

Understanding sustainability for socially responsible investing and reporting

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Abstract

Purpose – The purpose of this paper is to determine what types of sustainability activities companies are reporting and whether persons external to the companies understand how those reported activities correspond to the companies' narratives about sustainability. That is to ascertain how people interpret the meaning of the activities included in the sustainability reports.

Design/methodology/approach – From a sample of sustainability reports prepared by Global Reporting Initiative (GRI) guidelines, the authors identified the distinct activities reported. The authors prepared a survey comprised of these activities and asked a sample of people knowledgeable about business and investing to evaluate each activity on the extent to which they are relevant to sustainability performance. The responses were then factor analyzed to identify the most important dimensions of sustainability these persons employed to relate the activities to sustainability.

Findings – The dimensions employed by the subjects differed in some significant ways from those dimensions used to construct the GRI format. Subjects evaluated sustainability efforts as primarily efforts of being a good citizen with sustainability an end in itself rather than as constraint to be respected in achieving profitability goals.

Research limitations/implications – The study is a first attempt so results are preliminary, i.e. suggestive but not definitive. Though preliminary an intriguing implication is that closure on a sustainability reporting structure would be premature. More effort needs to be devoted to provide more clarity on the concept of corporate sustainability and what its implications are for corporate behavior.

Practical implications – Given the results that sustainability be regarded as a corporate end, what is the role of the corporation in society seems still to be disputatious. Sustainability may not be something achievable without changes in corporate law.

Originality/value – The study is an early attempt to assess the potential alternative narratives about corporate sustainability. Its value lies in providing insights into the age-old question of what should be the role of the corporation in a free society.

Keywords CSR, Sustainability, Global reporting initiative, Sustainability reporting, Stakeholder narratives
Paper type Research paper

Introduction

A Google search of “Socially Responsible Investing” will yield nearly 2,000,000 results, indicating the extent of interest by investors for investing in firms that are sustainable in the long run. Socially responsible investing has been a significant component of the investing landscape for at least the past 50 years (Rockness and Williams, 1988). As the persistence of problems, most notably environmental ones associated with climate change, have made a business response more-and-more mandatory, the terminology of corporate social responsibility has evolved. Today it is more common for firms to refer to their “sustainability” efforts in recognition that social responsibility is no longer a choice but is



essential to sustaining a firm's long-run viability. According to Morgan Stanley (2017, p. 1), "Sustainable investing is surging, having enjoyed a 135% increase in assets under management since 2012 to \$8.72 trillion, and it's still growing." Now, even sustainability investing is in transition into a new approach now labeled environment, social, and governance (ESG), with firms being expected to provide detailed information about their accomplishments *vis-à-vis* the environment, the community and society, and the way in which they are governed (Mahn, 2016). Responsible investors recognize that sustainability encompasses these three areas, and are seeking to invest in companies that communicate clearly that they recognize this.

Concomitant to the growth in sustainability investing is the development of systems of reporting information about firms' sustainability performance. Unlike financial reports, which have been shaped by centuries of business and financial practices, reports on the results of sustainability performance have yet to reach the structured status of financial reports. In producing information about sustainability, there is still considerable ambiguity about what sustainability, or ESG, means when viewed as a comprehensive narrative about sustainability performance and, therefore, what represents pertinent information about whether a firm is performing in ways that achieve sustainability goals.

Sustainability is a simple enough concept when viewed as a dictionary definition, but may have different meanings because of connotations that depend upon the context in which the term is applied or the perspective of those employing the term. Ambiguity about the meaning of sustainability arises in particular when a company is reporting on its sustainability practices. While some companies focus only on environmental sustainability, others view sustainability as a "three legged stool," including activities that are economically, environmentally, and socially responsible (Butler *et al.*, 2011). One well-known definition of sustainability, which focuses on sustainable development, is "development that meets the needs of the present without compromising the ability of future generations to meet their own needs" (United Nations World Commission on Environment and Development 1987)[1][2].

Because many more investors are becoming sensitive to how the companies in which they invest perform sustainably, an increasing number of companies are investing time and effort into producing reports that describe their sustainability practices (Rahman and Akhter, 2010). Sustainability reporting has emerged as a common practice of twenty-first century business. Where once sustainability disclosure was the province of a few unusually green or community-oriented companies, today it is a best practice employed by companies worldwide (Ernst & Young, 2016). However, companies do not pursue similar objectives, nor do they use the same metrics to gauge their sustainability activities, making comparison among these reports difficult (White, 2005). The resurgence in environmental and corporate sustainability reporting (CSR) also suffers from its being merely a resurrection of the 1970s view, i.e. "[...] the disclosure appears to be viewed with little or no skepticism regarding its purpose" (Cho and Patten, 2013, p. 446).

There are various reporting guidelines companies can follow, but one of the most prominent ones comes from the Global Reporting Initiative (GRI) (2015), an Amsterdam-based nonprofit organization comprising business, government, social advocacy and other stakeholders[3]. The Global Reporting Initiative (GRI) maintains a "Sustainability Disclosure Database" that provides access to an abundance of sustainability information voluntarily reported by companies. Any company that has compiled a sustainability report is eligible to register it with the GRI. However, reporting on any particular activities is not mandatory, although the GRI suggests nearly 80 sustainability activities (indicators) in six different dimensions. These dimensions are labor and decent work, economic, environment, human rights, society, and product responsibility (Global Reporting Initiative (GRI), 2011)[4].

The mounting importance of sustainability and its inclusion in companies' strategic initiatives may likely cause this type of information to be mandated in the near future and require assurance through a "unifying, global framework: that of integrated reporting"

(Global Reporting Initiative, 2014a). According to an Ernst and Young study, 47 percent of respondents use third-party assurance to add credibility to information presented to external shareholders (Ernst & Young, 2011). Attestation via audit reduces the risk of misstatements associated with sustainability reporting and sends a message that reports are relevant, reliable, and free from bias.

This study investigates the question of what sustainability activities mean to external recipients of CSR compared to the meaning implied by the organization of information suggested by the GRI framework for reporting about sustainability. In other words, we are seeking to learn whether activities reported by companies that are related to sustainability comprise a more-or-less coherent narrative about corporate performance that, when considered by external recipients, matches the implied structure of the narrative provided by GRI guidelines. Our study considers the concept of sustainability broadly as including environmental, economic, and societal performance, which has been referred to as the “three legged stool” or “triple bottom line” (TBL) (Butler *et al.*, 2011; Ernst & Young, 2011). The three-legged stool is consistent with an older concept of corporate social responsibility. This research is intended to provide preliminary insights into what stakeholders understand sustainability to mean, and to suggest sustainability activities and their interrelationships that need to be considered by corporations in their business processes when measuring and reporting them.

The remainder of this paper is organized into the following sections: a brief history of CSR reporting; a discussion of the narrative nature of corporate reports; stakeholder perceptions of sustainability actions; what sustainability information is reported by firms and how is it organized; what sustainability message is being received, i.e. how do external recipients of company reports organize the same information; concluding remarks.

Corporate sustainability and corporate reporting

Since the publication of the classic work by Berle and Means (1932), there has been continuous argument over what the role of the private corporation should be in a democratic society and, thus, what the responsibilities of its management should be[5]. The “classical” view of the role of the corporation is most succinctly stated by Friedman (1970), who claimed that the sole responsibility of the corporation is to singularly pursue profits for its shareholders. An alternative narrative about the role of the corporation grew in prominence after the Second World War with the scientization (Whitley, 1986) of the business disciplines and achieved its greatest prominence during the 1960s and 1970s. This alternative narrative about the corporation’s role has been labeled by Danley (1994) as “managerialism.” Managerialism is the notion that the corporate manager is a professional equipped with the tools of scientific management, who performs as an economic statesman, that is, he manages the corporation cognizant of the multiple effects corporate action has on many identifiable social groupings (stakeholders)[6]. Corporations have relationships with other than shareholders, and failure to act responsibly in those relationships will affect shareholders in both the short and long runs. Stakeholder theory is a theory of organizations developed initially by Freeman (1984) and is based on a managerialist narrative of the purposes of the corporation. Freeman’s (1984) definition of a stakeholder is “[...] any group or individual who can affect or is affected by the achievement of the organization’s objectives” (p. 46). Unlike the classical economic model of the organization as a receptacle of inputs from capital and labor providers to produce outputs for customers (with profit being the singular motive), stakeholder theory “[...] describes the corporation as a constellation of cooperative and competitive interests possessing intrinsic value” (Donaldson and Preston, 1995, p. 66). Thus, the stakeholder theory of organizations implies a role for management not as one solely focused on managing inputs of capital and labor, but one of managing “stakeholders,” i.e. the “[...] simultaneous attention to the legitimate interests of all appropriate

stakeholders” (Donaldson and Preston, 1995, p. 67) for the long-run survival of the firm. Unlike the standard economic view of organizations as mechanisms for turning inputs into outputs in an “economically” efficient way (the engineering approach (Sen 1988)), the stakeholder theory contains a normative element. It acknowledges that corporations are not simply nexuses of private contracts (Greenfield, 2006) nor is shareholder value the only responsibility of corporate managers (Stout, 2012). Corporations are responsible for the consequences of their conduct. Just as persons are responsible to others, the managerialist view is that corporations likewise have responsibilities to others.

A typical early expression of managerialism was provided by the Committee for Economic Development (CED) (1971):

The modern professional manager also regards himself, not as an owner disposing of personal property as he sees fit, but as a trustee balancing the interests of many diverse participants and constituents in the enterprise, whose interests sometimes conflict with those of others (p. 22).

The rationale most frequently provided for this socially responsible management is “enlightened self-interest,” which is as follows:

There is a broad recognition today that corporate self-interest is inexorably involved in the well-being of the society of which business is an integral part, and from which it draws the basic requirements needed for it to function at all – capital, labor, customers (sic). There is increasing understanding that the corporation is dependent on the goodwill of society, which can sustain or impair its existence through public pressures on government. And it has become clear that the additional resources and goodwill of society are not naturally forthcoming to corporations whenever needed, but must be worked for and developed (CED, 1971, p. 27).

During the 1970s, this narrative of the role of management went under the descriptor “corporate social responsibility” (Gambling, 1974; AICPA, 1977; Estes, 1972; Human Resources Network, 1975; Ramanathan, 1976; Chen, 1975, Bauer and Fenn, 1972). The ideas of social reporting and the social audit gained prominence in the early 1970s through the recognition that the modern business corporation, because of its size and power, and thus visibility, affected society, not just parties directly associated with the production process of the company (Danley, 1994). Many of the themes of CSR (e.g. environmental stewardship and employee welfare) have recently been incorporated under the rubric of “sustainability” to reflect a new urgency to the importance of these themes to the long-term success of the enterprise. The enlightened self-interest rationale for CSR made this case that acting in socially responsible ways came at no cost to profitability. Because of changing in societal values, doing right things would translate into making money. A similar but more urgent rationale is now being provided for sustainability (Laszlo and Zhexembayeva, 2011; Esty and Simmons, 2011; Andrew and Cortese, 2013)[7].

Corporate sustainability is a response to the environmental realities of climate change, species extinction, and resource decline. Contributing to the CSR movement of the 1970s was The Club of Rome report in 1972 (Meadows *et al.*, 1972), which raised the alarm about the global system feedback loops that predicted dire environmental consequences should the trends continue. Sustainability has an even greater urgency since the 30-year follow-up study to the Club of Rome report (Meadows *et al.*, 2004) indicates the environmental crisis described in the 1972 report has worsened rather than improved. Leading management scholars and consultants on corporate sustainability described the situation as follows:

[...] never before have we seen the speed, extent, and magnitude of resource loss that we observe now. Whether it is soil, water, nutrition, a stable climate, or social equity as measured by the rich-poor gap, the list of declining resources in question is relevant for nearly the entire global economy, with no company left unaffected. And that, in turn, creates a fundamental change in how companies compete to create enduring value (Laszlo and Zhexembayeva, 2011, pp. 9-10).

Reminiscent of the CED narrative from 1971, these authors see the remedy for declining global resources in a new paradigm still centered on business and corporate action, i.e.:

We are committed to sharing an exciting but largely invisible story of a shift in the conduct of business. In the new narrative (emphasis in original), the gloom and doom of declining resources is also the foundation for opportunity, an emerging paradigm of business that can be more sustainable and (emphasis in original) profitable (Laszio and Zhexembayeva, 2011, p. 9).

This proposed new narrative is not all that new. It shares many features with the CSR one from 40 years ago. Then, CSR was alleged to translate into financial success; now sustainability will likewise translate into financial success.

Just as the social reporting/social audit movement encouraged the development of reporting schemas that could be audited to provide transparency on corporate social performance to various constituents (e.g. AICPA, 1977; Belkaoui, 1984), sustainability has led to the development of reporting schemas for providing transparency for corporations' sustainability efforts. Indeed, the fostering of sustainability within the corporate world requires it, i.e., "Integrated business practices and reporting are key factors in fostering sustainability" (Brockett and Rezaee, 2012). Even though CSR/sustainability reporting has been around for over 40 years, there has yet to arise an integrated reporting system that corresponds to the narrative about being profitable by being socially responsible. In the next section, we will discuss the conceptual difficulties with creating such a system.

The problem of a structured narrative for sustainability reporting

Over its history, CSR/sustainability reporting has clung to a tripartite rubric of corporate performance. Though the elements of that performance have changed over time (operating in South Africa no longer carries the stigma it did before apartheid was eliminated), the reporting model is still ably described by the terminology "TBL". The TBL emphasizes three basic elements of performance deemed most relevant for CSR/sustainability. Financial performance, the traditional bottom line, is one dimension reflecting the economic values attributable to corporate actions. Within the classical managerial narrative this is the only bottom line with which a corporation should concern itself (Danley, 1994). Fulfilling social and environmental values (Elkington, 2004) represent the remaining two dimensions of reporting.

TBL reporting is intended to provide information to the various stakeholders that will permit them to assess the performance of any corporation with respect to each of economic, social, and environmental performance. How the various "metrics" or "indicators" representing such a wide variety of actions are integrated by any stakeholder into a comprehensive and coherent assessment of overall performance is, as yet, not well understood. There is substantial research suggesting that various stakeholder assessments of corporate sustainability performance are, at best, only weakly correlated or even inversely correlated to the amount of TBL reporting that is provided by the companies themselves. This has led some academics to the conclusion that the substance of CSR is merely public relations (Milne and Patten, 2002; Laufer, 2003; Freedman and Patten, 2004; Milne *et al.*, 2006; Deegan *et al.*, 2006; Cho and Patten, 2007; Duchon and Drake, 2009).

Bayou *et al.* (2011) introduce McCumber's (2005) concept of "situating" to characterize the nature of "truth" in accounting:

Accounting information systems (bookkeeping) basic foundational structure is essentially the chronological situating of the facts of the occurrences of specific events to be remembered over a timeline proceeding from the past to the present [...]. Thus, the narrative of accounting is focused on responsibilities fulfilled or not fulfilled; it is a narrative that has historically been intended to provide the reliable memory about the important events that occurred in the past in order to determine what are the consequences up to now [...] (Bayou *et al.*, 2011, p. 118).

What TBL reporting purports to do is to broaden the narrative about consequences of corporate actions to include events that affect the long-term sustainability of a firm, which broadens the responsibilities and strategic horizons of corporate management. The complexity of managing these broadened responsibilities can be illustrated via a simplified model adapted from Williams (2010, p. 27) and Bayou *et al.* (2011, p. 121), which is developed below.

The first of the TBLs representing the economic dimension is a highly structured narrative (or codified discourse (Llewellyn and Milne, 2007)) about the role of the corporation in society that corresponds to the classical model. It takes the form of the familiar accounting equation:

$$\text{Net income} = \text{Revenues} - \text{Expenses}$$

It is structured because the terms of the expression are defined by an elaborate regulatory bureaucracy consisting of standard-setters (e.g. FASB, IASB), governmental regulatory bodies (e.g. SEC, IRS, HMRC), and legislative bodies (e.g. US Congress, UK Parliament). In addition, centuries of commercial practices and business cultures influence the bureaucratic apparatus that specifies what activities constitute those that lead to “revenues” and what activities lead to “expenses.” Bayou *et al.* (2011) provide an expanded version of this expression that illustrates the fundamental value judgments underlying this representation of corporate economic success and how this expression implicitly contains the activities represented by the other two of the TBLs, but at the same time suppress their fulfillment, thusly:

$$\text{Gross income of shareholders} =$$

$$\text{Revenues} - (\text{Payments to: labor, suppliers, creditors, governments}) - (\text{Net externalities})$$

The payments to labor, suppliers, creditors, and governments are part of the gross incomes of those stakeholders and, within the classical model of corporate purpose being the maximization of shareholder gross income, this implies that management actions must be simplistically geared toward privileging the short-term income of shareholders over those of other stakeholders. The last expression, “net externalities,” is presumed to be taken care of by the rules of the economic game (Friedman, 1970) comprised of market forces, laws that make certain actions illegal, and social/business customs. Net externalities represent the positive and negative effects of corporate actions that make up the social and environmental values that comprise the remaining two bottom lines of TBL that are not easily represented in financial terms[8]. The GRI labels for the components that make up net externalities are currently environment, human rights, labor practices and decent work, product responsibility, and society.

TBL reporting presumes a managerial, rather than a classical, model of the corporation since it advocates for the corporation taking ownership of its social and environmental externalities and managing them so as to internalize the negative ones and create more of the positive ones. Rearranging the income equation once again we get a representation of corporate responsibility implied by TBL, i.e.[9]:

$$\begin{aligned} \text{Revenues} = & \text{Gross income of shareholders} + \text{Gross incomes of other stakeholders} \\ & + \text{Net positive externalities} \end{aligned}$$

Corporate resources that flow from the customer (a primary stakeholder) are available for providing benefits, either financial or otherwise, to all of the other stakeholders with none occupying the principal place in the objective function[10]. The resources the corporation has available may be used for a multiplicity of outcomes affecting various stakeholders

none of which necessarily takes priority over the others, which makes the management task more complex since multiple objectives exist and must be traded off. An obvious problem with such tradeoffs is that social and environmental effects represent the as yet unstructured portion of the managerial narrative about CSR/sustainability. Were we able to achieve what Gambling (1974) proposed as the ideal measurement scheme of monetizing social and environmental outcomes, then profit would be a comprehensive indicator of sustainable corporate performance. However, such a prospect is very unlikely (Jensen, 1977) since these outcomes involve incommensurate values[11].

Corporate environmental and social performance reporting focuses on describing activities and their outcomes deemed to lead to positive net externalities. Various groups (e.g. GRI, Sustainability Accounting Standards Board) have proposed reporting formats or rubrics for identifying and organizing information about externality affecting activities. That is, there are more efforts being made to create a structure for corporate social and environmental performance reporting to match the structured nature of economic performance. Recent efforts by some of the world's largest corporations (e.g. Walmart, Coca Cola) to become more sustainable are emphasizing what Dauvergne and Lister (2013) have described as "eco-business." The sustainability narrative of eco-business is one of being profitable by doing good and is substantively about maintaining control over and access to vital natural resources (e.g. water and "eco-efficiency"), which Dauvergne and Lister (2013, p. 58) describe as conserving energy, managing material usage through reductions and recycling, reducing toxins, and reducing water usage. The focus is on cost reduction and is not a dramatic departure from the way business has described social responsibility/sustainability for nearly half a century – eco-business pays off through lower costs and more secure supply chains. The social and environmental values pursued most energetically seem to be those that demonstrably contribute to achieving long-run economic success. This view of "sustainable development" has been subjected to rather extensive critiques (e.g. Gray, 2010; Milne *et al.*, 2006).

Stakeholder perceptions of sustainability activities

As noted previously, the most prevalent attempt to date to provide a structure to the narrative about the net externalities component of corporate sustainability is that of the GRI. The GRI provides dimensions under which activities are classified that allegedly contribute to fulfilling social and environmental values. Companies are encouraged to report their sustainability activities under the various dimensions in order to provide consistency and comparability with respect to assessing social and environmental values fulfillment. But whether the GRI actually represents a coherent system of reporting depends on whether the activities reported by various companies are interpreted by the various stakeholders in the same manner as implied by the GRI framework. To be a structured narrative like that for financial reporting, the activities reported by companies should imply the achievement of sustainability ends across recipients of the companies' reports. The activities reported should situate the company as a sustainable or socially responsible company just as an income statement permits situating the company as a profitable or unprofitable one. Such reports would facilitate social responsibility investing as well as giving assurance to other stakeholders that the firm is a trustworthy steward of those things stakeholders value. So the narrative about corporate sustainability should convey a reasonably common message among investors and other external users of corporate reports. Activities reported should imply companies are pursuing the same objectives across stakeholder groups.

There is extensive research concerning the contents of CSR. One criticism of CSR is the extent to which what is reported and how it is reported is still largely at the discretion of management. The research reported in this paper is an initial effort to understand

whether “sustainability” under the GRI framework represents a shared understanding of sustainability about corporate performance received by external parties. We are making a preliminary attempt to address a significant question recently raised by Milne (2013, p. 143):

At the heart of assessing corporate “sustainability” reporting are fundamental differences about what corporate reporting for sustainability *means* (emphasis in original) and, implicitly within these differences, what purposes it serves (or might serve), and whose interests are (or might be) served by it. What is to be sustained?

To achieve our overall research objective, we performed a number of preliminary steps. These steps comprise a process of distillation to arrive at a set of activities that can be confidently classified as representing a particular GRI dimension. These activities were then employed in a factor analysis of external users’ perceptions of the dimensionality of these activities. The result is a set of sustainability dimensions from the perspective of those viewing the firm from the outside.

“Sustainability” reported: what actions do corporations report?

To ascertain what actions companies include in their GRI reports, we employed content analysis, which is a grounded theory approach (Glaser and Strauss, 1967) for making valid inferences from text-based data (Krippendorff, 1980). A sample of companies was drawn from the GRI Sustainability Disclosure Database (GRI, 2011) of USA sustainability reports. We used a diverse sample in our analysis, as well as a purposeful sampling strategy to capture heterogeneity (Maxwell, 1996). The sample included companies in industries that are known to be “embracers” and those known to be “cautious adopters” of sustainability practices as well as those that fall in between (Haanaes *et al.*, 2011). We determined that selecting 15 companies would include the diverse types of industries identified by Haanaes *et al.* (2011). To determine the companies in each industry, we randomly selected companies listed in the Sustainability Disclosure Database until we had one from each of our 15 predefined industries. If more than one company was selected from a given industry, we only included the first in our selection of 15. Our study is based on the activities that companies report under sustainability dimensions so the particular companies are not of interest. The companies’ purpose for us is simply to provide a diverse set of sustainability activities that are actually reported. Since each of the approximately 40-100 page reports describes many activities, our resulting sample of activities ended up being quite large. Table I presents the 15 companies randomly chosen for our sample.

The GRI reports of the 15 companies were thoroughly read and analyzed by the authors. The focus of our analysis was the identification of activities engaged in by the companies that pertained to achieving economic, environmental, or social values. “Activities” was interpreted broadly to include policies, programs, or specific actions that the companies deemed reportable either quantitatively or qualitatively as significant for telling their sustainability stories[12]. In other words, the activities conveyed meaning to stakeholders about the companies’ sustainability performances. We next categorized each of the activities

| | | | |
|------------------------|------------------|------------|--|
| Abbott | Dresser Rand | LG | Table I. Company sustainability reports analyzed |
| Alcoa | ExxonMobil | Mohawk | |
| AT&T | Fifth Third Bank | Toshiba | |
| Caterpillar | Haworth | Volkswagen | |
| Coca-Cola Bottling Co. | Intel | Walmart | |

as belonging to one of the GRI dimensions, which classify activities based on general guidelines[13]:

- (1) Economic – activities that describe how a company affects the economic conditions of its stakeholders and systems, locally, nationally, and globally.
- (2) Environment – activities that affect both living and non-living systems of nature.
- (3) Human rights – activities that indicate how a company considers human rights in its daily operations, specifically with regard to suppliers and contractors.
- (4) Society – activities that specify how a company affects its communities and the risks that result from interactions with other social entities.
- (5) Product responsibility – activities that describe how a company’s products and services directly affect the well-being of customers.
- (6) Labor – activities that are recognized and defined by a variety of universal labor standards set forth by the United Nations and others (GRI, 2015).

The categorization process consisted of several steps that involved six people (the researchers and graduate research assistants), who enabled cross-checking to minimize classification ambiguity. First, GRI reports were read for the purpose of identifying reported “activities” (as defined above). Next, one set of researchers categorized these activities as belonging to one of the six GRI dimensions. Then, those categorizations were verified independently by a second set of researchers. Thus, if a reported activity was related to sustainability, but did not specifically refer to a GRI dimension or for which the two groups of researchers could not reach consensus, we made note of the activity for later categorization. We identified two such additional, non-GRI categories upon which companies were reporting, which we labeled “governance” and “risk and responsibility (categories combined in Table II)[14].” If an activity in a report was not related to any dimension of sustainability, then it was not categorized. For example, an activity found in Intel’s report we deemed not related to sustainability is: “We sell our products primarily to original equipment manufacturers (OEMs) and original design manufacturers (ODMs).” Statements like these were not included in any of our categorizations of sustainability activities. Table II provides some examples of GRI performance indicators (activities) found in our sample.

The initial identification and categorization process resulted in 476 sustainability activities across the 15 sustainability reports. These data enabled us to ascertain what activities within GRI dimensions US companies are emphasizing.

Our content analysis revealed a number of sustainability activities within each dimension (Table III). Our research indicates that the following dimensions (in order of

| Dimension | Example sustainability activity |
|---------------------------------|---|
| Economic | Financial implications and other risks and opportunities for the organization’s activities due to climate change |
| Environment | Percentage of materials used that are recycled input materials |
| Human rights | Total number of incidents of discrimination and corrective actions taken |
| Labor practices and decent work | Return to work and retention rates after parental leave, by gender |
| Product responsibility | Total number of incidents of non-compliance with regulations and voluntary codes concerning health and safety impacts of products and services during their life cycle, by type of outcomes |
| Society | Percentage of operations with implemented local community engagement, impact assessments, and development programs |

Table II.
Example GRI
sustainability
activities

Table III.
Initial content analysis of sustainability activities^a

| | Environment | Labor | Economic | Society | Human Rights | Product responsibility | Risk + governance | Total |
|------------------------|-------------|-------|----------|---------|--------------|------------------------|-------------------|-------|
| Abbott | 3 | 2 | 1 | 4 | 6 | 0 | 0 | 16 |
| Alcoa | 9 | 3 | 0 | 4 | 6 | 1 | 1 | 24 |
| AT&T | 9 | 4 | 2 | 4 | 1 | 2 | 0 | 22 |
| Caterpillar | 12 | 5 | 7 | 5 | 4 | 7 | 0 | 40 |
| Coca-Cola Bottling Co. | 11 | 7 | 11 | 8 | 4 | 4 | 2 | 47 |
| Dresser-Rand | 6 | 4 | 2 | 0 | 1 | 0 | 0 | 13 |
| ExxonMobil | 6 | 5 | 6 | 2 | 3 | 2 | 2 | 26 |
| Fifth Third Bank | 7 | 0 | 4 | 7 | 6 | 1 | 1 | 26 |
| Haworth | 8 | 2 | 0 | 5 | 3 | 5 | 0 | 23 |
| Intel | 8 | 8 | 7 | 8 | 5 | 8 | 5 | 49 |
| LG | 8 | 12 | 12 | 5 | 2 | 3 | 2 | 44 |
| Mohawk | 4 | 11 | 6 | 4 | 0 | 1 | 2 | 28 |
| Toshiba | 10 | 3 | 8 | 5 | 6 | 5 | 5 | 42 |
| Volkswagen | 13 | 10 | 6 | 7 | 3 | 3 | 2 | 44 |
| Walmart | 10 | 2 | 4 | 6 | 3 | 7 | 0 | 32 |
| Total | 124 | 78 | 76 | 74 | 53 | 49 | 22 | 476 |
| Average per report | 8.27 | 5.2 | 5.07 | 4.93 | 3.53 | 3.27 | 1.47 | |

Note: ^aThe list of all 476 activities is available from the corresponding author upon request

number of activities) are being reported on the most: environment, labor, economic, and society. For the companies analyzed, activities pertaining to environmental far outnumbered any other type of sustainability effort. This is hardly surprising given that the term “sustainability” emerged from ecology and the study of natural systems connoting the ability to perpetuate existence in the natural environment. The other most numerous reported activities are in dimensions that are reflective of corporate social responsibility more than sustainability, *per se*, and are dimensions that have persisted since the CSR of the 1970s (Rockness and Williams, 1988).

Of the 476 activities reported, there is a range among the companies of 36 in the total number reported: Dresser Rand reported just 13, while Intel reported 49 (Intel, Coca Cola, LG Electronics, Volkswagen, Toshiba and Caterpillar reported the most activities for sustainability). This reflects the still discretionary, unstructured, and variable nature of sustainability reporting. Unlike reporting of economic activities, highly structured by custom and the regulatory apparati that exist, what and how social and environmental activities are reported (qualitatively or quantitatively) is at the discretion of management. Lacking the structure of financial reporting, there is neither consensus on what is germane to sustainability’s aim nor consensus on how the results of common sustainability initiatives should be reported. Furthermore, there is no information that provides links to the financial reporting bottom line. The two “sets” of information are not integrated.

The 476 activities are raw data that reflect only the unique way a particular company described those activities. We noted that although descriptions of activities varied, what is described is often the same. To use a financial reporting analogy a company might report credit sales as “accounts receivable” while another might do so as “due from customers.” So for the 476 separate sustainability activities, we reconciled dissimilar descriptions of similar activities from multiple companies into single activities following a careful item development process suggested by Nunnally (1978). For example, one report stated that “the company continually improved its safety practices, processes and performance,” while another company stated that they “performed daily safety walkthrough in facilities to identify and correct any problems.” We identified these two descriptions as being of the same sustainability activity of improving employee safety, which came under the dimension

of “labor practices and decent work.” We judged from their descriptions that they are similar enough that we could combine them into a single activity. Through this reconciliation process we identified that there are 145 unique sustainability activities embedded in the 476 descriptions contained in the 15 reports. As a means to validate these categorizations, we engaged the services of an expert judge, an internationally known expert in sustainability reporting, who assessed the content validity of the list. Edits were made based on this expert’s feedback. This ensured we had adequately tapped into the content area. The list of unique activities was rephrased to become the initial survey items we utilized to address our research objective.

The results of the reconciliation analysis are presented in Table IV. The four most prominent dimensions in terms of unique activities reflect the same dimensions that have persisted over time as central to CSR. The largest number of unique sustainability activities reported belongs to the society dimension followed by economic, labor, and environment. Although the reports tend to emphasize the environmental dimension, interestingly, there were fewer unique activities in this dimension indicating there is more common recognition across companies about what constitutes relevant responsible environmental behavior[15]. The society dimension had significantly more activities associated with corporate sustainability indicating companies believe they can support sustainability in more ways when considering society than they do when considering the environment. Thus, there is less agreement among companies about what represents appropriate activities for corporations to fulfill their responsibilities as members of society than as environmental stewards. This is not particularly surprising since what constitutes good environmental stewardship can be discerned via natural science research, i.e. there is some scientific basis to deciding good and bad environmental stewardship. What constitutes a good society is much less amenable to scientific direction and depends more on moral discernments, which the “merchant caste” (Priestland, 2013) that epitomizes corporate values may not accept.

The differences in number between the most unique activities (society) and the least (human rights) are likely attributable to the interactions of diversity of the industries, the importance given to each dimension by companies, and the consensus about common activities clearly identified with each dimension. “Society” has the most unique activities because all companies want to be seen as good for society, yet each company has many idiosyncrasies including industry, diversity of societies in which it operates, management’s political/moral philosophy about what a good society means, etc. On the other hand, not all companies imagine they have a proactive role to play in improving the state of human rights in the world or that their activities can have any significant effect on the issue of human rights around the world[16].

We then reviewed all activities in each dimension to see if there were any commonalities among types of activities reported. The following list shows results of our analysis. For each dimension, the most commonly mentioned activities are provided along with a

| Dimension | Number of unique activities reported |
|-------------------------------------|--------------------------------------|
| Society | 35 |
| Economic | 27 |
| Labor | 25 |
| Environment | 23 |
| Risk and compliance | 14 |
| Product responsibility | 13 |
| Human rights | 8 |
| Total sustainability ideas analyzed | 145 |

Table IV.
Content analysis
of sustainability
activities after
reconciliation

representative example of how an activity was reported. For example, within the “Labor” dimension, activities contributing to employee health were the most prevalent. Activities creating career opportunities and developing corporate culture were also reported across the 15 companies. Main activities in each dimension and specific company examples represents the types of activities associated with each dimension considered most frequently by the companies for reporting on success in each dimension. Thus, we have a view of the narrative structure of corporate activities provided by the GRI and the companies themselves.

Main activities in each dimension and specific company examples are as follows.

Society dimension:

- (1) Educational opportunities:
 - Haworth: “Provided educational programs for underprivileged children, tuition reimbursement, and scholarships.”
- (2) Employee volunteering:
 - Intel “Engaging the employees in meaningful volunteer experiences positively impacts their satisfaction and pride, and help us attract and retain talented people.”
- (3) Supporting charitable causes:
 - Caterpillar “Give generously [...] supporting educational and environmental causes, health and human services, culture and art and civic and community foundation.”
- (4) Women and minorities:
 - Walmart “Helped nearly 8,000 women gain access to meaningful employment and financial security in the USA.”

Economic dimension:

- (5) Supporting businesses:
 - Intel: “Intel’s non-US sites significantly impact the economies of countries around the world, e.g., in Costa Rica jobs created and local industries supported.”
- (6) Supporting/Seeking sustainable ideas:
 - Coke: “Looking for new innovation and ideas and learn from the sustainability successes from colleagues in Norway and Sweden.”

Product responsibility dimension:

- (7) Environmentally friendly (fair) products:
 - LG: “Awarded sustainable product certifications and several other “green awards” for our products.”
- (8) Recyclable materials:
 - Haworth: “Choose products based upon their recyclability or recycled content, have PVC-free products, and carbon neutral products.”

Environment dimension:

- (9) Environmental policies:
 - Toshiba: “Environmental management is guided by 3 key concepts: greening of process, greening of products, and greening by technology.”

(10) Renewable energy sources:

- Abbott: “Use wind-solar hybrid technology to run our plants.”

(11) Goal setting and measurement:

- Intel: “Reducing PFC emissions 45% in absolute terms and over 80% on a per chip basis.”

Human rights dimension:

(12) Policies and training:

- Toshiba: “Provided human rights education for new recruits and employees at the at the time of promotion and management positions; also had lectures on harassment.”

(13) Diversity:

- Fifth third: “Have a diversity council that regularly meet with senior management to enact diversity and discuss initiatives.”

Labor dimension:

(14) Enhanced healthcare:

- Intel: “Created a portfolio of health benefit plans and wellness programs designed to encourage employees to evaluate, improve, and maintain their health and the health of their families.”

(15) Career development:

- Abbott: “Launched a rigorous training program to improve quality assurance practices at operational sites.”

(16) Corporate culture:

- Mohawk: “Believe in open, direct and constructive dialogue between workers and management to reach mutually agreeable solutions in workplace issues.”

Risk dimension:

(17) Business risk assessment:

- Mohawk: “Audit their overseas suppliers before signing any contractual agreements.”

(18) Employee corruption risk:

- Volkswagen: “Have an international hotline of lawyers to answer questions from all employees.”

Sustainability message received: report users perceptions of sustainability activities

From the 145 unique activities we developed the instrument used in our factor analysis of stakeholder perceptions of sustainability activities. Our survey development approach follows the methodology of Churchill (1979) and Straub (1989). Once we distilled the 476 descriptions of sustainability activities to 145 descriptions of unique activities, our next step was to engage a focus group to evaluate the 145 items for clarity and to validate our categorizations. This group consisted of 28 MBA students familiar with corporate sustainability and TBL reporting. Each of the 28 people independently read the 145 statements and categorized each one as belonging to a single GRI sustainability

dimension, as belonging to more than one GRI dimension, or not applicable to any of the GRI sustainability dimensions. The result of this process was an array of classifications of 145 items into GRI dimensions. In each cell of the array was the number of focus group members who placed an item in a particular dimension. Given there were 28 evaluators, any item count of 14 or above in any GRI dimension meant that at least 50 percent of the evaluators agreed that the item belonged there. That is, a tally of ≥ 14 indicated a plurality agreed an activity belonged in only one particular GRI dimension.

Applying a majority decision rule left 71 unique activities classified uniquely in one GRI dimension to include in our preliminary survey. The survey instrument consisted of questions in the form of probe statements that required Likert-scale responses, 1 = not at all important to 5 = very important, in order to answer the following question: “How important do you think these activities are to an organization achieving corporate sustainability?” A list of the 71 activities included in the survey is reproduced in the Appendix.

We then administered a pilot of the survey to 25 respondents. The result of the pilot indicated no additional revisions were required in the wording of the statements. We then administered the survey to an additional $n = 94$ respondents. Demographic data from our respondents show that we have good variability with regard to economic characteristics. Our respondents’ income levels range from less than \$10,000 to over \$150,000 with the median range being between \$70,000 and \$79,999[17]. Based on exploratory factor analysis and reliability heuristics (Nunnally, 1978), 45 activities emerged as the most important. We did a comparison between our content analysis data and our survey data. Specifically, we compared the stakeholder views of the activities to how the companies reported these same activities. This told us if companies are reporting the same information that stakeholders view as most important and whether companies’ sustainability narratives are consistent with the stakeholders’ sustainability narratives.

Factor analysis

Results of the factor analysis and scree plot are very interesting, especially when compared to our findings from the content analysis of sustainability reports. Six factors emerged from the data (Table V) and the exploratory factor analysis revealed 45 of our 71 survey items to be the most important and reliable in terms of survey methodology. The breakdown of these 45 survey items is shown in Table V.

After reviewing the items in the six factors that emerged from our analysis, we were able to name the construct they described, which is different than the GRI framework, the most recognized reporting framework used by companies and the one we used to categorize the activities from our content analysis (Table VI). A new factor of “risk and compliance” emerged among the activities. Another factor that emerged included items that were in various categories in the GRI, but held together during exploratory factor analysis into a factor we identify as “community building.” These community building activities were in several of the dimensions of the GRI, but what is important is that our sample of respondents viewed community activities as more important than societal actions that would not directly affect them. The GRI includes one dimension for “Labor and Decent Work” with various suggested activities, but our sample companies reported other labor-related activities. Exploratory factor analysis suggests that our sample viewed “labor” as two dimensions rather than one which we named “employment opportunities” and “employee information/education,” with more respondents being concerned about societal labor activities that give employees opportunities. What is interesting is that Factors 7-10, which did not have high factor loadings (i.e. factor loadings < 0.50), include activities that are primarily in the GRI dimensions of “product responsibility” and “economic.” So, what our preliminary data revealed is that US companies filing GRI reports are emphasizing economic and product responsibility

| Factor | Item | GRI dimension | |
|--|--|--|-------|
| Environmental stewardship | Measure and disclose climate change strategies (e.g. carbon disclosure project) | Environmental | |
| | Work with locals to reforest land that improves rainwater infiltration and reduces erosion | Society | |
| | Deploy technology that captures and reclaims greenhouse gas emissions ordinarily vented into the atmosphere | Environmental | |
| | Increase recycling rate | Environmental | |
| | Incorporate green design standards and building concepts into the construction of facilities | Environmental | |
| | Utilize wind power in plants | Environmental | |
| | Save tons of paper and plastic through packaging and shipment redesigns, thus reducing landfill waste | Environmental | |
| | Use innovations that utilize an agricultural input to reduce independence on petroleum | Economic | |
| | Establish a take back program in order to recycle used products and comply with the European Union regulations | Product Responsibility | |
| | Minimize climate impact by reducing emissions, increasing efficiency, and changing the method of sourcing and using energy | Economic | |
| | Commit to purchasing renewable energy credits | Environmental | |
| | Utilize solar power in facilities | Environmental | |
| | Strive to make products “green” and eco-friendly | Product Responsibility | |
| | Develop effective processes to prohibit the uncontrolled release of pollutants (e.g. wastewater, sulfur dioxide, nitrous oxide) | Environmental | |
| | Work to sustain biodiversity (conserve the flora and fauna) in the areas of operation | Environmental | |
| | Reduce power consumption for operating activities (e.g. air conditioning) | Environmental | |
| | Create products or services using hybrid technology | Environmental | |
| | Conserve water consumption in company facilities worldwide | Environmental | |
| | Risk and compliance (mitigation of corporate risk) | Implement a rigorous training program to improve quality assurance practices at operational sites for employees and contractors | Labor |
| | | Corporate business groups monitor performance (including training, management tone, risk assessment, and more) on a quarterly basis and send the results to the Ethics and Compliance Program Office | None |
| Have a process that informs senior management and the board about misconduct issues including periodic reports of overall misconduct statistics as well as communication of details about key investigations in progress and those completed | | None | |
| Provide educational programs for employees to mitigate risks | | None | |
| Complete a comprehensive risk assessment review with a recognized industry standard setter | | None | |
| Assess strategic business risks annually and disclose in the Form 10-K | | None | |
| Offer free and reduced priced medicines, nutrition and diabetes products to US-based patients with financial difficulties | | Human rights | |
| Community building (economic development mission) | Donate to charitable causes that support organizations across the globe | Society | |
| | Have as a company mission to work with all people to assess their goals and then put resources and services in place to help them build better tomorrows | Society | |
| | Have a healthy living strategy that invests in community-based sports programs | Labor | |

Table V.
Factor results – labels, activities loading, and GRI where companies classified the activity

(continued)

| Factor | Item | GRI dimension |
|--|---|---------------|
| Human rights/ equality/fairness | Create a development corporation to invest in low-income housing, community revitalization and minority efforts | Society |
| | Collaborate with government, local vendors and policy makers to support educational initiatives and activities | Society |
| | Collaborate with government, local vendors and policy makers to support educational initiatives and activities | Society |
| | Ensure all customers are treated fairly and consistently | Economic |
| | Prohibit the use of child, forced or involuntary labor | Labor |
| Employment opportunities | Provide human rights education for new recruits and employees at the at the time of promotion and management positions | Human rights |
| | Actively promote gender equality and diversity in the workplace | Labor |
| | Support and obey laws that prohibit discrimination everywhere in places the company does business | Human rights |
| | Offer leadership training to identify future business leaders in the company | Economic |
| | Strive to become an Employer of Choice and measure progress through positive employee response rates in surveys | Society |
| Employee information/employee personal education | Give employees career development opportunities to expand their skills by rotational, temporary, or sabbatical coverage assignments | Labor |
| | Have a transparent pay structure from the bottom level to the top level | Labor |
| | Offer a global promotion and reward system to attract top candidates and respond to increasing global mobility | Labor |
| | Provide an adaption program when sending employees overseas | Labor |
| | Have a high-quality, comprehensive medical examination and advice session available to all employees | Labor |
| | Offer opportunities for people within the company to develop ideas through competitions and programs they develop | Labor |
| | Provide employees with information on how to protect and secure personal data | None |

Table V.

| Factor | Mean | SD | Number of items |
|--|------|------|-----------------|
| Human rights/equality/fairness | 4.13 | 1.00 | 5 |
| Environmental stewardship | 3.85 | 1.11 | 18 |
| Employment opportunities | 3.72 | 1.11 | 5 |
| Risk and compliance (mitigation of corporate risk) | 3.58 | 1.05 | 6 |
| Community building (economic development mission) | 3.45 | 1.13 | 7 |
| Employee information/employee personal education | 3.49 | 1.12 | 4 |
| Total items | | | 45 |

Table VI.
Sustainability factors emerging from exploratory factor analysis

per the GRI guidelines, but our study respondents did not think these activities were important in their view of a corporation's sustainability.

The factors that emerged from our respondents also closely resemble the principles of the United Nations Global Compact that should be implemented within any organization's scope and mission (UNGP, 2016). This is particularly the case in the correspondence between the respondents' factor "human rights/equality/fairness" and UNGC's principles on human rights and the correspondence between "risk and compliance" and UNGC's principle of anti-corruption. The factors that emerged from our respondents closely, if not more closely, resemble the UNGC principles than the GRI dimensions.

Because of their inherent dissimilarities, the sustainability content analyses data and the survey data could not be quantitatively compared. We, therefore, applied a qualitative

comparative approach to address the question “Is there alignment between what companies report regarding sustainability and what stakeholders view as important?”

As previously noted, researchers coded statements into categories (see Table III). The final data set of coded statements enabled us to count the frequencies of each category. An implication we can draw from analyzing all the texts is that the more often a type of statement is made, the more emphasis, or importance, the organization is placing upon it. Since the activity serves as a signal to the stakeholder, it should relay information that is of importance to them. The category with the most frequently made statements was environment. The most important activities for the respondent sample are recycling, reducing climate impact, and being “green” – all types of activities now associated directly with sustainability. It is reasonable, therefore, to interpret that statements in these reports are placing highest importance on informing stakeholders about environmental activities. It is important to note that during the reconciliation process, we discovered that some reports mentioned a given activity more than once within that report.

The dimension with the next highest number of activities revealed across the 15 reports was labor with 78. Although labor was second in importance for the sample companies, the subjects did not consider it as important nor did they see labor as distinctly a single dimension as did the companies. Labor-related activities were least important to the respondents and were seen to be in two distinct dimensions. One factor related to the company providing a setting for individuals to develop and progress; the other factor is related to informing employees so that they are better prepared to manage their own risks as employees.

The third highest category mentioned in the reports was economic. However, it did not emerge as an identifiable dimension for the respondents. The economic aspect of performance for the respondents pertained to community building, i.e., economic development rather than economic growth *per se* for the company. The fourth most significant dimension for the respondents is related to compliance and mitigating risks. Respondents perceive it to be very important that companies “behave themselves” and not be cavalier about externalities and other risk shifting behaviors.

What receivers regard as important clearly reflects their different priorities, i.e., a difference in the perceived corporate role in society. In contrast to the areas emphasized in the sustainability reports, the survey data showed that stakeholders are most concerned with (from Table VI): human rights/equality/fairness; environmental stewardship; and employment opportunities. The information emphasized in the reports is not what our respondents feel is most important to achieving sustainability as they perceive it.

Summary and conclusions

The results of our analyses of external users’ assessments of activities associated with sustainability, indicates some significant differences between how companies categorize and relate their sustainability activities and how stakeholders perceive those activities. There is consonance between companies and stakeholders in terms of both the importance and the nature of environmental sustainability activities. The environment is important and is defined by activities that preserve natural systems. Beyond this category, however, respondents use different dimensions to classify activities than the GRI structure and place different emphases on them. Beyond the environmental dimension, stakeholders see corporate sustainability in dimensions associated with being a “good citizen,” i.e., community building; compliant behavior avoiding externalizing risks; fairness and respect for human rights; and providing employment that encourages employee development. From a stakeholder perspective, corporate sustainability may be an issue of corporate “virtue” rather than one conceived as merely a constrained economic value maximization problem.

Our research does not reveal anything about what activities companies should report, since we utilized as our treatments only those activities that companies actually report.

What our research indicates is that the narrative that coherently ties sustainability activities together is different for stakeholders than it is for companies. We do find that given the set of reported activities, readers classify the activities differently than does the GRI, and the relative importance of activities does not coincide with frequency of appearance in the reports. Our results add credence to Milne's (2013, p. 143) contention "[...] that acting alone, voluntarily and on the basis of economic motives, most businesses seem incapable of addressing the fundamental issues of sustainability." This is so because the narrative of sustainability acted out by companies is not always consonant with what those outside the company want to know about its actions. Information systems, such as GRI reporting, are the architecture of the narrative that ties a company's disparate activities together into a coherent story about a "good" company, a "mediocre" company, or a "bad" company. Indeed, there are likely numerous general narratives about sustainability depending on which particular stakeholder is constructing the narrative[18]. What our results do indicate that the GRI guidelines, largely reflecting a corporate management view of sustainability, would be a premature foreclosure of our understanding about what the potentially disparate narratives about sustainability are, and how sustainability activities are interconnected.

Our results also relate to understanding the moral significance of sustainability reporting. Scanlon (2008) considers the problem of "double effect," the problem of whether the moral assessment of an action really depends on the actor's intentions. Scanlon argues that intentions do not enter into the assessment since permissibility depends only on principles as used in a critical sense (rather than a deliberative sense) to determine whether an act is permissible. So whether an act is permissible does not depend on whether the actor committed the action by employing the relevant principles to deliberate upon whether the action was permissible. However, assessing the meaning of an action does depend on the actor's reasons for acting[19].

The subjects of this study indicate that the sustainability actions communicated to them are indicative of a company that is a good citizen, not merely a company being an economic actor doing the right things re sustainability, but also as a moral actor being a good citizen. What our subjects' narrative about corporate sustainability implies are stakeholders have a moral relationship to companies, as well as whatever economic ones they might have. This moral relationship is the deciding factor for investors engaged in socially responsible investing. According to Scanlon morality is a normative relationship "[...] that specifies attitudes and expectations that we should have whenever certain conditions are fulfilled" (Scanlon, 2008, p. 139)[20].

The expectation that a collective agent, like a business corporation, should possess the necessary attitudes or feelings that make a moral relationship between stakeholders and itself as indicated in the anthropomorphic way that our subjects viewed corporate sustainability actions seems misplaced. Sustainability reported via the GRI structure entertains only that such right actions were performed; the reasons for performing them are not important. However, for the subjects in our study the narrative constructed out of those actions seemed to align them in a way that the reasons for doing those actions did matter, i.e. they are done to be a good citizen. Meaning of the actions was important to the subjects and not simply those actions permissibility as actions contributing to corporate sustainability.

We conclude that in order for sustainability reporting to correspond to the way it is perceived by those outside the firm, including socially responsible investors, the information in the reports should regularly also correspond to information managers utilize to make decisions about the business. Just as financial reports are representative of the same kinds of information that enter into the decisions that managers make, i.e., financial outcomes are ends to be achieved, so do our subjects seem to believe that sustainability information should be about ends as well. Sustainability reporting should result in sustainability thinking and action on the part of management.

1. This definition sounds innocuous enough, but is radical in its implications. It presumes a systems perspective because it speaks of generations of humans (populations) and it focuses on needs, not wants. Given that a substantial proportion of the current generation lacks fulfillment of basic needs, the definition encompasses alterations not just in systems of production but also of distribution.
2. The latest scholarly term that may replace “sustainability” is the concept of “resilience,” which is the ability to plan for and survive adverse environmental events (Carlson, 2013).
3. Major providers of guidance for sustainability reporting are the GRI, the Carbon Disclosure Project, Organization for Economic Cooperation and Development (OECD), The United Nations Global Compact, and the International Organization for Standardization. The reports should feature disclosures around multiple issues as mentioned previously including environmental, economic, and society.
4. For 2014, 4,169 companies from around the world, including 557 from North America, listed reports with the GRI, 79 percent of which followed the GRI guidelines. The majority of all reports were “self-declared,” or not checked by any third party, even though the GRI “recommends” that companies seek external assurance. As of September 22, 2015, 4,974 out of 28,334 reports (18 percent) in the database were non-GRI-based reports.
5. CSR or sustainability is intimately related to the much more fundamental question of what should be the role of the corporation in society, which is ultimately a matter of morality, politics, and law (Danley, 1994).
6. Recently, some Harvard Business School graduates have initiated a movement to resurrect the idea of managers as professionals. The movement aims to persuade business schools to take The MBA Oath (Anderson and Escher, 2010). The oath consists of eight promises the manager vows to keep, one of which has direct bearing on the subject of this paper: “I will strive to create sustainable economic, social, and environmental prosperity worldwide (Anderson and Escher, 2010, p. xvi).”
7. For example, KPMG (2011) utilizes the logic of business success to advocate for corporate responsibility reporting: “[...] clearly, CSR reporting is now an essential requirement for any company hoping to be seen as a responsible corporate citizen. Innovation and learning, in particular, has consistently ranked highly as a driver for corporate social responsibility reporting over the past decade. This is indicative of the large number of companies that see CR as a means (emphasis added) to drive greater innovation through their business and products in order to create a discernible competitive advantage in the market” (p. 7).
8. Gambling (1974) proposed that societal accounting for corporations be focused on economic measurements of these externalities so that they could be explicitly integrated into the bottom line, thus making a TBL unnecessary. “Net externalities” also reveals the “system” nature of sustainability, i.e., the extent to which a single firm’s actions are inextricably linked to a wider system connecting companies, people, and the natural environment. This realization was emphatically noted by Milne (2013, p. 145) “[...] sustainability only really makes sense at a systems level, and perhaps more pertinently at a planetary systems level.”
9. We propose this model only as a conceptual device for situating social and environmental values within the context of the traditional structured economic narrative. We accept Gray’s (2013, p. 459) assertion that sustainability reporting “[...] would not start with the somewhat bizarre and tortured foundations of conventional financial accounting.”
10. There is a paradox in this expression that seems irresolvable at the firm level. The paradox lies in the conflicting values implied on either side of the equation. On the right hand side, the production side, the value is on efficiency, while on the left hand side, the consumption side, the corporation, in order to grow, must implicitly advocate less efficiency on the consumption side. This bipolarity exists for every individual: as producers we should be as efficient as possible, but as customers we cannot apply the same logic since economic growth depends on ever increasing consumption (70 percent of US GDP depends on consumption of consumer goods).

11. One of the leading sustainability reporting scholars has expressed pessimism about the prospects for a coherent system of representing corporate performance: "It would seem, that on the available evidence at least, we are unable to derive any generalisable inference about the value of social disclosure as a signal of social performance" (Gray, 2006, p. 78). In addition, there is the problem of power. Shareholders have power exercised through securities markets to leverage corporations to act in certain ways based on the information they receive via financial reports. No such equivalent power exists to leverage corporate behavior based on sustainability reporting. Government environmental and social regulations act as constraints, but do not provide the power necessary to make environmental and social performance the primary aims of the corporation.
12. We did not include any activities that were deemed to contribute to "unsustainability." Companies tend not to report negative events (Boiral, 2013) so there is a bias in reports toward only those activities deemed to cast the firm in a favorable light. Given the nature of our research objective, this bias is what we want since we are focused on activities that are deemed to result in a corporation being responsible and sustainable by doing the right things.
13. The GRI is still a rather crude system for organizing "good actions" that confirm a company is a responsible, sustainable company.
14. Since the many scandals like Enron and WorldCom, corporate governance has emerged as an important consideration in assessing corporate conduct along with the new discipline commonly referred to as "enterprise risk management."
15. This may also reflect the fact that there are many large, well-financed and organized NGOs who have provided direction on what the issues on the environmental agenda should be. According to Dauvergne and Lister (2013), many of these groups have moved from antagonism toward corporations to a more conciliatory strategy of working with them to encourage more environmentally responsible behavior by educating them on the benefits.
16. Ironically, there exists a document that specifies 30 explicit human rights. "The Universal Declaration of Human Rights" was adopted by the UN General Assembly on December 10, 1948. Few of the universal human rights are mentioned as actionable by the companies in our sample. The only rights implied by the activities described are health (worker safety), nondiscrimination (diversity), and fair treatment of workers. The activities taken under the rubric of human rights were paternalistic and means-centered. No companies acknowledged an employee right for desirable work and to join a trade union, a right to social security, a right to rest and leisure, or a right to an adequate living standard.
17. The resulting data set had four missing values. In order to perform statistical analysis, we replaced the missing values with the item mean, an approach known as mean imputation, which is a common approach to handling missing data.
18. Our results lend empirical support to Owen *et al.*'s (1997, p. 180) observation that "[...] the social account opens up new categories of meaning for the organization and its stakeholders and moves us further from the idea of an organization as purely an economic entity [...]"
19. Scanlon (2008) explains that he equates his reference to the meaning of an action as like Kant's notion of the moral worth of an action: Kant says that for an action to have moral worth it is not enough that it be "in accord with duty" (i.e. permissible); it must also be "done from duty. So what Kant calls moral worth is like what I am calling meaning, in its dependence on the reasons for which an action is performed" (p. 101).
20. According to Scanlon (2008, p. 141), blameworthiness is attributable to individuals who commit actions that permit others "[...] to have attitudes toward them different from those that constitute the default moral relationship."

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Appendix. Corporate sustainability actions*

- (1) Have a sustainability-oriented growth strategy based upon appealing to customers in all parts of the world.
- (2) Support programs that reduce starvation.
- (3) Give employees career development opportunities to expand their skills by rotational, temporary, or sabbatical coverage assignments.
- (4) Add comprehensive information in labeling all of products.
- (5) Report and disclose serious accidents related to products.
- (6) Have a process that informs senior management and the board about misconduct issues including periodic reports of overall misconduct statistics as well as communication of details about key investigations in progress and those completed.
- (7) Have as a company mission to work with all people to assess their goals and then put resources and services in place to help them build better tomorrows.
- (8) Use life cycle analysis to identify and reduce carbon footprint of products.
- (9) Offer a global promotion and reward system to attract top candidates and respond to increasing global mobility.
- (10) Offer opportunities for people within the company to develop ideas through competitions and programs they develop.
- (11) Support and obey laws that prohibit discrimination everywhere in places the company does business.
- (12) Conserve water consumption in company facilities worldwide.
- (13) Develop effective processes to prohibit the uncontrolled release of pollutants (e.g. wastewater, sulfur dioxide, and nitrous oxide).
- (14) Save tons of paper and plastic through packaging and shipment redesigns, thus reducing landfill waste.
- (15) Invest worldwide in remanufacturing joint ventures with other organizations to expand sustainability outreach or capabilities.
- (16) Establish a take back program in order to recycle used products and comply with the European Union regulations.
- (17) Strive to become the number one manufacturer in our industry, both economically and sustainably in the next five years.
- (18) Mentor professionals, support startups and build R&D opportunities in developing countries.
- (19) Provide educational programs for employees to mitigate risks.
- (20) Sell Fair Trade products.
- (21) Reduce pesticide use.
- (22) Publish white papers examining the economic impact of broadband internet connectivity in developing nations, strategic information and communication technology spending and e-learning environments.
- (23) Actively investigate regulatory and safety-related issues when necessary to promptly remove products from all avenues.
- (24) Obtain third-party attestation of sustainability measures.
- (25) Realize throughput improvement, cycle time reduction and improvement in on-time delivery because of manufacturing improvements at our facility.

- (26) Commit to purchasing renewable energy credits.
- (27) Strive to become an employer of choice and measure progress through positive employee response rates in surveys.
- (28) Have a high-quality, comprehensive medical examination and advice session available to all employees.
- (29) Provide employees with information on how to protect and secure personal data.
- (30) Assess strategic business risks annually and disclose in the Form 10-K.
- (31) Deploy technology that captures and reclaims greenhouse gas emissions ordinarily vented into the atmosphere.
- (32) Lead initiatives to support investment in US-based growth-oriented industries.
- (33) Actively promote gender equality and diversity in the workplace.
- (34) Use responsible sales and marketing to carry clear information to the consumer.
- (35) Corporate business groups monitor performance (including training, management tone, risk assessment, and more) on a quarterly basis and send the results to the Ethics and Compliance Program Office.
- (36) Consider it a business imperative that the corporate presence contributes to the social and economic development of local communities and host nations.
- (37) Minimize climate impact by reducing emissions, increasing efficiency, and changing the method of sourcing and using energy.
- (38) Create products or services using hybrid technology.
- (39) Ensure all customers are treated fairly and consistently.
- (40) Have a transparent pay structure from the bottom level to the top level.
- (41) Commit to source key products from sustainable sources.
- (42) Acknowledge and respect the diversity that exists among social customs and cultural traditions in the countries of operation.
- (43) Commit to continuing our success in global markets and create more opportunities for global investors to benefit from long-term growth plans.
- (44) Utilize solar power in facilities.
- (45) Offer leadership training to identify future business leaders in the company.
- (46) Work with regulatory authorities to promote the eradication of counterfeit items and to protect brands.
- (47) Increase recycling rate.
- (48) Provide human rights education for new recruits and employees at the at the time of promotion and management positions.
- (49) Implement a rigorous training program to improve quality assurance practices at operational sites for employees and contractors.
- (50) Incorporate green design standards and building concepts into the construction of facilities.
- (51) Prohibit the use of child, forced or involuntary labor.
- (52) Perform self-audits to ensure compliance with company-wide standards.
- (53) Create a development corporation to invest in low-income housing, community revitalization, and minority efforts.

- (54) Work with locals to reforest land that improves rainwater infiltration and reduces erosion.
- (55) Pursue business excellence and profit in a climate of free enterprise, free trade, and unencumbered competition.
- (56) Strive to make products “green” and eco-friendly.
- (57) Seek to build relationships with women and minority-owned businesses.
- (58) Offer free and reduced priced medicines, nutrition and diabetes products to US-based patients with financial difficulties.
- (59) Utilize wind power in plants.
- (60) Promote policies that reduce or eliminate trade and investment barriers.
- (61) Measure and disclose climate change strategies (e.g. carbon disclosure project).
- (62) Provide an adaption program when sending employees overseas.
- (63) Routinely audit suppliers to ensure they meet expectations for quality and social responsibility standards.
- (64) Donate to charitable causes that support organizations across the globe.
- (65) Reduce power consumption for operating activities (e.g. air conditioning).
- (66) Have a healthy living strategy that invests in community-based sports programs.
- (67) Take sustainability issues into consideration when negotiating mergers and acquisitions.
- (68) Work to sustain biodiversity (conserve the flora and fauna) in the areas of operation.
- (69) Complete a comprehensive risk assessment review with a recognized industry standard setter.
- (70) Collaborate with government, local vendors, and policy makers to support educational initiatives and activities.
- (71) Use innovations that utilize an agricultural input to reduce independence on petroleum.

*A copy of the complete survey instrument is available from the corresponding author.

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