Talking Green: Organizational

Environmental Communication as a Legitimacy-Enhancement Strategy

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ABSTRACT

In this paper, I adopt an institutional perspective to investigate the antecedents and outcomes

of organizational environmental communication, using data on 90 American firms from 2001

to 2004. Specifically, I test legitimacy theory – that posits that organizational communication

constitutes a reaction to institutional pressures and aims at legitimizing organizations – by

conducting qualitative and quantitative analyses to identify the antecedents of organizational

environmental communication, and to examine the impact of this communication on the

organizations' legitimacy. This study is mainly grounded in the content analysis of the firms'

annual reports over the four-year period. Regarding the antecedents, results are consistent

with legitimacy theory. They show that organizations mobilize legitimizing discursive

strategies in their environmental communication and that they react to heightened institutional

pressures by increasing their environmental disclosures. Regarding the outcomes, results

bring mixed support to legitimacy theory. If some findings suggest that environmental

communication has a positive impact on organizational legitimacy, others are counterintuitive

and suggest that the higher the quality of the communication, the lower the legitimacy.

Key words:

Environmental communication; social legitimacy; institutional theory

1

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INTRODUCTION

According to institutional theory, organizational behavior is conditioned by the expectations stemming from the institutional environment. Although this theory has made substantial contributions to the literature on organizations, it has been criticized for its oversocialized dimension. Thus, building on the shoulders of Meyer and Rowan's seminal paper (1977), numerous institutional theorists contend that organizations can manage their legitimacy by signaling to their stakeholders that their behavior is appropriate and desirable (Phillips, Lawrence, and Hardy, 2004; Suchman, 1995). The management of legitimacy relies heavily on organizational communication (Suchman, 1995) and the use of evocative symbols (Phillips, et al., 2004; Westphal and Zajac, 98).

Building on Berger and Luckmann's (1966) emphasis on the importance of legitimacy in the social construction of explanations and justifications for the actors' existence and behavior, Phillips et al. (2004) suggest that "actions that lead actors to try to gain, maintain, or repair legitimacy are likely to result in the production of" texts and discourses (: 642). They underscore the circular nature of the process, where institutions are created and sustained by texts and discourses but concurrently influence and shape the production of these texts. In this sense, organizations are "as phenomena in and of language" (Boje, Oswick, and Ford, 2004: 571). Setting the quest for legitimacy up as a behavioral rule, legitimacy theory posits that the organization's organizational communication constitutes a reaction to the pressures coming from its institutional environment (Oliver, 1991) and aims at legitimizing the organization by demonstrating the congruence between its organizational practices and the values professed by its social environment (Lindblom, 1983).

Although this premise focuses on both the antecedents and outcomes of organizational communication, these two dimensions do not receive equal consideration from the literature. While the antecedents of organizational communication have received substantial attention, to date, only two studies (Elsbach and Sutton, 1992; Elsbach, 1994) have focused on its outcomes. However, if these studies empirically test the impact of organizational communication on organizational legitimacy, some limitations remain. Specifically, I identify two theoretical gaps. First, they study a very specific phenomenon – the acquisition of legitimacy after illegitimate events - which entails them to focus exclusively on a limited fraction of legitimizing strategies (strategies of perception reversal such as excuses, justifications, or denials). Second, the relationship they observe between the organization's behavior and its legitimacy is not direct but mediated by the presence of spokespersons, journalists, or credible experts, which has an impact on the way the audience perceives the organization. Indeed, institutional theorists argue that the presence of these information intermediaries, or "infomediaries" (Pollock and Rindova, 2003), influence the stakeholders' perceptions regarding the desirability and appropriateness of the organization's behavior, and consequently the organization's legitimacy.

Therefore, while reproducing the antecedents-outcomes analytical scheme of these two studies, this paper seeks to widen the analysis and so adopts a different perspective first by studying impression management tactics in general – and not only perception reversal strategies – and second by analyzing the direct impact of communication on organizational legitimacy – instead of a mediated one. To this end, Corporate Social Responsibility (CSR hereafter) proves interesting to focus on, first because the expectations to conformity in this field have been dramatically increasing since the nineties, and second because it is intrinsically related to the production of organizational texts. Besides, I also identify a

contextual gap there, inasmuch as although legitimacy theory is frequently mobilized by studies focusing on CSR communication, the results diverge as for its explanatory power – specifically on the environmental dimension. While within the growing body of literature that has started to shed light on the antecedents underlying organizational environmental disclosures, numerous studies suggest that environmental communication is linked to institutional pressures and provides the organization with a legitimizing tool (Brown and Deegan, 1998; Patten, 2002), others conclude that the search for legitimacy does not constitute an appropriate explanation (Guthrie and Parker, 1989).

Therefore, the goal of this present study is to take a step toward addressing the aforementioned gaps by studying both the antecedents and outcomes of organizational environmental communication, defined as "those disclosures that relate to the impact company activities have on the physical or natural environment in which they operate" (Wilmshurst and Frost, 2000: 16). To this end, I pose the following research question: *Does the organizational environmental communication constitute a legitimacy-enhancement strategy?* that I address by examining the organizational environmental communication of 90 American firms over a four-year period (2001 to 2004). Specifically, I turn my attention to two points: Why do organizations communicate on their environmental management? And does it have the expected effects?

In a first study, I conduct a qualitative content analysis to investigate the rhetoric structuring the organizations' environmental disclosures in the annual reports. In a second study, I conduct quantitative analyses, first by examining the evolution of environmental communication according to institutional pressures, and then the impact of this communication on the organizations' legitimacy. The paper is thus organized as follows: after presenting the theoretical framework and the research propositions, I introduce the research

design, and I present the analyses and results of study 1 and 2. Eventually, I discuss these results and I conclude by mentioning the limits of this paper as well as directions for future research.

THEORETICAL FRAMEWORK AND RESEARCH PROPOSITIONS

Neo-Institutionalism and Legitimacy

According to Scott (1992), the conception of the organization as an open system is the one that prevails today. This conception underscores the permeability of the organization to the influences of the environment in which it operates. The neo-institutionalist perspective stresses the diversity of these institutional influences (DiMaggio and Powell, 1983; Suchman, 1995) by focusing on how regulative, normative and cognitive forces shape the emergence and the diffusion of practices within organizations (Scott, 2001). The regulative pillar guides the organization's behavior via coercive regulations. The normative pillar channels the organization's behavior via norms, professionalization, and social expectations. Eventually, the cognitive pillar is embodied in taken-for-granted beliefs. Each of these three pillars can give rise to legitimacy (Ruef and Scott, 1998).

Legitimacy is a key concept in neo-institutionalist theory since it partly explains why some organizational practices and forms are more widespread than others. Indeed, as the organization is motivated by the search for social approbation (Meyer and Rowan, 1977), stability, and survival (DiMaggio and Powell, 1983; Meyer and Rowan, 1977), it is strongly incited to incorporate the practices and procedures defined by the institutional environment. Institutional forms operate on different levels and spread via three isomorphic processes (DiMaggio and Powell, 1983): coercive, normative, and mimetic. Coercive isomorphism stems from the formal and informal pressures exerted on the organization by other organizations or by society. Normative isomorphism results from the increasing

professionalization of the environment. As for mimetic isomorphism, it is generated by environmental uncertainties. Facing the ambiguity of the objectives and of the means to reach them, the organization sets imitation up as a behavioral heuristics by seeking its models in the organizations that it perceives legitimate and successful. As these three isomorphic processes lead the organizations to incorporate structures and practices matching the socially accepted models, they contribute to the homogenization of organizations (DiMaggio and Powell, 1983).

In this paper, I concentrate on the normative source of pressures and following Suchman's definition (1995: 574), I consider legitimacy as "a generalized perception or assumption that the actions of an entity are desirable, proper, or appropriate within some socially constructed system of norms, values, beliefs, and definitions." Legitimacy theory thus posits that the organization will manage to operate in the limits imposed by society. In a way, a "social contract" (Brown and Deegan, 1998) – stipulating the necessity of a congruence among the organization's behavior and the society's values – is established between the organization and its community. Organizational legitimacy stems from the perception of this congruence.

Legitimacy is the fruit of the evaluations of the organization's multiple stakeholders (Elsbach and Sutton, 1992). If the origin of the concept of stakeholder can be traced back to the notion of "organizational coalition" developed by Cyert and March (1963), Freeman (1984: 25) is the one who popularized it by defining it as "any group who can affect or is affected by the achievements of the organization's objectives". This extended conception of the organization involves the implementation of organizational practices that take into account the interests of all stakeholders, what Post, Preston, and Sachs (2002) call "stakeholder management". Organizational legitimacy thus appears to depend on the organization's ability

to manage the interactions within its networks of stakeholders in the long-run (Post et al., 2002; Wartick, 1992). According to Post et al. (2002), the relationships between the organization and it key stakeholders determine its legitimacy and its capacity to generate sustainable benefits. In this paper, I posit that in spite of the diversity of stakeholders, it is possible to identify common interests, and assume that corporate social responsibility does provide the organization with such an opportunity to simultaneously satisfy the interests and expectations of its stakeholders.

Corporate social responsibility, Environmental Communication, and Legitimacy

Corporate social responsibility is the articulation of three principles within the organization: environmental integrity, social equity, and economic prosperity (Bansal, 2005). It answers stakeholders' expectations that go well beyond the limits of the organization's economic activities (Ullmann, 1985). As social responsibility is a potential source of legitimacy (Rondinelli and Berry, 2000), this study falls within its scope, and more specifically within the scope of environmental responsibility, that I define as the efforts put in by the organization to reduce its ecological footprint (Bansal, 2005), or to put it differently its impact on the natural environment.

To study the relationships between the organization and the natural environment, institutional theory appears particularly promising (Starik and Marcus, 2000). Indeed, the increasing stakeholders' pressures on the issues of organizational environmental performance (Maxwell, Rothenberg, Briscoe, and Marcus, 1997) entail the idea that effectiveness in nonmarket issues derives from the ability of the organization to manage the interactions with its institutional environment, and thus to create dialogue with its stakeholders. To this end, organizational communication turns to be a fundamental element of environmental management.

Research Propositions

As legitimacy plays a crucial part in the survival of organizational forms (Meyer and Rowan, 1977), legitimacy theory postulates that the organization mainly uses organizational communication to emphasize the congruence between its values and the ones deemed appropriate by society. The organization employs rhetorical strategies – defined by Suddaby and Greenwood (2005: 41) as "the deliberate use of persuasive language to legitimate" – to construct congruence among its actions and the institutional expectations. Thus, the role of rhetoric in the legitimization process is fundamental since a skillfully crafted language can be strategically used to induce change in the audience's perceptions (Suddaby and Greenwood, 2005). In the context of environmental communication, we can assume the organization uses a strategy aiming at persuading its stakeholders that its environmental behavior is legitimate. According to institutional theory, organizations seeking legitimacy become more aligned with their environment over time, which leads them "to resemble each other in structure and practice" (Starik and Marcus, 2000: 543). It is epitomized by Deephouse's (1999) idea of strategic similarity that taps the difference between a firm's strategy and its rivals' and suggests that greater strategic similarity increases performance through the avoidance of legitimacy challenges. As increased legitimacy derives from an iterative isomorphic process, we should observe similarities in the organizational discursive strategies. This leads me to the following proposition:

Proposition 1: The use of a legitimizing rhetoric increases inter-organizational isomorphism in organizational environmental communication.

Environmental issues are in the process of being institutionalized and therefore possess a strong potential in terms of legitimacy as long as the organization can show its conformity to the expectations regarding environmental management. The organization is thus

strongly incited to project the image of a legitimate entity through the disclosure of environmental information. Hence, building on the legitimacy theory premise, I suggest the following proposition:

Proposition 2: In a context of high institutional pressures, the intensity of corporate environmental communication increases.

While the two previous propositions focus on the antecedents of organizational environmental communication, I am also interested in assessing its outcomes, that is, the impact of the communication strategy on the organization's legitimacy. Legitimacy theory suggests that organizational communication is used to increase organizational legitimacy, and that increased visibility, that is, increased exposure make the organization more desirable to its audience, and thus more legitimate (Suchman, 1995). I test this premise with the following propositic *Proposition 3: When the visibility of environmental disclosures in organizational communication increases, organizational legitimacy increases.*

INTRODUCTION TO THE RESEARCH DESIGN

Research Setting

As I am interested in the evolution of the organizational environmental disclosures, I have adopted a longitudinal research design. Thus, this study extends over four years, from 2001 to 2004. This period is interesting for two reasons. First, the proximity of Enron scandal and its aftermath confers unprecedented salience on corporate social responsibility issues. Second, on a strictly environmental level, Johannesburg Earth Summit took place in 2002, and environmental issues have started to receive more attention since this period. Thus, I expect these two events to entail changes in organizational communication on social responsibility in general and environmental behavior in particular. The choice of this period

makes it possible to observe organizational behavior at varying levels of institutional pressures, with, I assume, a higher level for 2002 and 2003 due to the proximity of the scandals and the Summit.

Sample

To test the propositions, I examined the organizational environmental communication of a sample of American firms. I retained the United States as the study field for two reasons: accessibility of the data on the one hand, and origin of the wave of scandals on fraudulent organizational practices on the other hand. I assumed the stakeholders' reactions on legitimacy matters, and by extension the organizations' would be particularly salient there. The initial sampling frame consisted of 100 American firms listed on the *Fortune* America's Most Admired Companies 2005. These firms were selected according to a stratified random procedure. This list had the double advantage of providing a reputation score for each firm and enabling the construction of a cross-industrial sample¹. I excluded 10 firms from this list owing to missing data, after checking that this exclusion did not alter the structure of the sample². The propositions were thus tested on a sample of 90 firms (cf. Appendix A for the list).

Data collection

I collected data from several sources, the main one being the firms' annual reports for fiscal years 2001, 2002, 2003, and 2004. I obtained 67 reports for 2001, 76 for 2002, 80 for 2003, and 84 for 2004. Parallel to the collection of these 307 annual reports, I proceeded to the analysis of the firms' websites to check for the presence of a section dedicated to

¹ The repartition is as follows: 8.9% Financial Industry; 10% Consumer Products; 4.4% Contracted Services; 7.8% Shelter; 13.3% Stores and Distributors; 8.9% Computers and Communication; 11.1% Natural Resources; 8.9% Power; 6.7% Precision Equipment; 4.4% Media and Entertainment; 15.6% Transportation.

² I compared the demographic characteristics of the final sample firms with those of the excluded firms and found that they did not differ materially on firm size, age, and industry sector. Due to a lack of space, the results of the analyses are not reported here but they are available upon request.

environmental management, to "Environment Health and Safety" (EH&S hereafter) issues, or to social responsibility (if it incorporated information relative to environmental responsibility). I also checked for independent reports on environmental responsibility, on sustainable development, on social responsibility, or on EH&S. Eventually, I consulted the COMPUSTAT database to collect information on the organizations' performance.

DATA AND RESEARCH METHODS OF STUDY 1

Annual reports as a strategic tool

To test proposition 1 that suggests that the use of a legitimizing discursive strategy should lead to inter-organizational isomorphism in organizational environmental communication, I exclusively focused on annual reports disclosures. Indeed, while the organization has the use of numerous external organizational communication media, the annual report is the most representative when it comes to present the organization to its stakeholders (Peslak, 2005). A substantial body of literature underscores the complementarity of financial and narrative sections (Abrahamson and Amir, 1996; Smith and Tafler, 1995), which turns to be very useful to assess the salience of specific issues for the organization. The annual report is a strategic communication tool that the organization mobilizes to convey the information likely to legitimize its behavior in the opinion of multiple audiences (Brown and Deegan, 1998). Thus, the organization strives to depict itself so as to reap the adhesion and support of its stakeholders, what Elsbach and Sutton (1992) call a strategy of impression management and which consists in projecting a positive image of oneself.

This is particularly significant within the context of organizational environmental communication. In the United States, there are very few obligations regarding environmental

disclosures, except for the Toxic Release Inventory³. However, organizations are required to communicate on their environmental performance in the 10-K report⁴. Therefore, every environmental communication that is realized outside this framework entirely falls within the province of the organization's strategy. It is thus mobilized to influence stakeholders' perceptions (Ullmann, 1985). That's why a consistent body of literature presents the annual report as a particularly interesting source of information to study the organization's strategy (Ahmad and Suleiman, 2004⁵; Buhr, 1998; Unerman, 2000), notably as regards environmental management (Bansal and Clelland, 2004; Deegan and Rankin, 1997; Wilmshurst and Frost, 2000). The content analysis of annual reports turns to be particularly pertinent to underscore and understand the organization's strategy (Bowman, 1984).

Annual reports and qualitative content analysis

Prior to the analyses, I selected a sub-sample that included the firms that met the two following criteria: (i) interest in environmental issues (presence of at least one environmental disclosure over the four-year period); and (ii) availability of data over the four-year period to assess the evolution of the communication pattern (presence of the four complete annual reports). The retained sample consisted of 18 firms meeting these two criteria (cf. Appendix A for the list of these firms). Building on a Saussurian's conception of language that emphasizes the duality of the sign (composed of a signifier and a signified), and acknowledging that the meaning of a word cannot be examined independently of the signs in which it is embodied, I conducted a content analysis both form and meaning-oriented.

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³ The TRI, which was created in 1987, requires some companies to publish the detail of their chemical emissions in the air, water, and land.

⁴ The 10-K report is an annual financial report that publicly traded firms have to file with the Securities and Exchange Commission.

⁵ For an exhaustive presentation of these reasons, see these authors' thorough literature review.

First, I tried to identify the organizations' motivations underlying environmental behavior, notably via the references to obtained and expected advantages. Second, I studied the discursive strategy mobilized by the organizations. Since I was both interested in the signified and the signifier, I used two units of analysis: unit of meaning, on the one hand, interpreted within its context; and the word, on the other hand, to appreciate the nature and richness of the vocabulary. Although this study was deductive in nature – since I confronted my proposition to the narrative of the annual reports – I did not define a coding protocol prior to the analysis. The categories I used were very general at the beginning and became more refined during the material analysis.

RESULTS OF STUDY 1

On the 18 firms I retained, only 10 explicitly communicate on their motivations. Although the restricted size of the sample does not enable to infer statistically significant conclusions, I noticed the organizations particularly communicated on their motivations in 2002 and 2003, the years I expected to correspond to a heighten intensity in institutional pressures.

The analysis revealed four types of motivations put forward by the organizations to explain their environmental behavior: the search for a cost advantage (9%), the search for a competitive advantage (32%) – in the guise of an opportunity seizing advantage (23%) or a differentiation advantage (9%) –, the search for a legitimate status (50%), and the development of an ecological thinking (9%). Table 1 presents these motivations.

Insert Table 1 about here

The search for a legitimate status (through the protection of organizational reputation) appears to be the main motivation. Some of the organizations explicitly mention the

contextual reasons that drove them to adopt a responsible behavior: the society's increasing cynicism towards organizations' behavior, organizational scandals. The awareness of the importance of organizational legitimacy is very strong, especially from 2002. The organizations also mention cost advantages, differentiation advantage, and opportunity seizing advantage. Eventually, ecological thinking gathers the motivations that are linked to the willingness to protect the environment as an end in itself.

Then, through the analysis of the rhetoric employed in the environmental communication, I identified three recurrent themes that directly participate in the construction of a legitimate organizational image. Those three themes that are systematically present in the discourses of each of the 18 organizations are: (i) recognition, (ii) credibility, and (iii) exemplarity.

Craving for Recognition

The concept of recognition – understood as the fact of being approved, accepted, and appreciated – permeates the environmental disclosures. It is present in a double guise: first, through the constant mentions of the awards granted to the organizations for their environmental performance; and second, through the recurrent use of a vocabulary of distinction and selection. The following list presents the most frequently used expressions: "we were honored", "we were recognized", "we become selected", "we were named", "we were included", and "we were ranked". All these terms refer to the pleasure and pride of being recognized as a responsible organization. Besides, the systematic use of past participles and passive voice stresses the organization's dependence on the perception of its external environment. It indicates that the organization is keeping a close watch to see that its behavior is approved – that is, deemed legitimate – by the institutional entities (the State, the environmental agencies). But it also works on another level. There is a *mise-en-abyme* of the

concept of recognition, inasmuch as when the organization mentions the awards it has been granted – and which illustrate the recognition stemming from the institutions on a first level – it also seeks to be recognized by its stakeholders on a second level. Official recognition – encapsulated in the various awards - is leveraged to positively impact the stakeholders' perceptions and thus to increase organizational legitimacy.

Asserting Credibility

The second concept I came across in my analyses is the concept of credibility, understood as the fact of being generally accepted and trusted. This desire to appear credible – and thus legitimate – in the eyes of the stakeholders, finds expression in two different discursive strategies: the first through the recurrent temporal expressions that insist on the durability of the organization's responsible behavior, and the second through the way of monopolizing environmental issues and of connecting them to the organization's organizational strategy.

The environmental communication is punctuated with verbal structures or temporal locutions that aim at persuading the audience of the solidity of the organization's course of action in the field of environmental management. The following expressions, present in the discourses of every organization, epitomize the insistence on demonstrating that far from being an ephemeral behavior, it is part of a long-term move: "we continued discussion", "we maintained certification", "we will maintain", "we believe in continuous environmental improvements", "for the [...] consecutive year", "every year we build on a tradition of environmental accomplishments". Whether it deals with past environmental performance or declarations of intent regarding future environmental performance, those expressions aim at convincing the stakeholders that the organization is trustworthy and that its responsible behavior is legitimate because it is based on durability. Its credibility depends on it since the

stakeholders try to predict the future behavior of the organization based on its past and present actions. The idea of continuity is thus paramount to the construction of a legitimate status.

This willingness to appear credible to the eyes of the stakeholders is also perceptible in the way the organization monopolizes the social responsibility issues in general and the environmental ones in particular. There is a tendency for the organization to present social performance not as a late addition but as a part and parcel of its organizational strategy: "social responsibility is an integral part of our organizational culture" (Air and Products, 2002), "The idea – actually the ideal – of economic, social, and environmental sustainability has for years influenced organizational-level policies. At BP, it permeates the group..." (BP, 2003), "These values are enshrined in practical policies and standards that govern areas of our activities..." (BP, 2004), "Organizational responsibility continues to be woven into every major decision we make as a company" (Chiquita, 2004). These metaphors of inclusion draw attention to the congruence of the organization's core values with the values underlying social responsibility. This monopolization of the responsible values contributes to increase the organization's credibility as the use of these terms is part of the organization's legitimizing strategy.

Setting Exemplarity

The last theme I identified is exemplarity, which designates the fact of serving as a good example, of being suitable to be copied. The frequent occurrence of the words "leader", "leadership", and "best" indicates that the organization tries to lay emphasis on the exemplar dimension of its behavior. These references to the organization's leadership underscore its legitimacy since besides providing information on the environmental behavior of the firm they introduce a performance dimension in the picture. Backing both horses, the organization shows its stakeholders the excellence of its environmental behavior, and in the meantime reasserts that in the area of environmental management as well as in its regular business

activities, it remains well ahead. Being first is a valuable asset in terms of credibility and legitimacy.

Thus, through its environmental communication, the organization tries to project the image of a recognized, credible, and exemplar entity. These three elements constitute the antecedents of organizational legitimacy, inasmuch as they enable the organization to build the image of a socially desirable entity. The organizational environmental communications of all 18 firms are based on these three antecedents, which suggests that the environmental disclosures are structured in a way to endow the organization with a legitimacy aura and to make it highly visible to the eyes of its stakeholders. These three antecedents form the basis of the organization's legitimizing rhetoric, and they are strengthened by the systematic use of grammatical and lexical structures that seek to persuade the audience of the sincerity of the discourse: "we thereby affirm our conviction that...", "we intend to be a force for progress", "we believe/understand/recognize that...". The organization exclusively mobilizes theses impression or intention forms – which are lacking thematic content – to scan its sentences and give more emphasis to its declarations. It's a form of impression management: the organization depicts itself as a legitimate entity.

I have proposed that the use of a legitimizing rhetoric should lead to isomorphism in organizational environmental communication. Indeed, the institutionalization of environmental issues and the desire to appear legitimate should lead to a convergence of organizational behaviors, taking the shape of coercive, normative, and mimetic isomorphism (DiMaggio and Powell, 1983). As suggested by this first proposition, I observed a standardization of the organizations' environmental disclosures.

Coercive isomorphism is the result of the formal or informal pressures stemming from the institutional environment. I found its presence through the numerous allusions to the conformity to environmental regulations and norms, and to the increasing societal pressures: "... meet increasingly stringent environmental requirement" (Air Products and Chemicals, 2003), "in response to demands for more environmentally friendly and high-performance coatings" (Alcoa, 2003), "regulatory requirements [...] represented one of the most significant challenges faced in 2004" (Alcoa, 2004), "Safety and Health, and Environmental compliance are the prerequisites to all operations" (Allegheny, 2004). Normative isomorphism comes from the professionalization of the environment. Although it is less manifest than its coercive counterpart, normative isomorphism is present through the references to the increase of organizational environmental certifications and to the adoption of guidelines or charts of conduct. Eventually, mimetic isomorphism, which designates the imitation of other organizations' behavior, is particularly present in the organizational environmental communication. Organizations use the same vocabulary. Words such as "mission", "value", "responsibility", and "commitment" are frequently mobilized. Besides, the same expressions spread and are adopted in the communication of all organizations as the following quotations epitomize it: "[W]e will continue to be guided by Chiquita's Core Values of integrity, respect, opportunity and responsibility in our dealings with shareholders, employees, customers, suppliers and the communities in which we do business." (Chiquita, 2001⁶) and "The way we work is guided by values - integrity, honest dealing, treating everyone with respect and dignity, striving for mutual advantage and contributing to human progress." (BP, 2003⁶); "Our heritage of giving back to the community and caring for the environment is part of how we live our values." (TXU, 2002⁶) and "Living our values begins with our commitment to protect the health and safety of our employees, contractors and neighboring communities and to minimize the environmental impact of our operations." (Marathon Oil, 2004⁶); "In this way, we achieve the sustainability that is enshrined in our 'One' concept." (Allianz, 2004) and

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⁶ Emphases added

"These values are *enshrined* in practical policies and standards that govern areas of our activities..." (BP, 2004⁶).

As suggested by the first proposition, organizational environmental communication shows evidence of institutional isomorphism. When confronted to institutional pressures, organizations tend to adopt practices that are deemed legitimate by their environment. It entails a convergence of organizational practices – here the environmental communication – which tend to look more alike. This process of isomorphism gives concrete expression to the influence of the institutional environment on organizational practices.

This first qualitative analysis, although realized on a small sample, seems to support the legitimacy theory when it postulates that organizational environmental communication is a reaction to the pressures of the institutional environment. However, this premise has to be statistically tested, what I do in study 2. So, I now turn to quantitative analyses (realized on the 90-firm sample) to test proposition 2 – which supplements proposition 1 by studying the evolution of the intensity of communication on the observed period – and then proposition 3 – that focuses on the outcomes of the legitimacy theory premise, that is, the efficiency of organizational communication in terms of legitimacy gains.

DATA AND RESEARCH METHODS OF STUDY 2

Variables

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Dependent variable. As the reputation can be considered as the outcome of the legitimizing process (Rao, 1994), I used *Fortune*'s 2003⁷ global reputation score as a proxy for legitimacy. This reputation score goes from 1 to 10. Although I could also have used the CSR score as the dependent variable, I wanted to test the impact of organizational

⁷ I opted for the 2003 global reputation score for the following reason: to test the model robustness, I also ran regression analyses with *Fortune*'s CSR reputation score as the dependent variable. As the most recent CSR score I had access to was the 2003 score, I chose the 2003 global reputation score for the main analyses so that I could compare the results.

communication on the overall organizational legitimacy and not to restrict it to a single dimension.

Independent variables. I constructed the independent variables from the analysis of the annual reports over the four years I studied. To measure the qualitative dimension of environmental communication, I used a coding scale inspired by Wiseman's work (1982)⁸. I adapted it to my research design and I separately assessed the environmental information disclosed in the letter to shareholders and in the narrative sections. I gave a score of 0 when there was no mention of the organization's environmental behavior, a score of 1 when the issue was tackled on very broad terms, a score of 2 when information were specific to the organization and gave precisions on the environmental dimensions at stake, and a score of 3 when information were specific and illustrated by quantitative and/or qualitative examples (cf. Appendix B for an illustration of the coding). Thus, I constructed two qualitative variables (ranging from 0 to 3): one for the letter to shareholders, the other for the narrative section. I completed these two variables by three binary variables tapping the presence or absence of an environmental independent report, of an internet section devoted to the environment, and of environmental disclosures in the financial section of the annual report. Eventually, I constructed a global measure of environmental issues visibility (ranging from 0 to 9) that aggregated the scores of the five previous variables. This global visibility variable had the advantage of crystallizing the qualitative and quantitative dimensions of organizational environmental communication.

Control variables. Following Deephouse (1996) who suggests that organizational performance is a potential determinant of legitimacy, I added the performance as a control

⁸ For a thorough description of this scale that measures the quality of the environmental information disclosed in the annual reports, see Wiseman (1982) or Warsame, Neu, and Simmons (2002).

variable, using the ROA – that I obtained from COMPUSTAT – as a proxy. (cf. Appendix C for a recapitulation of the variables)

Analysis and Results for Proposition 2

I have proposed that the intensity of organizational environmental communication will vary depending on the level of institutional pressures, with higher levels likely to be associated with higher intensity. So, proposition 2 should be empirically verified by an increase in the environmental disclosures on all the communication media used by the organization (letter to shareholders, narrative and financial sections of the annual report, and independent report⁹) since I assumed the end of the period should be associated with higher institutional pressures than the beginning of the period (due to the institutionalization of environmental issues, the Johannesburg Summit, and the corporate scandals). The initial examination of the descriptive data is consistent with what I predicted. The environmental disclosures increased on all communication media between 2001 and 2004: 83% for the letter to shareholders, 22.5% for the narrative sections, 16% for the financial sections, and 50% for the independent reports. Then, I statistically tested the evolution of the means from 2001 to 2004 using a paired-samples T test. To gauge the augmentation of the environmental communication intensity, I used the global visibility variable, assuming that intensity was both related to qualitative and quantitative dimensions. The global visibility means for 2001 was 1.64 and 2.16 for 2004. The means comparison was statistically significant (p < 0.001 two-tailed). Although the overall intensity of environmental communication remains quite low (the maximum possible score being 9), the empirical results support proposition 2: increased communication intensity is associated with higher levels of institutional pressures.

Analysis and Results for Proposition 3

⁹ Since I did not have access to the creation date of the environmental section on the organization's website, the proportion for this variable remains constant for the four years. I used the proportion measured in 2004: 45.6% of the organizations communicate on their environmental management on their website.

Proposition 3 suggested that the visibility of environmental disclosures in the organizational communication should have a positive impact on the organization's legitimacy. I tested this proposition using a multiple regression analysis model. Given the assumptions that underlie the use of ordinary least square models, I performed tests to ensure the OLS specifications were met. I controlled for multicollinearity, heteroscedasticity, and the normality of the residuals. I did not find evidence of multicollinearity in the matrix of correlations, but I confirmed it by conducting a collinearity diagnostic (VIF < 1.4; Tolerance > .7). I did not find evidence of heteroscedasticity either, and the test of normality showed that the residuals were normally distributed.

The dependent variable is the organizational legitimacy (as measured in 2003), but the independent variables that tap the environmental disclosures visibility – the qualitative scores of the letter and the narrative section, the presence or absence of environmental disclosures in the financial section of the annual report, of an independent environmental report, and of an environmental section on the website – are the variables measured in 2002. Indeed, the annual reports for the year t are published during the first quarter of the year t+1, and Fortune's reputation scores for t are also available in the first quarter of t+1. Thus, only the annual reports of t-1 can possibly be taken into account in the evaluation of the organizations. I also introduced two control variables: the organization's performance (measured for 2003) and the legitimacy score for 2002. Proposition 3 was then translated into the following equation, where I expected the signs of the control and independent variables to be positive:

Legitimacy = $\beta_0 + \beta_1$ Letter Score + β_2 Narrative Score + β_4 Financial Section + β_3 Report + β_5 Internet Section + β_6 Performance + β_7 Prior Legitimacy + ε

To control for the robustness of the model, I realized two confirmatory tests. The first consisted in reiterating the regression analysis using the CSR reputation score¹⁰ as the dependent variable instead of the global one. The second consisted in replacing the two qualitative independent variables by two quantitative ones¹¹. The results were convergent¹². Table 2 shows the means, standard deviations, and correlations among the variables. Table 3 reports the results of the multiple regression analyses.

Insert Table 2 and 3 about here

Model 1 and 2 present the baseline models of control variables. Model 1 displays the effect of the first control variable. Prior legitimacy has a positive effect on current legitimacy. The coefficient is positive (.846) and significant at the 0.01 level, understandably since legitimacy tends to be self-reinforcing. This control variable accounts for .77 of the variance in legitimacy (adjusted $R^2 = .75$), which is not surprising since legitimacy building is a long-term process, and therefore not likely to evolve radically from one year to another. Model 2 introduces the second control variable. Consistent with the expectations, the effect of performance on legitimacy is positive (.021) and significant at the 0.01 level. The results show a significant improvement of model fit with .79 of variance explained (adjusted $R^2 = .78$; F-Change < .01).

Model 3 introduces the five independent variables, improving model fit ($R^2 = 82.4$; adjusted $R^2 = .80$). The introduction of the dependent variables marginally increases the predictive power of the model (F-Change < .10). As expected, the presence of an

¹⁰ The CSR reputation score is one of the elements that compose *Fortune*'s global reputation score.

¹¹ I constructed these two variables measuring the proportion of the letter to shareholders and of the narrative section devoted to environmental disclosures (percentage of lines for the letter and percentage of pages for the narrative section). I assumed that visibility could also be gauged quantitatively.

¹² Since the other results of the confirmatory tests are convergent with the main analyses, they are not reported here.

environmental section on the website has a positive (.291) and significant (< .10) effect on organizational legitimacy. Although the coefficients for the presence of an environmental report and environmental disclosures in the financial section are not significant, their sign is positive, as expected¹³. However, I find some counterintuitive results: the coefficient for the quality of environmental disclosures in the narrative section is significant (p < .05) but its sign is negative (- .177). The same goes for the quality of environmental disclosures in the letter to shareholders (- .073) even though the coefficient is not significant. Interestingly, these results suggest that the higher the quality of environmental communication, the lower the organizational legitimacy. Thus, although the full model explains a large amount of the variance in organizational legitimacy, proposition 3 is not strongly supported by the results, since only the Internet section variable significantly goes in the predicted direction.

DISCUSSION

In this paper, I have tried to answer the following research question: Does the organizational environmental communication constitute a legitimacy-enhancement strategy? To do so, I focused on both the antecedents and outcomes of organizational environmental communication, turning my attention to two points: Why do organizations communicate on their environmental management? And does it have the expected effects? I used an institutional theoretical framework – specifically mobilizing legitimacy theory – to look into these points. Indeed, according to legitimacy theory, the organization reacts to heightened institutional pressures by increasing its organizational communication to acquire legitimacy.

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¹³ When I ran the confirmatory tests on the CSR reputation score as the dependent variable, the coefficient for environmental disclosures in the financial section turned to be negative (although not significant). This change in the coefficient sign could be explained by the fact that financial environmental communication sends ambiguous signals that can be interpreted either positively (rewarding the firm's transparency) or negatively (sanctioning its environmental spending or liabilities)

As for the first point, the findings of this study support the premise that the organization's communication is a reaction to institutional pressures. The antecedents of the organizational behavior are directly related to the search for legitimacy. The analyses of study 1 underscored the presence of a legitimizing rhetoric where the themes of recognition, credibility, and exemplarity were skillfully contrived to shape the stakeholders' perceptions. The organization seems to use its environmental communication as a means to arouse its stakeholders' approbation. This result is reinforced by the increasing disclosure of environmental information on every communication media between 2001 and 2004, in reaction to the intensification of institutional pressures on environmental issues. The combination of these results suggests – in accordance with numerous studies – that the organization uses organizational environmental communication as a way of managing its legitimacy (Brown and Deegan, 1998, Patten, 1992), with the annual report representing a privileged legitimizing tool (Brown, 1997). Thus, legitimacy theory provides a valid explanation to the question of the antecedents of organizational behavior. Organizations communicate on their environmental behavior because they try to enhance their legitimacy.

As for the second point, which focuses on the outcomes of environmental communication, I obtained mixed results. According to legitimacy theory, the impact on organizational legitimacy should be positive. However, empirical results – obtained in the second part of study 2 – only partially support the premise that organizational environmental communication is efficient as a legitimacy-enhancement strategy. Indeed, the visibility of environmental issues – both qualitative and quantitative – in the organization's organizational communication seems to have a limited impact on its legitimacy. Consistent with legitimacy theory, the environmental section on the website has a positive and significant impact on organizational legitimacy. The presence of an independent environmental report and of environmental disclosures in the financial section of the annual report also has a positive

(though not significant) impact on organizational legitimacy. Interestingly however, I found counterintuitive results that seem to contradict legitimacy theory. The negative coefficients of the two qualitative variables suggest that the higher the quality of the communication in the annual report, the lower the organizational legitimacy. One way to interpret these counterintuitive findings could be that the organizations with a high-quality environmental communication are in fact organizations that are suffering from a lack of legitimacy. Environmental communication would actively be used as a legitimacy-recovery strategy. Thus, the higher the deficit in legitimacy, the better the quality of the communication. One thing to remember though is that the firms I have studied belong to the America's 500 most admired companies, that is, firms that already benefit from a certain level of recognition. Therefore, instead of talking about illegitimate organizations trying to recover their lost legitimacy, I would use Phillips and Zuckerman's (2001) notion of middle-status conformity to explain these surprising results. Indeed, the authors develop and test the idea of an inverted curvilinear relationship between status and conformity. They contend that both high and lowstatus actors are free from the pressure to conform, since high-status actors (low-status actors) are already legitimate (illegitimate) and will tend to remain so whatever their actions. However, middle-status actors aspire to gain recognition and thus feel pressure to conform to expectations by demonstrating the appropriateness of their behavior. Given the nature of my sample – built on the 500 America's Most Admire Companies –, I can reasonably assume that the firms are either middle (relatively lower legitimacy) or high-status actors (relatively higher legitimacy). Thus, the negative coefficients I found would tap the fact that the middlestatus organizations are the most communicant on environmental responsibility issues because of their willingness to show their conformity, willingness that directly derives from their search for a higher social status.

Therefore, to conclude on the research question, if the organizations do seem to use organizational environmental communication as a legitimacy-enhancement strategy, the effective impact of this strategy on organizational legitimacy appears limited. I think this research makes three contributions to the literature on legitimacy and institutionalism. The primary contribution of this paper is that it addresses a gap in the literature by focusing on the outcomes of the organizational behavior through the empirical testing of the link between the communication strategy and its efficiency in terms of legitimacy, and through the adoption of a perspective that is complementary to the studies of Elsbach and Sutton (1992) and Elsbach (1994). Second, this paper contributes to legitimacy theory by studying the legitimizing discursive processes present in organizational communication, which has so far only been tackled by a few studies. The third contribution is the use of a longitudinal research design that takes into account the dynamic aspect of the institutionalization process. Eventually, I also see a contribution in terms of managerial implications. Given that the communication media that are used do not appear to be equally efficient in terms of legitimacy-enhancement, the managers could have to arbitrate between the cost of using a given medium and the possible gains deriving from its use. The findings of this paper suggest that the internet medium could be the most efficient one.

LIMITATIONS AND DIRECTIONS FOR FUTURE RESEARCH

While the empirical analyses globally support the theoretical framework, I see several limitations that should be taken into account. The first limitation of the study is that I measured legitimacy using *Fortune*'s reputation score, while this proxy does not entirely reflect the concept of legitimacy the way I defined it – the outcome of a collective evaluation by the organization's various stakeholders¹⁴. A more representative alternative could have

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¹⁴ Fortune's score is exclusively derived from specialists' evaluations (managers, directors, financial analysts) and thus doesn't encompass the whole of the stakeholders.

been to use Gardberg and Fombrun's Reputation Coefficient¹⁵, which I did not choose for data accessibility reasons. The second limitation lies in the absence of a double coding of the data. To palliate this reliability risk, I used a test/retest technique. Once I finished coding the data, I randomly selected 35 annual reports that I recoded to check the convergence of the first and second coding. As the comparison did not yield major differences, I assumed the reliability of the coding to be acceptable. Eventually, a third limitation lies in the relatively small size of the valid sample. Due to the ex-post longitudinal research design, several data were missing at the beginning of the period, which might have biased the estimations in the regression models.

To conclude, I mention three avenues for future research. First, future research could focus on the way organizations can in turn influence and shape their institutional environment, what Lawrence (1999) calls "institutional strategy". By considering the institutionalization process as an endogenous dynamic – and not an exclusively exogenous one – and institutional entrepreneurship as a discursive activity (Phillips et al., 2004), we could study how organizations will seek to influence legislative and regulatory frameworks, as well as norms and values through their environmental communication.

Second, future research could investigate the issue of first-mover advantage in the field of environmental communication, by developing a psychological approach of entry order and studying it as an evaluation criterion used by the stakeholders to assess the organization's legitimacy. Entry order could significantly impact the stakeholders' preferences, memory, judgment, and learning (Carpenter and Nakamoto, 1989; Kardes and Kalyanaram, 1992)¹⁶ and thus be likely to arouse a preferential structure that would favor the pioneer. The first

¹⁵ See Gardberg and Fombrun (2002) for a detailed description of the methodology

¹⁶ I want to point out that these authors exclusively focus on the impact of first-mover advantage on the consumer, but I reckon that it can be extended to the whole of stakeholders.

organization to communicate on its environmental performance would then be endowed with higher legitimacy.

Eventually, future research could examine the issue of the fit between organizational environmental communication and actual performance. When demands from the institutional environment happen to be incompatible with the organization's assets or objectives, the organization might adopt an avoidance strategy (Oliver, 1991) that leads it to hide its non conformity behind a window of acceptance. This distinction between appearance and reality is a fundamental issue for neo-institutionalism (Scott, 1983), since appearance rather than effective conformity is sometimes sufficient to gain or maintain legitimacy, which entails a decoupling phenomenon between the substance and appearance of organizational behaviors (Lounsbury, 2001; Westphal and Zajac, 2001).

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APPENDIX A

TABLE A1

List of the Firms Belonging to the Sample^a

13M	36 D.R. Horton	71 Phillips-Van Heusen
2 Abbott Laboratories	37 DaimlerChrysler	72 Plains All American Pipeline
3 ABM Industries	38 Delphi	73 Publix Supermarkets*
4AES	39 Dominion Resources	74 Qualcomm
5 Air Products and Chemicals	40 Dow Jones	75 Reynolds American
6 Alcoa	41 Equity Residential	76 Scientific-Atlanta
7 Allegheny Technologies	42 First American	77 Shaw Group
8 Allianz Life Ins. Co. of N.A.	43 Furniture Brands Intl.	78 Silgan Holdings
9 AMC Entertainment	44 Gateway	79 Spartan Stores
10 America West Holdings	45 Genuine Parts	80 Stanley Works
11 American Express	46 Golden West Financial	81 Stryker
12 American Intl. Group*	47 Harrah's Entertainment	82 Symantec
13 AmeriSourceBergen	48 Herman Miller	83 Symbol Technologies
14 Analog Devices	49 Hub Group	84 Textron
15 Aramark	50 Humana	85 TJX
16 Arkansas Best	51 ITT Industries	86 Tribune
17 ArvinMeritor	52 Kohl's	87 TXU
18 Asbury Automotive Group	53 L-3 Communications	88 Union Pacific
19 Bank of America	54 Loews	89 United Auto Group*
20 BB&T Corp.*	55 Lowe's	90 United Stationers
21 Beckman Coulter	56 Marathon Oil	91 Universal Forest Products
22 BP	57 Masco	92 US.Bancorp
23 Brinker International	58 Massachusetts Mutual Life*	93 Viacom*
24 Brink's	59 Matsushita Electric Industrial	, c
25 Caesar's Entertainment*	60 May Department Store*	95 Volt Information Sciences
26 Campbell Soup	61 Merck	96 Wesco International
27 CDW	62 Mirant	97 Weyerhaeuser
28 Cenveo*	63 Morgan Stanley	98 Winn-Dixie Stores
29 CH2M Hill	64 Nextel Communications	99 Xerox
30 Chiquita Brands Intl.	65 Nike	100 York International
31 Coca-Cola	66 Paccar	
32 Colgate-Palmolive	67 Peabody Energy	
33 Computer Sciences	68 PeopleSoft*	
34 Cooper Cameron	69 PepsiCo	
35 Crown Holdings	70 Performance Food Group	

^{*} Firms that belonged to the initial sample but were excluded because of missing data

^a Firms belonging to the sub-sample (Study 1) are in boldface

APPENDIX B

TABLE B1

Coding Scheme for the Qualitative Scores

Type of information	Code	Verbatim	Source
No mention	0		
		"ABM's uncompromising standards of good organizational citizenship, (), environmental compliance"	ABM, Annual Report 2001 (Letter to shareholders)
Broad mention	1	"We will maintain our strong commitment to environment, safety, and health principles"	ITT, Annual Report 2001
		"We thereby affirm our conviction that business responsibility cannot be separated from community and social considerations and ecological concerns".	Allianz, Annual Report 2002 (Letter to shareholders)
		"Beyond our focus on physical assets, Marathon is taking important steps to support a work culture that generates high performance. In 2001, Marathon employees turned in another year of excellent health, environmental and safety results".	Marathon Oil, Annual Report 2001 (Letter to shareholders)
Firm-specific mention	2	"As one of the largest emitters of CO2 in the world, AES must continue to strive to economically stabilize greenhouse gas concentrations".	AES , Annual Report 2002 (Letter to shareholders)
		"Much of the success is the direct result of a variety of proactive training and educational programs we have with a strong focus on preventing accidents, reducing emissions and releases and ensuring adequate emergency preparedness".	
		"Always environmentally conscious, Delphi has continued to pursue ISO 14001 certification. Also, through various initiatives, Delphi reduced raw materials use by 1,400 tons and decreased water consumption by 8.9 million gallons; recycled or reused 8,000 tons of materials"	Delphi , Annual Report 2001
Firm-specific mention with examples		"Matsushita achieved promising energy conservation results by developing and installing equipment that uses networked energy control systems to measure and analyze power consumption in its buildings	Matsushita Electric Industrial, Annual Report 2001

and factories".

"Since the early 1970s, TXU has been in the forefront of reforestation. The 20 million trees we have planted, which include 1.3 million in 2002, improve air quality by sequestering carbon dioxide, provide valuable wildlife habitat, and contribute to the beauty of communities".

TXU, Annual Report 2002

APPENDIX C

TABLE C1

Recapitulation of the Variables

Dependent variable

Legitimacy: Global reputation score (from 0 to 10)

Independent variables

- Letter Score : Qualitative score of the letter to shareholders (from 0 to 3)
- Narrative Score: Qualitative score of the narrative section (from 0 to 3)
- <u>Internet Section</u>: Presence of a section "Environment" / "Environmental Health & Safety" / "Corporate social responsibility" on the firm's website (dummy variable with 0 for 'No' and '1' for Yes)
- Report: Presence of an independent environmental report (dummy variable with 0 for 'No' and 1 for 'Yes')
- <u>Financial Section</u>: Presence of an "Environmental Matters" section in the financial section of the annual report or in the 10-K report (dummy variable with 0 for 'No' and 1 for 'Yes')
- Global Visibility: Global disclosure score (from 0 to 9) that aggregates the 5 previous variables

Control variables

- Performance: Firm's performance (ROA)
- Prior Legitimacy: Global reputation score for the previous year

TABLES

TABLE 1

Firms' Motivations to Engage in a Responsible Environmental Behavior

MOTIVATION	VERBATIM	SOURCE
Cost advantage	"The process saves () more than \$1 million in raw material costs."	Air Products & Chemicals (2001)
	"The TXU Operating System can enable more than \$140 million in earnings improvement before taxes by 2007 as waste is eliminated and work processes improved."	TXU (2004)
Competitive advantage (Opportunity seizing)	"As the world's energy needs grow, markets are looking to diversify energy sources, seeking ever-increasing supplies of cleaner-burning fuels (). Clean-burning natural gas represents a very significant and increasing share of the world's overall energy mix."	Marathon Oil (2002)
	"EnviroGem products are expected to expand our opportunities in the surfactants market."	Air Products & Chemicals (2001)
	"[W]e were able to shift our focus to capture maintenance, retrofit, and emissions clean-up work . We won one of the largest contracts ever awarded by Tennessee Valley Authority Nuclear."	Shaw Group (2002)
	"[W]e expect our conduct to be measured by responsible standards. Already, we see that living up to high standards for behaviour, environmental policies and human rights opens doors to new relationships and resources. It sparks innovation and permits investment."	BP (2003)
	"Shaw's strategic decision to acquire a stronger position in the environmental and infrastructure arena () broadened and diversified our capabilities and customer base."	Shaw Group (2003)
Competitive advantage (Differenciation)	"Matsushita will stand out from the competition (). The Company will distinguish itself not only by expanding its product lineup in high-volume markets, but also by developing products that contribute to energy conservation and environmental preservation."	Matsushita (2002)
	"[O]ur focus on performance is what makes the difference to our customers. Our passion for safety, protecting the environment and being a good neighbor in our communities also continued to set us apart ."	Air Products & Chemicals (2004)
Legitimacy	"No anatear whakethebyf businedisla dalapanfy iscandialrage matteresticanal if Aymerica salvet mbasey debitle yerbjectisseya glood linden, value's even tetter: learly assure you of were we stand."	Ai A Proxl(2003) Chemicals (2002)

"We face a time of uncertainty (). Public expectations of the behaviour of corporations grow ever stronger. All these factors must inform every decision we make and every action we take." "Our publicly stated aspiration is to be numbered	BP (2002)
among the world's great companies."	BP (2003)
"To be sustainably successful, we have to gain and retain the support of many people, including employees, shareholders, customers, and communities."	BP (2004)
[I]n 1998, Chiquita took on organizational responsibility as a major priority following years of criticism from nongovernmental organizations and the media. Management decided to turn around the company's reputation ."	Chiquita Brands International (2002)
"In delivering our organizational responsibility goals, we have gone from being a target of criticism to a focal point of praise."	Chiquita Brands International (2003)
"Our reputation depends on our commitment to the vision that: No one gets hurt. Nothing gets harmed."	Cooper Cameron (2002)
"At Marathon, we understand that our reputation as a responsible organizational citizen is essential to our continued success ."	Marathon Oil (2002)
"[T]hese qualities are helping TXU fulfill its vision of becoming the most admired global energy services company ."	TXU (2001)
"In a time of increasing cynicism about behavior of organizational executives, we must - and do - place ethics at the core of every decision we make."	Weyerhaueser (2003)
"Recognizing a responsible coexistence with the environment as a fundamental business principle, Matsushita has established environmental management systems."	Matsushita (2001)
"In response to mounting evidence () about greenhouse gas emissions and the earth's rising temperature, BP becomes the first in our industry to state publicly the need for precautionary action."	BP (2003)

Ecological thinking

TABLE 2 **Descriptive Statistics and Pearson Correlations**

Variables	Means	s.d.	1	2	3	4	5	6	7
1. Legitimacy	6.26	1.17							
2. Prior Legitimacy	5.88	1.20	.87**						
3. Performance	3.84	1.04	.32**	.17					
4. Letter Score	.21	.67	13	08	.02				
5. Narrative Score	.36	.93	.07	.17	.08	.30**			
6. Report	.16	.36	$.19^{\dagger}$.12	01	.08	.24**		
7. Financial Section	.41	.50	11	05	18	$.21^{\dagger}$	$.20^{\dagger}$	26*	
8. Internet Section	.45	.50	.26*	.14	$.17^{\dagger}$.08	.32**	.38**	.02

^{**} p < .01 (one-tailed)

* p < .05 (one-tailed)

 $[\]uparrow$ p < .10 (one-tailed)

 $\label{eq:TABLE 3} \textbf{Results of Regression Analyses Predicting Legitimacy}^{\,a}$

		Model 1	Model 2	Model 3
Variables	Expected Sign	β^{b}	В	В
Prior Legitimacy	(+)	.846** (.064) ^c	.816** (.061)	.810** (.060)
Performance	(+)		.021** (.007)	.021** (.007)
Letter Score	(+)			073 (.112)
Narrative Score	(+)			177* (.086)
Report	(+)			.297 (.224)
Financial Section	(+)			.040 (.159)
Internet Section	(+)			.291† (.158)
Constant		1.289** (.386)	1.383** (.365)	1.309** (.363)
R ² Adjusted R ² R ² Change F-Statistic		.775 .751	.787 .779 .031 8.098**	.824 .799 .037 2.098†
n = 58 ** $p < .01$ * $p < .05$ † $p < .10$		•	variable: Legi lized coefficie	•