it has been issued in April 2012 and it maintains the same structure and principles of the first one: message from the president and information about the organisation at the beginning; academic, environmental, social and economic perspectives as main focuses at the middle of the document; independent assurance statement, GRI certification and table at the end. The new report counts 56 pages, while the 2010 counted 40 pages: two or more pages have been added to each section, but the main difference is contained in the structure of the organisation information, which counts 12 pages; targets achieved, goals for 2015 and for 2020, material impacts and sustainability risks are the improvements in 2011 report. As in the first report, each section has a table with actions and related responsible for the next year, more the progress of 2011 actions planned in 2010; new indicators have been added (it is possible to note it quickly from the GRI table placed at the end of the report) and visual impact has been improved, making the report easier and clearer to read and understand.

3.3 Sustainability report 2009 to 2010 – ETH Zurich, Swiss¹³

Although this report is not really the first one to be issued about sustainability, it is the first report to be based on the guidelines of the GRI Framework; moreover, the Swiss Federal Institute of Technology Zurich (Eidgenössische Technische Hochschule, ETH) is a signatory member of the ISCN-GULF Sustainable Campus Charter, that is an

_

¹² http://www.latrobe.edu.au/sustainability/documents/4906_Creating_Futures_Web.pdf

 $[\]underline{http://www.sustainability.ethz.ch/silva_ethz/ETH/sl/sustainability/sustainability/ueber_uns/mission/eth_s_ustainabilityreport_09-10.pdf$

agreement between the International Sustainable Campus Network (ISCN) and the Global University Leaders Forum (GULF). Thus, this report combines both assessments to increase transparency for all stakeholders and it is clearly divided into two sections: 14 pages are dedicated to the ISCN-GULF Charter report and 24 pages explain indicators from the GRI report; the entire document counts 55 pages and contains also the president's statement, GRI certification and some information about the ISCN-GULF Charter in annex section.

Whilst mission and vision are presented by the president in its letter, information about the organisational structure, university's numbers and the data and methods used in the report are parts of the introduction in the first section, for the ISCN-GULF report. Then, following the structure of the Charter report, there are three sections "Reporting against principle" 1, 2 and 3; each section reports the principle analysed, the approach to sustainability according the principle's statement and a table with goals, actions and performances of 2009 and 2010. Principles are:

- 1. Buildings and their Sustainability Impacts;
- 2. Campus-wide planning and target setting;
- 3. Integration of research, teaching, facilities and outreach.

As it is possible to note, there are not graphs and charts in this section of the report, that means the attention is focused on targets and results achieved or in progress in the two-year considered period.

Section 2 concerns with the GRI report: following the Sustainability Reporting Guidelines, ETH Zurich presents all the performance and targets achieved relative to: research, education and knowledge transfer; students, faculty and staff; facilities and environment; society and outreach; funding and governance; GRI Guideline Application

in the report. Each area describes in detail what the Institute has developed and how, adding graphs and charts to show clearly data and trends of results.

Lastly, in Annex, it is reported some useful information about the ISCN-GULF Charter Report, such as the original document, FAQs and members table. The GRI certification and contacts conclude the 2009-2010 sustainability report of ETH Zurich.

The report is well structured into two main sections; targets and results achieved (and in progress) are well presented, with some graphs and charts to make easily understandable the trends of performances. Future directions and goals are not explained in a single section, but it is possible to perceive them as the natural extension of the targets which the Institute wants to continue in the trends shown.

Unfortunately, during the analysis period of the present study, 2011 sustainability report is not available yet, because it is planned to be issued in Spring 2013, related to the period 2011/2012.

3.4 Sustainability annual report 2010 – University of Michigan, USA¹⁴

"Planet Blue: the Sustainable Difference" is an university-wide commitment to environmental sustainability and responsible living, launched by University of Michigan in 2010; managed by the Office of Campus Sustainability, this commitment is the benchmark of all the initiatives, projects, plans and actions related to sustainability, in particular from the environmental point of view. In fact, this report does not present all the four perspectives described in the previous reports in specific sections, but it

-

¹⁴ Downloadable at http://sustainability.umich.edu/overview/resources-publications

concerns more with environmental aspects, adding social, economical and academic information inside each examined area.

The document counts 20 pages and it has been done in partnership with the Graham Environmental Sustainability Institute; "Greetings from Planet Blue" replaces the letter from the president, as the author of the report is the executive director of the Office of Campus Sustainability; in this letter it is possible to gather some information about the University of Michigan, how the committee towards sustainability has been engaged and what are, briefly, the next steps of the following years.

Then three sections complete the report: Environmental and Energy Initiatives, Sustainability on Campus and Environmental Indicators. The first section describes the operational team appointed for sustainability and how it works; standards used to evaluate and project existent and new campus' buildings; renewable energy actions and plans adopted by the university. Second section, more than the others, includes academic and social aspects, such as education programs, research accomplishments, student accolades and campus outreach and engagement. Last section is dedicated to environmental indicators: graphs and charts enrich the description and the performance of energy, water and land use, emissions and solid waste.

It seems that specific and recognised assessment methods have not been used to develop the report, but in reality it is the first step of an ongoing Campus Sustainability Integrated Assessment: as said before, in the "greetings from Planet Blue" is explained that in 2010 many ideas and projects, designed to reduce the environmental impacts of the university, have been collected and the future step is to align them with institutional priorities. In fact, this reference becomes concrete with the Sustainability Annual Report

2011¹⁵, issued in January 2012 and made-up of the Campus Sustainability Integrated Assessment analysis, developed in the Ann Arbor Campus and divided into four operational related conservation themes: climate action, waste prevention, healthy environments and community awareness. The document counts only 16 pages and each section presents graphs, charts and images, improving the visual impact of data and trends. Comparing the previous report, "looking forwards" and goals of the assessment have been included, while organisational information about the university are not presented, as the document is the second part of the 2010 report. The work so far developed will be complete with the future ARSs (Annual Sustainability Reports), which will report on progress toward the goals.

3.5 Ca' Foscari Sostenibile: Il Report 2010 – Università Ca' Foscari, Italv¹⁶

The reasons why this report has been chosen in this study can be found in the next chapter; its importance is due to the fact that it is not only the first sustainability report issued by Università Ca' Foscari, but also it is the first Italian universities report related to sustainability, linking together environmental, social, economical and academic aspects. The document analysed, available only in Italian language, is a compact version of the largest one (32 pages on 98 of the integral version), issued to be clear, easily readable and understandable by each stakeholder; all the information reported in it summarise the main aspects and data of the integral version, which is available on the

¹⁵ See note 13

¹⁶ http://www.unive.it/media/allegato/infoscari-pdf/report-short.pdf

website of the university, in the sustainability section. The present study examines the short-version report, in order to be aligned with the documents of the other universities, but analysis of contents it is occasionally extended to the integral version.

The report is well structured, divided into 5 section: institutional, academic, social, environmental and economic areas. In the institutional section (13 pages) there are all the information about the university, such as vision, organisational chart, sustainable policy, stakeholder list and, as first, the letter of the president (rettore in Italian universities); the letter, a summary of the integral one, presents how Ca' Foscari has engaged itself to sustainability and which are the main steps which led to this report. Part of the first section is also key performance indicators, targets and results achieved and goals for the future (period limit 2013). Academic section shows performance about research and education programs, adding charts and links to website sections (or to the integral-version report) to have more and detailed information about them. Social area describes contents related to students and services, and staff, while community and outreach are presented only in the integral report. Environmental section, in this short report, is mainly based on the Carbon Management project: in 6 pages, charts, graphs and text describe the project and 2009-2010 performances about emissions, paper, land use and students/staff mobility; more detailed information, supply chain and other parameters are analysed in the 98 pages report. Lastly, economic section shows incomes and expenses, with particular attention to sustainability investments.

In this document images are not included, but there are 4 opinions of some stakeholder's category, to emphasise the engagement of internal and external community into the reporting process. For reporting, it seems that specific and recognised assessment methods have not been used, but reported indicators have been

developed according with the importance given them by the university and with the support of GRI's and CAF¹⁷'s indicators.

Unfortunately, during the analysis period of the present study, 2011 sustainability report is not available yet.

3.6 Findings

Summarising the findings of sustainability reports' analysis, it is possible to note some important conclusions, shown in Table 3:

Table 1: Data included in Sustainability Reports

Institution	Pages	Letter of the president	Perspective sections				Assessment methods	2011 report	Changes
			Environ.	Social	Economic	Academic	methods	Героп	
University of Waterloo	40	Yes	Clear	Clear	Clear	Clear	No	No	-
La Trobe university	40	Yes	Clear	Clear	Clear	Clear	GRI and ACCA	Yes	Yes
ETH Zurich	55	Yes	Clear	Clear	Clear	Clear	GRI and ISCN-GULF	No	-
University of Michigan	20	Yes/not	Clear	Not so clear	Not so clear	Clear	Campus Sustainability Integrated Assessment	Yes	Yes
Università Ca' Foscari	32	Yes	Clear	Clear	Clear	Clear	No	No	-
University of Gothenburg	31	Yes	Clear	Clear	Clear	Clear	GRI and EMAS	Yes	No

¹

¹⁷ Common Assessment Framework (CAF) is an auto-evaluation model to analyse, evaluate and improving the quality of Public Administrations; it has been presented in the IV European Conference on Public Administration Quality in 2006 and it has been adopted and improved for university's institution by Italian legislation in the same year [Dipartimento della Funzione Pubblica and Formez, 2006].

- a) it is mandatory to remind that the publication of sustainability report is a voluntary act of each single organisation and reported data are those performances that universities consider important to share with their stakeholders; nevertheless, all the examined reports present a structure based on 5 main sections: institutional, environmental, social, economic and academic perspective. Each area has been developed with different contents and layouts, but it can be count as essential element of university's sustainability report.
- b) common and important element of reports is the letter from the president, or from someone else on his behalf: it may contain primary values of university, such as mission and value, and/or how the university has been engaged itself to sustainability issues; as said above about the role of the president, this letter lends official weight to the report, as that document which evaluates policy, targets and performances of the university, spreading all information to local and international stakeholders.
- c) number of pages varies slightly between 20 and 55, to prove that reports need to contain all significant information, but they do not have to be too much long, especially the first report, in order to catch the attention of stakeholders.
- d) most of the reports are based on recognised and international Guidelines; this implies three comments:
 - universities, and organisations in general, need to be supported by external experts in sustainability reporting, as it is a relative new discipline, and information to provide are so much and scattered arranged;

- II. at the same time, GRI's Sustainability Reporting Guidelines, the most used Framework, has been integrated by other assessment methods, such as ISCN-GULF Charter, ACCA's Principles and EMAS, that means there is not a specific analysis which universities can adopt to make their sustainable analysis;
- III. the adoption of these guidelines, it is an help and incentive to issues next reports in a limited period after the closing of year: three out of four 2011 data reports have been issued within April 2012, where the last report will be issued in 2013 according to a different publication policy.
- e) universities have noticeably improved their second sustainability report, adding new useful information, verifying the previous targets and improving the layout of the document.

Related to the last point, in Table 3 has been added the University of Gothenburg¹⁸; reason for which its sustainability reports have not been added to the previous analysis is due to the fact that they are not their first reports related to sustainability issues to be issued, but rather the fourth and the fifth. The first report included in the annual report dates back to 2007, while the first single document is related to 2008 data. It is important for this study to include a mention to University of Gothenburg, because comparing the *Sustainability Report 2010* with the following *Sustainability Report 2011* it is possible to note that the structure is identical to both reports; in 2011, the only pages added are related to student participation and environmental risks, counting 5 pages more than the 2010 one. This case shows that, after some years, the institution found the best way (for the moment) to provide information to its stakeholders and it

_

¹⁸ Unfortunately, Sustainability Report 2010 is not available online anymore; 2011 Report is available at: http://www.mls.adm.gu.se/digitalAssets/1367/1367666_sustainability-report-2011-webben.pdf

created a database and an information system inside the organisational structure to enable an easily and quickly reporting.

In conclusion, these reports represent good examples for universities who want to report their performances under the sustainability point of view for the first time; recognised assessment methods and guidelines, such as GRI, ACCA, ISCN-GULF and others mentioned above, are valid supports to Higher Educational Institutions, but they need to be used together, to provide a completed analysis in each essential element of sustainability. Structure and data of the first reports are improved in the second one, showing that the experience of the first document and the work done along different years have increased the knowledge of sustainability's concept inside the institution, up to find the best way to provide all significant information to own stakeholders.

4. Università Ca' Foscari Venezia

The first sustainability report of an organisation, private, public, or, as in this case, educational institution, represents an important step for itself and it is desirable to be the first of a long series of next documents about sustainability issues. However, the report, and what is contained inside it, is only the tangible and final part of a long process of data collection and evaluation. This process, here also procedure or iter, is noticeably complex for those organisations which do not have right tools and knowledge to do it, even though there are many guidelines and frameworks made just to help beginners in sustainability reporting. Thus, the following analysis on the experience of Università Ca' Foscari is another case study, which may be helpful to better understand what are the difficulties and needs of universities which prepare their first sustainability reports. The reason why this university has been chosen for this study is related to the current situation of disclosure by Italian universities: year by year, many institutions have been publishing, with a growing trend, official documents related to social and environmental topics, such as Corporate Annual Reports and Environmental Reports, besides the mandatory Financial and Balance Sheet (Arcari and Grasso, n.d.; Del Sordo et al., 2009). However, the publication of reports about environmental, social and economic performance has been made, so far, by few companies and only one university: in 2011 Ca' Foscari has been the first Italian university to have issued the Sustainability Report, in the way such document has been analysed in Chapter 1, more the academic perspective, as underlined in Chapter 2. Thus, the context in which the institution has worked it was completely away from any reference point related to the Italian university system, except theory or international examples.

Università Ca' Foscari (UCF) is sit in the North-East of Italy, with the main campus integrated and mixed into the historic city of Venice; probably its location may have addressed this university those adequate incentives to be engaged in the sustainability reporting. In fact, Venice, inserted in the World Heritage List of UNESCO since the 1987 (2011b) and candidate as European Capital of Culture for 2019 (Città di Venezia, 2008), is rich of history and cultural ferment, visited by millions of tourists every year, and easily connected with the international scene; it is also focused on natural calamities and the under construction project Mose, which will forms a barrier to the incoming waves and will safeguards Venice from the "acqua alta", is a clear demonstration that prevention is better than cure. Another important incentive towards the first sustainability report has derived from the internal structure of the university: the nomination of Carlo Carraro as new rector of UCF in 2009 have brought a series of fundamental changes in order to face the new challenges introduced by the debate of last years in sustainability concerns; his personal background and experience have helped the university's collegial administrative organ to undertake sustainability as primary object in strategic plans and decisions. In fact, one of the first action implemented in the organisational structure has been the nomination of a new organ, strictly connected with the rector and responsible of sustainability issues: from 2009 the Rector's Delegate to Sustainable Development and Social Responsibility (Delegato del rettore alla sostenibilità ambientale e alla responsabilità sociale) has been nominated to be landmark for stakeholders about any project and action related to sustainability and to control all the applications of the sustainable policy adopted by the university (UCF, 2009).

Changes towards the sustainable direction are also visible in the mentioned policy, especially from three important documents:

in July 2010, Ca' Foscari issued the Commitment Charter for Sustainability (Carta degli impegni per la sostenibilità, CIS)¹⁹, in which the university has pointed out specific targets on which focus on the annual operations. "The Commitment Charter for Sustainability defines targets: to minimise the university's impacts on the environment and on natural resources; to increase social cohesion and reduce internal inequalities; to enhance cultural growth and sustainable development of surrounding territory" (UCF, 2011a)²⁰. In this document it is possible to find both strategic and operational targets, divided by thematic areas (such as Governance, Students, Employees, Energy, Innovation, Waste, etc.), together with concrete actions to achieve them; responsible units and deadlines are also indicated. The validity of the Commitment Charter is about three years, whereas each year it is possible to update it with new actions and goals, deleting or updating those that have been already achieved; in fact, in June 2011 the Academic Senate issued the updated version of the Commitment Charter, with validity from 2011 to 2013 (Ca' Foscari Sostenibile, 2011a). It is possible to see both Commitment Charters in the integral version of the Sustainability Report 2011 (pages 12-22), and check which goals have been achieved in 2010 and the new ones integrated in the 2011-2013 Commitment Charter.

_

¹⁹ Available in Italian language at: http://www.unive.it/nqcontent.cfm?a id=86486

²⁰ English version, traslated by the author, from the original Italian: "La carta degli impegni per la sostenibilità definisce gli obiettivi volti a minimizzare l'impatto dell'università sull'ambiente e sulle risorse naturali, ad aumentare la coesione sociale e a ridurre le disuguaglianze al suo interno, a favorire la crescita culturale e il progresso economico sostenibile del territorio" (p. 10)

- the Statute is a fundamental document for an institution, because in it the organisation fixes its own principles and values, together with how the administrative structure is organised. Aligned with the most recent Italian law (204, 30th December 2010), Università Ca' Foscari has been the first Italian university to approve the new statute, which includes references to equal opportunities, ethical code, sustainability and internationalization aspects (UCF, 2011b).
- the mentioned Italian law, 204/2010, has introduced the compulsory adoption of ethical code for all Italian universities and it invites them "to work [in the respect of] responsibility and autonomous principles"; these principles are understood as "the maintaining of a financial equilibrium that can guarantee the sustainability of university's operations, [...] with the engagement of external stakeholders from the surrounding economical and social territory" (Arcari and Grasso, n.d.). Ca' Foscari has already adopted since 2008 an ethical code and, together with the Commitment Charter for Sustainability, it is possible to note that the direction taken by the university is aligned with the recent regulation, before it was promulgated.

The implementation of sustainability in these documents is not strictly required for reporting by other universities, but it is a concrete demonstration for stakeholders to highlight the committee on sustainability by the institution. Moreover, this undertaken direction has already brought prestigious and economic advantages to UCF: for the second consecutive year, Ca' Foscari has been awarded by the Italian Ministry of Education, University and Reseach (Ministero dell'Istruzione, dell'Università e della Ricerca, MIUR) for being placed in one of the first three places of the national ranking

made by MIUR itself. Every year, this ranking evaluates university's performance on the base of specific indicators about quality of research and teaching activities (Trovati, 2011), rewarding the more virtuous Italian universities with State grants, according with the position obtained in the chart. In 2010, UCF received more than euro 10 millions, ranking the 2nd place, while it ranked the 3rd place in 2011, nevertheless with an increase of 15,4% of contributions from the previous year (Infoscari, 2011).

Focusing on the process through which the first sustainability report has been achieved, the period spent from the first step to the publication of the final draft has been about seven months, from December 2010 to June 2011 included, officially ended the 8th of July with a meeting open to public and with the participation of the rector, the rector's delegate to sustainability, firm's managers, local public administration's representatives and other stakeholders in general, such as students, staff and local community. The report is the product of a teamwork, specifically appointed for the processing and the preparation of the document, and in strictly collaboration with the rector's delegate to sustainability, as it is possible to read in the last page of the integral-version of the report.

One of the first difficulties which this teamwork has run into has been the collection of all information and technical data to report, together with the choice of which indicators might better represent the main thematic areas: environmental, social, economic and academic aspects. Albeit for the economic perspective data can be taken from the financial balance sheet, the university was not equipped with an internal information system, specifically dedicated to the collection of data related to sustainability issues; moreover, this kind of information are distributed along the entire structure of the organisation and each impact requires a detailed and complex analysis. About indicators,

GRI's Sustainability Reporting Guidelines and CAF Laboratory have been studied in order to choose whether follow them in detail or only get useful ideas about contents and the method to evaluate indicators for each thematic area. Thus, this part of the process has required longer time than the other steps. Nevertheless, this period has been spent to engage stakeholders: in particular, every department managers has been interviewed to understand which were the important indicators from their point of view, as they know better aims and results of what they manage and the method used to monitor them. Such approach have found those parameters and data that every year might be analysed, to evaluate performance achieved, identify particular trends and to redefine new targets for the future; furthermore, these indicators have been compared and aligned with those proposed by the guidelines, while data have been collected in order to create a database for next reports. At the same time, and with the same degree of complexity, representatives of internal and external stakeholders have been interviewed, in order to point out their general and specific needs in relation to Ca' Foscari, and to inform them about the project of sustainability report. This analysis, as mentioned in Chapter 1, has identified the importance of each category of stakeholders, highlighting characteristics of the relation between them and the university; nevertheless, all stakeholders have been taken into account by the institution, in particular picking out their needs and comparing them with the actions adopted by UCF and the availability of what it could be act for them in the future. Other indicators have been found and divided in the four different areas.

Once indicators have been found, the attention of the team charged for the report has focused on the structure of the document; besides the fundamental elements related to sustainability (economy, environment and society), the academic aspect and its relative

indicators have been included, together with some useful information about the university, as suggested by many guidelines and presents in all the other reports examined in the previous Chapter. Another aspect to mind attention has been the available space to attribute to each area: the attempt was to give each perspective the same space in term of pages, to consider equally the topics analysed; in fact, with exception for the university's description at the beginning of the integral-version report, the second part is almost equally divided in four sections: academic, environmental, social and economical perspective, with about 20 pages each one. Lastly, into the report have been included the two key projects, developed in 2010; they have been considered important because they have significantly contributed to enhance the social and environmental responsibility's awareness inside the university structure. The Carbon Management project, included also in the short-version report and mentioned in the previous Chapter, has been activated in order to reduce the production of greenhouse gases, monitoring and minimising the carbon footprint of the university's campus. The project has been started in Ca' Foscari as pilot project, with the collaboration of the Italian Ministry for Environment, Land and Sea ("Ministero dell'Ambiente e della Tutela del Territorio e del Mare", MATTM), and with the aim to extend it to other Italian universities, thanks to the results and the technologies developed in UCF (UCF, 2011a). The other project, Waste Disposal, has been implemented in Ca' Foscari with two primary goals: the first one is connected with the administration and service of the city where the university is placed, while the second is clearly addressed to internal and local community. Venice is well known to be crossed by many channels and for having any roads and cars, so that waste collection takes place every morning only with boats, which collect and clean the bins all over the city; however, there is not a specific service

for waste collection and different bins are not present, as in many other Italian cities. In this context, Waste Disposal project has intended to manage the waste collection inside the university's campus, through the application of different coloured bins in each building, about paper, glass and plastic objects. A second goal of this project has been to sensitise internal and local stakeholders, such as students, staff, their families and the local community, to assume a sustainable behaviour according with the principles of reducing, reusing and recycling.

The process here showed could be considered concluded, as, after the preparation of the document, the report has been published (in two versions) and presented at the public meeting in July 2011. However, it is possible to extend the analysis to the following period, to highlight the natural improvements for reporting the second sustainability report. In fact, after the publication of the first report, there are some important points to evaluate: stakeholders engagement and feedbacks; monitoring of partial results; programs and actions following the sustainability committee. The first point is related to the reaction of internal and external stakeholders: it is important to gather as more as possible feedbacks to analyse whether their needs have been well taken into account or if they disagree with the policy and results provided; these feedbacks are basic for the strategy of operational action and for the publication of the next report too. The other fundamental point is to monitor continuously the performance: it gives the possibility to administrative organs to check and control the development of targets, just in time to make corrections or to speed up actions and results. It may also be strictly connected with the sustainability report, especially when there is not an efficient information system: middle-term data monitoring could be seen as an efficient instrument to collection partial results and to facilitate the analysis for the next period of reporting. In

fact, university's reports are usually issued every one-year period or longer, as seen for example the ETC Zurich reports; however, environmental and social aspects might produce different and opposite impacts along the period of analysis, distorting the results of the entire period considered. For this reason, Ca' Foscari decided to monitor the trends with a frequency of every 3 months; in detail, this monitoring process consists in a "work in progress" cards (56 in total), distributed to the 15 responsible operative units, where operative targets of the Commitment Charter are associated with concrete "actions towards stakeholders". Then, cards are collected and results are analysed to understand whether targets are already achieved or which is the percentage of progression. From the monitoring of the 30th of September 2011, results have showed that 75% was in line with the targets, 16% was higher than expected targets, while 9% represented projects or actions that have not been developed, with related explanations and reasons for bad results (Ca' Foscari Sostenibile, 2011b). As result of this monitoring process, the administration organ, in January 2012, has issued the last Commitment Charter, related to the period 2012-2014, updating the strategic operations and actions of the two same previous documents.

The examined process is strictly related to the experience of Università Ca' Foscari; other Higher Education Institutions might present different conditions, structure, campus, plans and actions, so that other difficulties may be found and processes are different. However, this is a good example to show which are the main difficulties that can be found in the first sustainability reporting: from the analysis, it is clear how the lack of an information system related to the sustainable data may cause many problems and delays at the beginning of the process. Moreover, the choice of which indicators

have to insert into the report or which guidelines to follow in detail is another step which requires time and knowledge and it needs to be correlated to the main objective of the report. Important is also the strategic direction which the organisation wants to follow: although external or internal pressures may stress the reporting of sustainability issues, the administrative organ is primary responsible to adopt strategic plans towards sustainable development, providing the right tools and actions to spread it inside the organisational structure. Lastly, stakeholders are whom the report is addressed and their engagement can be carried out in many different methods (many books and texts show economic approach to it; see for example Mathur, Price and Austin, 2008).

In conclusion, this analysis and the case studies of the previous chapter might give a concrete example of what is meant with sustainability reporting by university for the first time: procedures and contents are showed through different reports, conditions and contexts. Next step, in next Chapter, it will be the attempt to create an as more as possible standard procedure from the results achieved, in order to incentive more HEIs to issues their sustainability report.

5. Conclusions: Procedure for University

5.1 Review and Conclusions

In Chapter 3, it has been analysed the contents and the structures of sustainability reports by HEIs; in particular, the shared characteristic of those five universities from different regions of the World is due to their first experience in reporting sustainability issues, in a single and voluntary document. Then, Chapter 4 has shown the reporting process of one of those universities: Ca' Foscari experience has given the possibility to identify which are the main difficulties to prepare the report, its structure and its contents, and to highlight the main steps to achieve the final draft, especially in a context without reference points at national level. About literature, both national and international, there are guidelines and frameworks to help organisations in their reporting disclosure, as seen in Chapter 1; however, there are not detailed guidelines specifically related to Higher Education Institutions: as examined in Chapter 2, these institutions are lightly more complexes than economic companies, as their main target is not a monetary profit, but the education of present generations. Thus, universities are that place where sustainable education is applied in researches and experiments, and it needs to be developed in concrete actions by universities themselves, disclosing their performance in together environmental, social, economic and academic aspects. Nevertheless, many authors and research centres have created some specific assessments to analyse performances and to evaluate the quality of present situation inside universities organisation structures and campuses; each of these assessments focuses on particular aspects which are strictly connected with the characteristics where

the assessment has been created and tested. Thus, the evaluation of performances through these methods may produce indicators and results which are influenced by different policies and targets of the institution which uses them. Moreover, it is useful to remind that the rate of freedom that characterises the sustainability reports is a fundamental point to take into account: structure and contents are not regulated by laws, so that each organisation decides autonomously whether to report its performance and which information have to be included in the document, according with their stakeholders needs and pressures. This kind of "freedom" is the product of an international process which has considered the globalisation of market trading and transports, and it has not bound worldwide companies to issue a standard document which does not respect the differences between regulations of each country. For these reasons, sustainability reports are still voluntary documents, which contents, layouts and structures depend on organisations and their particular conditions, together with pressures and/or relationships with their stakeholders.

The conclusion of this study will be the following attempt to identify a procedure which considers the standard steps in reporting process, sharing difficulties that universities may run into about their first sustainability reports. It is specifically addressed to Higher Education Institutions for the motivations explained above, in order to incentive them to demonstrate that they are acting what they teach and to spread the sustainability concept to their stakeholders, especially students and local communities. The indicated procedure tried to consider all the information and results found in the analysis of previous chapters, together with the literature and the well-known guidelines; however, taking into account "freedom" and voluntariness characteristics, it may be not exhaustive and other conditions could influence its use.

Thus, the procedure and the findings of this study would be useful to researches, professionals and academicians in the area, in order to improve the knowledge about sustainability reporting and to spread sustainable actions in education for present and future generations.

5.2 Procedure for University

The following procedure is organised in eleven steps: each step is presented in chronological order, although the next step does not requires that the previous has to be finished, so that one or more steps may be done at the same time. The process does not indicate a specific time for step, as it depends on conditions and goals of the institution.

1. Sustainability policy

Inside the organisation structure, only the administrative organ, collegial or individual or else, has the responsibility to decide about reporting or not on sustainability issues and performances; disclosure pressures may arrive from both internal and external stakeholders, but they can only influence the decisions of the institution. Then, this organ fixes the goals, strategies and actions of reporting process. Moreover, its role is not here limited: sustainability report shows performances from a point of view of someone who wants to improve them, especially when reporting is frequently done. Thus, sustainability policy is required to indicate long-term targets and the future direction of the university, providing stakeholders about what has been done in the examined period and the goals to achieve in next periods. Such policy requires long

time to be applied, depending on the regulation of each institution, the values and the targets fixed by the administrative organ. It is not unusual that this step has been already done by many universities, even though they have not issued a sustainability report yet.

2. Responsible of sustainability

Once the administrative organ has decided to report sustainability performance or has developed a sustainability policy, it is necessary to appoint a responsible for it, so that it can be landmark inside the organisation's structure for all the aspects related to sustainability. However, especially presented in this way, its duties may be so many so a single person cannot do them individually; in fact, many times the responsible of sustainability is a specific office or a teamwork or, in some cases, it can be an external organisations in collaboration with the university, such as a research centre on sustainable development or green technologies, with the task to analyse performances on behalf of the institution. This figure may be charged only for reporting, but it is necessary to see its role in the period between the publications of reports: its duties might include: to monitor data of middle-term period, to control the application of the sustainability policy, to be landmark for any question about the report, to promote projects and actions towards sustainability.

3. Reporting principles and guidelines

Before starting the collection of information, it is necessary to know which kinds of information are significant and useful to insert into the report. To do it, it is possible to compare and analyse different assessment methods and guidelines, between the most used and indicated by literature. For example, GRI Sustainability Reporting Guidelines

are one of the most known guidelines and they are used by many companies worldwide; ACCA's Principles are also useful indications about reporting, as well as KPMG, OECD, UN Global Compact, ILO and FEE. However, these guidelines do not consider the academic perspective, as they are mainly addressed to companies in general. Instead, specific assessment methods for universities are shown by Shriberg (2002), who highlights strengths and weaknesses of each one. Thus, each university can choose to use a particular model of analysis or simply to follow guidelines and principles, with the possibility to create a new model for reporting specific for the institution. Whatever the adopted decision, the most important thing is to know which indicators better represent the university and its performance, according with the goals and the strategy carried out on sustainability, in order to collect the significant information to include in the report.

4. Information collection

Once a list of possible indicators is prepared, it is necessary to collect all the information related to these indicators. This step usually requires long time, especially when there is not an information system capable of gathering this kind of information. It is recommended to create a new database with all data about sustainability concerns, to make easier the reporting of next periods. Internal information can be collected in each area of the university's structure, such as faculties, departments, campuses, etc., but also at each level of the organisations, such as students, researchers, professors, dean departments, administrative staffs, etc. External information may be collected by individual or public meetings, questionnaires and interviews.

5. Stakeholders engagement

Part of "information collection", the stakeholders engagement is a crucial step in reporting procedure: stakeholders represent the subjects who the report is addressed and they need information to base their choices. Their engagement is not only due to collect their needs, questions and other information about them, but it should be a process to make them part of the decision process, in order to consider their point of view in every single decision. In literature, many methods of stakeholders engagement are analysed and presented, which universities may take ideas or examples; fundamental for reporting is to know their needs, which information they require and they expect from the report and from the university, which is their importance for the institution and what the institution is doing and can do for them. Usually stakeholders are grouped in categories with similar needs, to better highlight a representation of them in the report.

6. Information evaluation

Once information have been collected, raw data need to be transformed into selected indicators. This step has not a defined time: its goal is to compare the required information with those already collected, according with the chosen method (*step 3*) and checking if other indicators can be achieved. Then, these significant information have to be evaluated according with the policy of the institution, to highlight targets achieved, trends of results and other performance considered important and to include into the report. Together data, graphs, charts and descriptions are well-recommended, in order to present achieved results easily understandable by all stakeholders.

7. Report's structure and criteria

The structure and the layout of sustainability report represent themselves some useful information for stakeholders, especially about the sustainability policy of the institution: for example, the space dedicated to the environmental perspective might detect the importance given by the university to environmental aspects, results and related actions; in case the policy is mainly focused on the environment, this area should be more extended than the others. Thus, each perspective included in the report should have the adequate space on the base of the relevance it assumes in the policy; the same observation might be applied to the order through which data are presented. Moreover, this relation between policy and report's structure should also indicate which are the crucial stakeholders of the university, as the policy reflects organisation's commitment towards their needs.

As said above, sustainability report is a voluntary document and there are not regulation about its structure and contents; however, it is considered as an official document, so that reported information need to follow some criteria as the official documents: faithful representation, relevance, comparability, verifiability, timeliness and understandability. Lastly, it is important to include into the report the principles and the methodology that have been used in the reporting process, to highlight how information have been collected and whether specific guidelines have been taken into account or followed in detail, in order to make the report understandable and comparable with similar reports.

8. - Assurance -

Once the draft of the report is completed, an eventual step may be represent by assuring it through the control of an independent organisation, such as audit and accountability firms, which usually apply Assurance Standards based on AccountAbility's Principles. This step is clearly used by economic organisations to increase the confidence of their stakeholders about accuracy and credibility of disclosed data and associated information, as well as to receive feedback from independent assurance providers; for Higher Education Institutions, it might have the same values, underling the commitment to provide stakeholders significant and right information of policy, strategy and actions. Nevertheless, universities can require independent assurance about their sustainability reports, especially when specific guidelines are detailed used: for example, La Trobe University has included the independent assurance in its first sustainability report, together with the GRI's certification, as well as ETH Zurich has done.

9. Publication

The publication of the sustainability report, in particular the first one, is an important step to not be underestimated: firstly, it represents the final step of a long process and analysis on the organisation's performance and it requires its due attention; secondly, all stakeholders need to be informed about its publication. Conferences, public meetings, advises or special advertising are generally planned to celebrate the publication.

10. Monitoring

Once the report has been issued, the procedure seems to be ended with the publication of the document and with its the communication to stakeholders. However, it is fundamental to check the impacts produced by the report on stakeholders, both internal and external, collecting feedbacks about the contents and the report itself. Moreover, as explained in Chapter 4, the monitoring action along the period between two consecutive

reports provide middle-term results to the management, just in time to make corrections, to speed up actions and programs towards the defined direction, or to set new targets as the previous have been already achieved. Monitoring results may be presented in term of a new document, even though its use is related to internal management and administrative staff. This step may also be useful to gather more data about report's indicators or create new ones, especially when it has not been installed an information system yet, which automatically gather and elaborate data of sustainability concerns.

11. New report

The last step of this procedure is the beginning of the next one. Since the first step, improvements may be done in each part of the procedure, even adding new steps created by experience; next report should contain the evaluation of the policy, goals and actions of the previous, compared with the achieved results and fixing new goals and actions for next period. First report could be used as a model on which create next reports, or as significant experience from which try new methods or structures, according with stakeholders' feedbacks. Only this perspective of analysis and continuously improvements, it is possible to connect each report to the previous one, using this relationship to improve performances, engage stakeholders and give substance to the adopted policy.

References

Adams, C.A. and Frost, G.R., 2008. Integrating sustainability reporting into management practices, *Accounting Forum*, 32 (4), pp. 288-302

Adams, C.A. and McNicholas, P., 2007. Making a difference: Sustainability reporting, accountability and organizational change, *Accounting, Auditing & Accountability Journal*, 20 (3), pp. 382-402

Albrecht, P., Burandt, S. and Shaltegger, S., 2007. Do sustainability projects stimulate organizational learning in universities?, *International Journal of Sustainability in Higher Education*, 8 (4), pp. 403-415

Arcani, A. and Grasso, G. eds, (in press). Ripensare l'Università. Un contributo interdisciplinare sulla L.n. 240/2010. S.I.: Giuffè.

Association of Chartered Certified Accountants (ACCA), 2005. *Sustainability Reporting Guidelines for Malaysian Companies*. London: Association of Chartered Certified Accountants.

Ball, A. and Osborne, S.P., 2011. *Social Accounting and Public Management: Accountability for the common good*. New York: Routledge.

Banerjee, S.B. and Bonnefous, A.M., 2011. Stakeholder Management and Sustainability Strategies in the French Nuclear Industry, *Business Strategy and the Environment*, 20 (2), pp. 124-140

Bebbington, J. and Gray, R., 2001. Accounting for the environment. London: Sage Publications.

Bebbington, J., Higgins, C. and Frame, B., 2009. Initiating sustainable development reporting: evidence from New Zealand, *Accounting, Auditing & Accountability Journal*, 22 (4), pp. 588-625

Bonn, I. and Fisher, J., 2011. Sustainability: the missing ingredient in strategy, *Journal of Business Strategy*, 32 (1), pp. 5-14

Borga, F., Citterio, A., Noci, G. and Pizzurno, E., 2009. Sustainability Report in Small Enterprises: Case Studies in Italian Furniture Companies, *Business Strategy and the Environment*, 18 (3), pp. 162-176

Bowers, T., 2010. From image to economic value: a genre analysis of sustainability reporting, *Corporate Communications: An International Journal*, 15 (3), pp. 249-262

Brandon, P.S. and Lombardi, P., 2005. Evaluating sustainable development: in the built environment. Oxford, UK: Blackwell Publishing.

Brown, H.S., Jong, M. and Levy, D.L., 2009. Building institutions based on information disclosure: lessons from GRI's sustainability reporting, *Journal of Cleaner Production*, 17, pp. 571-581

Brunetti, A.J., Petrell, R.J. and Sawada, B., 2003. SEEDing sustainability: team project-based learning enhances awareness of sustainability at the University of British Columbia, Canada, *International Journal of Sustainability in Higher Education*, 4 (3), pp. 210-217

Buhr, N., 2002. A structuration view on the initiation of environmental reports, *Critical Perspectives on Accounting*, 13 (1), pp. 17-38

Burritt, R.L. and Schaltegger, S., 2010. Sustainability accounting and reporting: fad or trend?, *Accounting, Auditing & Accountability Journal*, 23 (7), pp. 829-846

Ca' Foscari Sostenibile, 2011a. *Carta degli impegni di sostenibilità*. [online] Ufficio Progetti, Available at: http://www.unive.it/nqcontent.cfm?a_id=86486 [Accessed in December 2011]

Ca' Foscari Sostenibile, 2011b. *Monitoraggio intermedio della Carta degli impegni di Sostenibilità*. [online] Ufficio Progetti, 27 October, 2011. Available at: http://www.unive.it/nqcontent.cfm?a_id=97834 [Accessed in December 2011]

Calder, W., 2005. The UN Decade of Education for Sustainable Development – A progress Report, *The Declaration*, 7 (2), pp. 1, 5-8

Checchi, D. et al., 2008. *Ranking e valutazione: Il caso delle classifiche delle università*. [articolo proposto per la pubblicazione sulla Rassegna Italiana di Valutazione]. In:

Tremonti, G. et al., 2008. Ranking e valutazione: Il caso delle classifiche delle università. *RIV Rassegna Italiana di Valutazione*, 4, pp. 1-43

Città di Venezia, 2008. *Venezia Capitale Europea della Cultura 2019; la Giunta avvia l'iter per la candidatura*. [online] Available at: http://www.comune.venezia.it/flex/cm/pages/ServeBLOB.php/L/IT/IDPagina/18853 [Accessed in December 2011]

Clugston, R.M. and Calder, W., 1999. Critical dimensions of Sustainability in Higher Education. In: Filho, W.L. ed., 1999. *Sustainability and University Life*. Frankfurt: Peter Lang. Ch. 2.

Cortese, A.D., 2003. The critical role of higher education in creating a sustainable future, *Planning for higher education*, 31 (3), pp. 15-22

Crittenden, V.L., Crittenden, W.F., Ferrell, L.K, Ferrell, O.C. and Pinney, C.C., 2011. Market-oriented sustainability: a conceptual framework and propositions, *Journal of the Academy of Marketing Science*, 39 (1), pp. 71-85

Davidson, K.M., 2011. Reporting systems for sustainability: what are they measuring?, *Social Indicators Research*, 100 (2), pp. 351-365

Daub, C.-H., 2007. Assessing the quality of sustainability reporting: an alternative methodological approach, *Journal of Cleaner Production*, 15 (1), pp. 75-85

Del Sordo, C. and Orelli, R.L., 2008. *Management accounting in Higher Education System: The Italian case*. In: International Association of Technology, *International Conference of Education, Research and Innovation 2008*. Madrid, 17-19 November, 2008. Madrid, International Association of Technology.

Del Sordo, C., Farneti, F., Pazzi, S. and Siboni, B., 2009. *Voluntary reporting in Italian universities: what do they report?*. In: Università di Bologna, *International Conference on Sustainable Management of Public and Not for Profit Organisations*. Forli campus, 1-3 July, 2009. Bologna: Università di Bologna.

DeWeese, T., 2009. Tea parties and "end the FED" protests cannot win back the Republic without this information, *American Policy Center*, [online] Available at: http://americanpolicy.org/2009/08/06/tea-parties-and-end-the-fed-protests-cannot-win-back-the-republic-without-this-information/ [Accessed in December 2011]

Doane, D., 2002. Market failure: the case for mandatory social and environmental reporting. In: New Economics Foundation, *IPPR seminar: The transparent company*. London, 20 March, 2002. London: Economics Foundation.

Dumay, J., Guthrie, J. and Farneti, F., 2010. GRI sustainability reporting guidelines for public and third sector organizations: a critical review, *Public Management Review*, 12 (4), pp. 531-548

Elkington, J., 1994. Company environmental reporting: a measure of the progress of business & industry towards sustainable development. (Technical report series, no. 24. United Nations Environment Programme. Industry & Environment Office). Paris: United Nations Publications.

Eurofound, 2009. *Social Balance Sheet*. [online] Available at: http://www.eurofound.europa.eu/emire/FRANCE/SOCIALBALANCESHEET-FR.htm [Accessed in December 2011]

Farneti, F. and Guthrie, J., 2009. Sustainability reporting by Australian public sector organizations: why they report, *Accounting Forum*, 33 (2), pp. 89-98

Filho, W.L. ed., 2009. Sustainability at Universities – opportunities, challenges and trends. Volume 31. Frankfurt: Peter Lang.

Fonseca, A., Macdonald, A., Dandy, E. and Valenti, P., 2011. The state of sustainability reporting at Canadian universities, *International Journal of Sustainability in Higher Education*, 12 (1), pp. 22-40

Global Reporting Initiative (GRI), 2010. *GRI Sustainability Reporting Statistics:* Publication Year 2010. Amsterdam: Global Reporting Initiative

Global Reporting Initiative (GRI), 2011. Sustainability Reporting Guidelines. Amsterdam: Global Reporting Initiative

Gray, R., 2006. Social, environmental and sustainability reporting and organizational value creation? Whose value? Whose creation?, *Accounting, Auditing & Accountability Journal*, 19 (6), pp. 793-819

Gray, R., 2009. Is accounting for sustainability actually accounting for sustainability ... and how would we know? An exploration of narratives of organizations and the planet, *Accounting, Organizations and Society*, 35 (1), pp. 47-62

Gray, R. and Milne, M.J., 2002. Sustinability Reporting: Who's Kidding Whom?, *Chartered Accountants Journal of New Zealand*, 81 (6), pp. 66-70

Henriques, A. and Richardson, J. eds, 2004. *The triple bottom line, does it all add up?:* assessing the sustainability of business and CSR. London: Earthscan.

Higher Education Evaluation & Accreditation Council of Taiwan (HEEACT), 2008. *Ranking Organisations*. [online] Available at: http://www.heeact.edu.tw/lp.asp?CtNode=772&CtUnit=96&BaseDSD=7&mp=4&now
Page=1&pagesize=50 [Accessed in December 2011]

Infoscari, 2011. *Ca' Foscari vara il bilancio 2012: il Miur incorona l'ateneo come terzo d'Italia*. [online] 19th of December, 2011. Available at: http://www.unive.it/nqcontent.cfm?a_id=120339 [Accessed in December 2011]

Il Sole 24 Ore Radiocor, 2010. *Cina: rapporto ambientale obbligatorio per società quotate*. [online] Available at: http://archivio-radiocor.ilsole24ore.com/articolo-847874/cina-rapporto-ambientale-obbligatorio/ [Accessed in December 2011]

Jones, P., Selby, D. and Sterling, S., 2010. *Sustainability Education: perspectives and practice across higher education*. London: Earthscan.

Jucker, R., 2002. "Sustainability? Never heard of it!": some basics we shouldn't ignore when engaging in education for sustainability, *International Journal of Sustainability in Higher Education*, 3 (1), pp. 8-18

Kolk, A., 2005. Sustainability reporting, VBA Journaal, 21 (3), pp. 34-41

Kolk, A., 2008. Sustainability, Accountability and Corporate Governance: Exploring Multinationals' Reporting Practices, *Business Strategy and the Environment*, 17 (1), pp. 1-15

KPMG, 2008. Sustainability Reporting: A Guide. Australia: KPMG Australia.

Litten, L., 2005. *Measuring and reporting institutional sustainability*. In: Institutional Research, *Annual Forum of the Association for Institutional Research*. San Diego, California, 1st June, 2005. California: Institutional Research.

Lozano, R., 2011. The state of sustainability reporting in universities, *International Journal of Sustainability in Higher Education*, 12 (1), pp. 67-78

Mathur, V.N., Price, A.D.F. and Austin, S., 2008. Conceptualizing stakeholders engagement in the context of sustainability and its assessment, *Construction Management and Economics*, 26 (6), pp. 601-609

Milne, M.J., 1996. On sustainability; the environment and management account, *Management Accounting Research*, 7, pp. 135-161

Mio, C., 2001. Il Budget Ambientale: Programmazione e controllo della variabile ambientale. Milano, EGEA

O'Dwyer, B. and Owen, D.L., 2005. Assurance statement practice in environmental, social and sustainability reporting: a critical evaluation, *The British Accounting Review*, 37 (2), pp. 205-229

Pahuja, S., 2009. *Environmental accounting and reporting: theory, law and empirical evidence*. New Delhi: New Century Publications.

Pineno, C.J., 2011. Sustainability reporting by universities: an integrated approach with the balanced scorecard, *American Society of Business and Behavioral Sciences*, 7 (1), pp. 90-105

Quaddus, M.A. and Siddique, M.A.B. eds., 2011. *Handbook of corporate sustainability;* frameworks, strategies and tools. Cheltenham, UK: Edward Elgar.

Redclift, M., 2005. Sustainable Development (1987-2005): An oxymoron comes of age, *Sustainable development*, 13 (4), pp. 212-227

Rossi, G. ed., 2008. Diritto dell'ambiente. Torino: Giappichelli Editore.

Sammalisto, K. and Arvidsson, K., 2005. Environmental management in Swedish higher education: directives, driving forces, hindrances, environmental aspects and environmental co-ordinators in Swedish universities, *International Journal of Sustainability in Higher Education*, 6 (1), pp. 18-35

Scîntee, S.G. and Galan, A. ed., 2005. *Public health strategies: a tool for regional development*. Hellweg: Hans Jacobs Publishing Company

Shriberg, M., 2002. Institutional assessment tools for sustainability in higher education: strengths, weaknesses, and implications for practice and theory, *International Journal of Sustainability in Higher Education*, 3 (3), pp. 254-270

Smith, D. and Stephens, M. eds, 2003. *A community and its university: Glamorgan* 1913-2003. Cardiff, UK: University of Wales Press.

Stensaker, B. and Harvey, L., 2011. *Accountability in Higher Education: Global perspectives on trust and power*. New York: Routledge.

The G8 University Summit, 2008. *G8 University Summit: Sapporo Sustainability Declaration (SSD)*. [online] Available at: http://g8u-summit.jp/english/ssd/index.html [Accessed in December 2011]

Trani, E.P. and Holsworth, R.D., 2010. *The indispensable university: Higher Education, Economic Development and the Knowledge Economy*. Plymouth, UK: Rowan & Littlefield Publishers.

Trovati, G., 2011. *Politecnico Torino, sotto la Mole il record dei bonus. La classifica degli incentivi Gelmini a ricerca e didattica*. [online] Il Sole 24 Ore, 14th of January, 2011. Available at: http://www.unive.it/media/allegato/infoscari-pdf/sole24ore-14012011.pdf [Accessed in December 2011]

Tuft European Center, 1990. The Tallories Declaration. In: Tuft European Center, *International Conference on "The role of Universities in Environmental Management and Sustainable Development"*. Talloires, 1990, 4-7 October. Talloires: Tuft European Center.

Università Ca' Foscari Venezia (UCF), 2009. *Delegati del Rettore – Nomina*. Decreto n. 999. Venezia: Università Ca' Foscari.

Università Ca' Foscari Venezia (UCF), 2011a. *Ca' Foscari Sostenibile: Il report 2010*. Venezia: Università Ca' Foscari.

Università Ca' Foscari Venezia (UCF), 2011b. *Statuto di Ateneo*. Venezia: Università Ca' Foscari.

United Nations (UN), 2011. *United Nations Observances: International decades*. [online] Available at: http://www.un.org/en/events/observances/decades.shtml [Accessed in December 2011]

United Nations Educational, Scientific and Cultural Organisation (UNESCO), 2011a. *Education for Sustainable Development*. [online] Available at: http://www.unesco.org/new/en/education/themes/leading-the-international-agenda/education-for-sustainable-development/education-for-sustainable-development/ [Accessed in December 2011]

United Nations Educational, Scientific and Cultural Organisation (UNESCO), 2011b. *Venice and its Lagoon: Documents.* [online] Available at: http://whc.unesco.org/en/list/394/documents/ [Accessed in December 2011]

University Leaders for a Sustainable Future (ULSF), 2011. *Talloires Declaration Institutional signatory list*. [online] Available at: http://www.ulsf.org/programs_talloires_signatories.html [Accessed in December 2011]

Vogt, M., 2009. Achieving sustainable education: The "ecoworks" initiative, a practical case study to enhance second order change in learning in sustainability for higher education. Master Degree. Zurich: Swiss Federal Institute of Technology (ETH) Zurich.

World Business Council for Sustainable Development (WBCSD), 2002. *Sustainable development reporting: Striking the balance*. Geneva: World Business Council for Sustainable Development

World Commission on Environmental and Development (WCED), 1987. *Our Common Future*, Oxford University Press, Oxford.