Introduction

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The literature on corporate social responsibility (CSR) is vast and spans numerous disciplines. However, few attempts have been made to study the specificities of industrial sectors when attempting to develop and implement CSR principles. Yet, given the distinctive characteristics of individual sectors, the requirements for CSR could vary significantly from sector to sector. In addition, the conceptual, moral and practical foundations for CSR are often poorly specified and range from pragmatic calculations designed to maintain profitability in the long term (Hamann 2003) to claims that corporations share with individuals and governments a moral duty to respect human rights (Lertzman and Vredenburg 2005). This situation has often left companies undecided about where to focus their energies and prioritise results (Watts 2005; Dashwood 2007) and created difficulties in evaluating CSR performance.

This special issue of GMI will be accompanied by a further volume (GMI 53) also addressing the extractive industries. In these two special issues we attempt to provide a sharper focus to the study and implementation of CSR: by examining its application to a specific sector, the extractive industries; by focusing on one key dimension of corporate behaviour, environmental performance; and by identifying and examining a number of distinct foundations for CSR. In this issue we focus on values and principles related to CSR in the extractive industries. GMI 53 addresses reporting and performance measurement issues relating to CSR.

This article provides an introduction to and a framework for the two issues. We identify certain key characteristics of extractive industries, situate environmental factors within the larger context of CSR and argue that for extractive industries ecological factors are often a primary concern that can be the most effective entry point for CSR implementation. We also identify four distinct foundations for CSR: human rights, principles of sustainability, economic and operational efficiency and the social licence to operate.

The papers included in these two issues collectively allow us to understand the dynamics of CSR in a specific sector where its relevance and the challenges facing it are particularly clear. The authors suggest a number of distinct ‘CSR lenses’ that can be employed to really give substance to the concept, allow us to get a fine-grained and refined understanding of what CSR involves, how we can understand it, how we can assess it and how we can start to evaluate the performance of companies...
more rigorously. The contributions also recognise that measuring performance of CSR has been a problematic issue and many of the approaches to date have been superficial (for example, counting references to relevant terms in annual reports, analysing what companies say they are doing rather than what is actually happening ‘on the ground’). A further strength of the ‘foundations of CSR’ approach that we offer in this article is that it allows us to start identifying some more substantial criteria and measures for gauging corporate performance.

Extractive industries and sustainability

We define extractive industries as non-renewable natural resource sectors, including oil and gas, metals, industrial minerals, coal and gemstones. There are specific features of the non-renewable sector which make it a particular challenge for CSR and for environmental management, and which also render it a particularly interesting arena for the analysis of CSR. Some of these features include the physically irreversible impact of many mining operations on topography, their potential for adversely affecting the environment and, more specifically, the use of processes (for instance, river disposal of wastes) and inputs (for example, cyanide) that can quickly destroy ecosystems (see next section). They also include the large scale of modern operations relative to adjacent communities and their consequent tendency to generate major social impacts; and the cyclical nature of metal markets and the potential social disruption associated with downsizing and closure (Bridge 2004; Hilson and Haselip 2004; Rajaram et al. 2005). On the other hand, extractive industries have the potential to create considerable wealth, because of the economic rents they can generate, and may be able to fund social and economic development initiatives that few other industries could support (Mitchell 2006; Richards 2005). An additional point that renders extractive industries a fruitful case for the analysis of CSR is that, in most cases, they are exploiting publicly owned (i.e. ‘social’) minerals, which are a wasting asset, raising important questions regarding distribution of economic benefits, both in the current period and across generations.

Thus the core of the CSR challenge for the extractive industries lies in the inherent non-renewability of minerals, on the one hand, and the expansive definition of sustainability, which includes social and economic variables, on the other. Key to addressing this challenge is that a physically non-renewable resource may be deemed ‘sustainable’ if there is an effective conversion of the natural capital, represented by the resource, to social capital that would allow for long-term livelihoods. This assumes that the resilience of the natural environment is not compromised, undermining social and economic sustainability. Against this background, it is both critical to disaggregate sustainability into its environmental, social and economic dimensions, but also to recognise the links between them. We begin by providing a more detailed analysis of non-renewability as an attribute because of its linkages, not only to environmental aspects of sustainability, but also to other social and economic dimensions that are discussed in the next section and in papers throughout GMI 52 and 53.

1 There is a vast literature on ‘weak’ versus ‘strong’ sustainability in this context. In our quest for sustainability we are faced with two options. First we could try to ensure that all natural resources are maintained at adequate levels to provide for an indefinite supply (also known as the strong sustainability argument). In this case, we would try our utmost to focus on renewable resources that can be grown on human time-scales—essentially vegetal and animal materials. The second option is to focus not on the resource quantity itself but rather on the aggregate stock of natural and human capital (also known as the weak sustainability argument). In this case consumption of a non-renewable resource is not problematic as long as its use leads to an equivalent increase in the human capital.
Non-renewable resource extraction has been anathema to environmentalists because extraction of such a resource is, by definition, irreversible and leaves an indelible impression on the ecology of a region. However, extracting some non-renewable resources, particularly metals, is often defended on the grounds that they are recyclable. Hence, even though the extraction from the earth is non-renewable, the material itself is still more worthwhile than a non-recyclable substitute such as a composite plastic. This argument, nevertheless, ignores the fact that metals can also be oxidised and decay into forms that are not economically re-usable, and it certainly does not apply to energy minerals, such as coal and uranium. Furthermore, the energy required for recycling must also be considered in any systematic analysis of impact. Perhaps more research on this issue is needed from an industrial ecology perspective to fully understand the life-cycle impact of different materials for specific uses (Gordon et al. 2006).

There is also a continuing perception among cornucopian researchers\(^2\) that innovation, spurred by scarcity will self-correct any potential depletion of the resource.\(^3\) Modern technology has already led to the substitution of copper by fibreglass optics (produced from sand) and the substitution of iron by ceramic materials and composites. In some cases, materials technology has been advancing very rapidly in response to supply limitations signalled by rising prices for individual minerals. Moreover, the potential for recycling and conservation of less abundant minerals is enormous. The late economist Julian Simon extended this reasoning, perhaps too optimistically, to declare that, even with the finite resources of minerals at our disposal, we can still say that the supply is infinite because we do not know the full potential of reserves and how they can be utilised. He compared the situation to a straight line segment which has a finite length, but which has an infinite number of points contained within it (Simon 1999).

The question of non-renewability and the wider issue of sustainability have been approached from diametrically different perspectives, with reference to the mineral sector. Pro-mining forces tend to frame the issue as one of livelihoods, while anti-mining activists have framed it as an issue of resource depletion. The debate has thus been markedly polarised and reconciling these differences has been a challenge for policy-makers and planners. Table 1 is an attempt to dissect the arguments on both sides.

Both sets of arguments are plausible, but often the result of any effort at planning for a mining venture results in positional entrenchment. Given the analysis in Table 1, it appears that non-renewability of minerals is only an issue vis-à-vis sustainability if we believe that:

1. Keeping the resource in the ground is inherently valuable, and analogous to the preservation of biodiversity. However, since the resource in this case is inanimate and perhaps less consequential to food chains and other biological processes, the argument is often considered less convincing.

2. The environmental damage of the extraction process itself will cause irreversible damage and hence is contrary to any vision of sustainable development. In this case, the non-renewability is a derivative issue and the irreversible environmental impact is the primary issue. In this case, the damage should be compared to renewable resource extraction.

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\(^2\) The term ‘cornucopian’ is used to describe those scholars who are very optimistic about the abundance of resource availability and technological solutions to scarcity. In contrast, ‘Cassandran’ perspectives are those that tend to be more pessimistic about human-induced environmental change. The terms are widely used in American environmental discourse.

\(^3\) For an excellent review of the debate among resource economists about the market mechanisms for dealing with resource depletion concerns, see Auty 2001.
<table>
<thead>
<tr>
<th>Cassandran</th>
<th>Cornucopian</th>
<th>Evaluative notes</th>
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<tr>
<td><strong>Non-renewable resource extraction.</strong> Mineral ores cannot be replenished in the Earth's surface over human time-scales and thus reliance on them is risky and unsustainable. Energy needed to harness abundant minerals such as aluminium must also be considered.</td>
<td><strong>Non-renewable but recyclable (at least metals).</strong> Metals are elements and hence irreducible low-entropy products that can be recycled rather than being 'regrown'.</td>
<td>Highly dependent on type of mineral. E.g. aluminium is both very abundant and easily recyclable, whereas nickel is much less abundant and requires complex product disaggregation for recycling. Also, is there intrinsic value to keeping minerals in ground?</td>
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<td><strong>Land degradation is irreversible.</strong> Common forms of mining and beneficiation effluents scar the landscape in ways that leave it unproductive for future uses.</td>
<td><strong>Economic output per land acreage is high.</strong> While open-pit mining can leave permanent landscape scars, much of the used area is underground and productive land used is relatively small.</td>
<td>Underground mining and leaching techniques may reduce need for large-scale land degradation, though still require reclamation and monitoring after closure to prevent pollution and subsidence risks.</td>
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<td><strong>Supply creating demand.</strong> Corporate marketing is creating 'wants' of consumers. Such 'wants', rather than needs of society, are spurring investment in mining.</td>
<td><strong>Demand creating supply.</strong> Needs of remote communities and traditional demands of consumers are spurring investment in mining. Few alternative development trajectories for remote communities.</td>
<td>Diamond and gemstone demand may have been spurred by marketing. Gold demand can easily be met through recycling and bullion reserves, though the subsistence 'needs' of artisanal gold miners and 'traditional' users of gold are prescient.</td>
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<td><strong>Ephemeral employment.</strong> Mines usually have a life of a few decades and hence employment is not continuous and leads to deceptive economic indicators.</td>
<td><strong>Evanescent but catalytic.</strong> While mining operations may fold, satellite industries that they spawn can continue and perpetuate economic development.</td>
<td>Mining planners need to consider whether a new 'mining town' is viable following closure or a fly-in operation makes more sense. Highly dependent on derivative industries that could potentially evolve.</td>
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<td><strong>Negative impacts outlast closure.</strong> Large financial investment is required to reclaim land after mining, as well as rebuilding economic and social capital of communities.</td>
<td><strong>Positive impacts also outlast closure.</strong> Infrastructure development, service-sector jobs and educated workforce are also a by-product of mining that outlive the life of the mine.</td>
<td>Closure planning must be part of the initial environmental impact assessment before the project commences, in order to ensure long-term viability of land use.</td>
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<td><strong>Sustainability of natural capital guides development of economic and social capital.</strong></td>
<td><strong>Conversion of natural capital into human capital is a means of attaining economic and social sustainability.</strong></td>
<td>Both views necessitate the viability of natural capital—whether for ornamental or instrumental purposes.</td>
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*Table 1* DIVERGENT ARGUMENTS ON NON-RENEWABILITY AND SUSTAINABILITY OF MINERAL EXTRACTION ACTIVITIES
3. The dependence on the use of mined resources will lead to severe economic and social problems when they are eventually depleted, since there will be a paucity of production opportunities for alternatives.

4. The dependence of remote communities on a resource extraction as a sole means of livelihood will lead to economic stagnation after mine closure and is thus not sustainable without a plan for subsequent development.

Whatever view one takes of this debate, there is no doubting the intensity and resilience of the economic and social conflicts that surround complex extractive industries from mines to markets. Can CSR provide a basis for managing these conflicts? Is CSR, in reality, just another dimension of corporate rhetoric that extractive communities may encounter (Frynas 2005; Hilson [GMI 53]; Smith, this volume)? How can we address these questions and what tests can we apply in doing so? Should voluntary action and/or economic incentives be sufficient to motivate CSR or must it be accompanied by more traditional regulatory approaches? (Clause and McAllister 2001; Schiavi and Solomon [GMI 53]; Norton [GMI 53]; Zuzulock and Kuipers [GMI 53]). Our contributors address these questions in depth. To assist in providing context for the later discussion, in the next section we examine in more detail the environmental impact of extractive industries and its relationship to other aspects of sustainability.

Why focus on environmental performance?

In addition to focusing on one sector, the extractive industries, we also focus our analysis on a particular aspect of industry operations, their environmental impact. We recognise that environmental issues are only part of the sustainability equation and that social, economic and cultural factors must also be considered. Our decision to focus on environmental issues follows on from two related considerations: (1) the nature of the industry, which results in environmental issues being central to its interface with many individual stakeholders and the wider society; (2) the fact that for the extractive industries environmental issues are linked to other key aspects of sustainability. Ecological aspects of sustainability are often considered the most fundamental since economic and social attributes often depend on them. Companies have traditionally segmented CSR into economic, social and environmental categories, where the environmental performance is solely concerned with pollution control and compliance assurance. At most, pollution prevention through process design may be factored into the equation by management. However, sustainability planning necessitates a more integrated view of the ecosystem in which projects operate. Within this context we argue that environmental factors can then be used as an efficient entry point for CSR implementation, which in turn connects with other dimensions of CSR.

A major reason for the pivotal role of environmental factors is the physical scarring of the landscape and the profound cultural, social and economic implications this can have. The extent of the physical scarring can vary tremendously from surface mining operations to underground mines to oil and gas drilling. Yet in many cases it is extensive, long-lasting and highly visible. In addition, extractive industry is moving more and more into geographically remote areas (linked to its exhaustion of resources in less remote areas), which also hold much of the world’s biodiversity and its relatively pristine environments. There is consequently often a major conflict between extractive industry operations and the maintenance of biodiversity and (increasing rare) pristine environments. Because it relies on mineral resources that are immobile, the industry is largely dependent on ore distribution for location and has little flexibility about where it will locate. This
substantially reduces the prospect that
alternative locations can be selected to
avoid adverse impacts on areas of high
environmental value.

Another important feature of many
extractive industries is that they generate
large quantities of waste rock and of tail-
ings (the residual material remaining
after rock has been crushed and minerals
extracted), the disposal of which can
destroy productive land and pollute water-
ways. Some types of mining utilise toxic
inputs (for example, arsenic, cyanide,
mercury), and spillages en route to mines
represent another potential environmen-
tal danger. Both the chemicals used in pro-
cessing and the proportion of minerals
that is not recovered are disposed of in tail-
ings, which as a result can contain signif-
ificant levels of heavy metals and other
toxins. If tailings are disposed of into the
ambient environment, they can cause
long-term and serious damage to ecosys-
tems. In most cases they are stored, but as
extractive operations are increasingly
located in areas that are more climatically
extreme and prone to seismic shocks, the
likelihood of spillages of stored tailings
increases. In recent years there have been
a series of widely publicised cases of tail-
ings spills in North America, South Amer-
ica, Eastern Europe and South-East Asia.

Another major issue results from the
fact that certain environmental impacts
are long-lived and may not be evident until
after a mine is abandoned. This has led to
increasing problems with so-called ‘legacy
mines’, problems especially difficult to
address because their original operators
have gone out of business entirely or have
been taken over. Take-overs and mergers
are increasingly common as extractive
industries have become increasingly con-
centrated and new owners are very reluc-
tant to accept responsibility for projects
they did not develop and that no longer
generate an income.

Other features of extractive industries
serve to heighten the social and economic
consequences of, and political reaction to,
environmental impacts. Mineral explo-
ration, which in itself can have significant
impacts, is highly risky and prospectors
can spend years investing in fruitless digs
before a find is made. The result may be
that no substantial economic benefits
accrue to help compensate for environ-
mental damage. ‘Rumour digging’ often
occurs following corporate exploration as
small-scale itinerant miners scour (and
scar) the landscape in search of any lucky
finds. This is especially a concern for gold
and gemstone mining.

Where minerals are found, extraction
sites tend to have an erratic development
profile with a sudden influx of wealth in
the early and maturing years and a grad-
ual decline afterwards. Often mineral
deposits are found concentrated in remote
areas where there has been little prior
development. The ‘windfall development’
that occurs is a challenge for corporations
to manage over the relatively short life-
cycle of most mines or oil and gas instal-
lations. The money being generated over
this period and the environmental change
are both immense and thus magnify many
of the problems of other industrial sectors
both physically and temporally (Hislon
and Haselip 2004). The rapidly fluctuat-
ing price of mineral commodities also
makes planning more difficult than in
other sectors.

Occasionally, prices for commodities
may allow for a closed site to be reopened,
as is the case with the Climax molybde-
um operation near Leadville, Colorado
(USA) which plans to reopen in 2009, after
being closed for more than a decade. How-
ever, all businesses operating in the sector
are usually considered ‘itinerant investors’
in the community since there is a high
level of uncertainty about the stability of
income and a certainty of eventual clo-
sure. This adds to the sensitivities around
adverse environmental impacts, espe-
cially where these are long-term, resulting
from a sense that the costs involved may
not be accompanied by any commensu-
rate economic and social benefits.

This discussion highlights the links
between environmental, social and eco-
nomic dimensions of sustainability. Fig-
ure 1 seeks to map these relationships
more systematically and to relate them to four key foundations for CSR, discussed in the next section (human rights, principles of sustainability, economic and operational efficiency and social licence to operate). Using environmental management as a starting point, Figure 1 shows key issues or areas which extractive industries must address within this area of corporate behaviour (biodiversity and conservation, energy usage, material usage, pollution control and mitigation and remediation). In the case of the first three, the linkage to principles of sustainability and economic and operational efficiency is fairly direct. Pollution control is most directly linked to workplace and community health, which in turn is a legally significant aspect of human rights. Impact mitigation and planning for remediation are consequential to livelihoods and residence security of communities affected by extractive industries, which in turn are most salient in securing a corporate ‘social licence to operate’. The diagram does not assume that these are the only factors that contribute to each of the principles. Rather it attempts to provide a fairly broad hierarchical linkage between environmental management and the principles of CSR, and an effective entry point for CSR in this sector.

Foundational categories of CSR: situating the articles

The two issues, GMI 52 and 53, also attempt to demarcate the foundations on which ‘corporate social responsibility’ can be based; to explore the implications of each of these at a general level; and, for CSR in relation to extractive industries and the environment, indicate what measures would be relevant in gauging performance in relation to each. In this way we hope to cast light on some key questions in relation to CSR, including: What exactly does CSR mean? What does it involve? What principles underlie it? In relation to what sort of standards should CSR be gauged? What sort of measures do we use to assess performance?

In order to start analysing these questions, we now examine four possible foundations for CSR, which have been derived from an extensive review of the relevant literature: human rights principles; sustainability; economic efficiency; and social

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4 This was conducted as part of a wider project on CSR (see, for example, O’Faircheallaigh 2007), and is based on a review of monograph literature on CSR and a range of relevant journals including Academy of Management Review, Business and Society, Business and Society Review and Journal of Business Ethics.

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**Figure 1** ENVIRONMENTAL CONNECTIONS TO CSR PRINCIPLES (IN CAPITALS)
licence to operate. The first article in this volume (Hutchins et al.) builds on our introduction to provide a conceptual framework for how CSR has evolved as a discourse within the mining industry, using examples from a foreign multinational mining company operating in the United States. The remaining articles in GMI 52 and 53 fall within the following four key dimensions of CSR policy on which we started our discussion.

Human rights

CSR would be understood as the acceptance by corporations that they, like governments, have a responsibility to respect fundamental human rights in the way in which they organise and conduct their business (Dias, this volume; Lertzman and Vredenburg 2005). Key human rights principles would include the right to a clean environment; the right to a safe workplace and equitable employment conditions, including equal employment opportunities; protection from arbitrary government action (e.g. by military regimes); the right to political self-determination; and indigenous free, prior informed consent. The paper by Dias considers the primacy of human rights within international law, but also identifies the challenges towards implementation in the oil sector. What leverage does the international community provide in galvanising positive change in repressive regimes such as Burma/Myanmar? This question is considered by Smith (this volume) from the perspective of civil society (Caruso et al. 2003; Mackay 2004; UNESC 2006). For indigenous people a key motivator in pushing for FPIC is to ensure they can avoid or mitigate adverse environmental impacts from extractive industries, while the ability of resource companies to demonstrate a capacity to limit negative environmental effects is critical in allowing them to secure indigenous FPIC and so create a sound and sustainable basis for their operations over the longer term.

In relation specifically to the environmental effects of mining, the right to a clean environment is clearly of central relevance. That right has won increasing acceptance in international forums, reflecting in part the fact that unless the physical environment is protected then other human rights (the right to economic and social development, to practise culture and ultimately the most fundamental of all human rights, the right to life) may be threatened (Smith, this volume; Van Buren this volume; Zarsky 2002). However, other human rights may also bear directly on extractive industries and the environment. These include the principle of indigenous free, prior and informed consent (FPIC) in relation to development on indigenous lands, a principle that has won substantial acceptance from international organisations such as the United Nations and the Inter American Commission and NGOs, and growing though still limited acceptance among international financial institutions and multinational corporations (Caruso et al. 2003; Mackay 2004; UNESC 2006). For indigenous people a key motivator in pushing for FPIC is to ensure they can avoid or mitigate adverse environmental impacts from extractive industries, while the ability of resource companies to demonstrate a capacity to limit negative environmental effects is critical in allowing them to secure indigenous FPIC and so create a sound and sustainable basis for their operations over the longer term.

Principles of sustainability

CSR would be based on corporate recognition of limits to exploitation of the physical environment, based on the need to achieve sustainability (Lertzman and Vredenburg 2005). Traditionally, limits to the growth of extractive industries have consisted of physical constraints created by the availability of specific resources and
the technical capacity to extract them; and by the impact of markets in determining the overall demand for minerals and prices for them. In a situation where prices were high enough to generate a sufficient return on capital and the resource base was adequate, there was, in effect, no reason why corporations would limit resource extraction. Accepting principles of sustainability implies that corporations might limit production in order to recognise the physical constraints represented by a global environment that, for instance, does not have a limitless capacity to absorb waste and in which biodiversity is seriously and indeed in some cases critically threatened.

Relevant corporate policies might include refraining from mining in protected and environmentally sensitive areas; actions (including constraints on production) to reduce greenhouse emissions and water usage; and use of supply chain linkages to encourage customers and suppliers of goods and services to also adopt sustainability principles. The issue of biodiversity conservation is particularly salient in such matters, since there are several international conventions on the protection of endangered species. The paper by Grigg (this volume) considers this issue with reference to initiatives involving industry, NGOs and wildlife conservation. Performance indicators could include trends over time in energy and water usage per unit of output; and demonstrated success in bringing about behavioural change throughout the supply chain. The paper by Guenther et al. (GMI 53) provides a detailed analysis of how extractive industry companies are currently reporting on their performance and of how that reporting could be enhanced.

**Economic and operational efficiency**

CSR is a ‘modern’ or ‘enlightened’ approach to maximising efficiency, based on a recognition that in today’s world minimising input costs and maximising returns relative to risk requires corporations to utilise a model different to that employed in previous decades. Inputs would be minimised not only to reduce production costs, but also to minimise an extraction project’s environmental footprint at each stage of the production change. For example, reducing the usage of energy fuels in a mining operation would reduce the greenhouse and other environmental impacts of producing those fuels in the first place, of transporting them to the mine site, of burning them and of disposing of waste products. The paper by Norton (GMI 53) considers this matter within the context of securitisation debates in finance theory and practice. The economic model would not only include material input, but also, for instance, the potentially positive impact of CSR policies on attracting and retaining high-quality staff and enhancing staff morale (Richards 2005: 31). High staff turnover and low staff morale represent critical issues for many remote mine sites, add significantly to recruitment costs, lower productivity as a result of the loss of experienced personnel and create problems in maintaining safety standards. If CSR policies can help allay the concerns of employees and potential employees regarding the industry’s adverse environmental and social impacts, they can enhance worker loyalty and worker productivity.

Performance measures in this area would include trends in input volumes and costs per unit of output and in staff turnover, and comparisons in economic returns relative to risk among corporations at the forefront of relevant CSR policy initiatives compared with industry norms.

**Social licence to operate**

CSR reflects a pragmatic acceptance of the reality that corporations must achieve and retain the support of the communities affected by their operations. The driving force in this case is not a commitment to human rights or environmental sustainability per se, though aspects of company
behaviour may certainly be consistent with such a commitment. Neither is it simply an economic model based on the desire to enhance efficiency. Rather what is involved is a pragmatic calculation of what is required to win the degree of community support required to avoid delay or disruption to company operations (Hamann 2003; Humphreys 2000). In some cases this will involve actions that are ‘economically inefficient’ in the short term. There is also an important environmental justice dimension of this matter, which has been studied by Gouldson (2006) in his comparison of CSR performance in the EU and the US. The social licence may ostensibly be easier to obtain from vulnerable impoverished communities and lead to subervience rather than true ‘buy-in’. The tacit acceptance of a project may be misunderstood by companies as the ‘licence’ being granted, whereas resentment may build over time and lead to widespread resistance once communities have the social capital to protest and take direct action.

This dimension of CSR is directly relevant to the environmental effects of mining, because a failure to deal with these effects is often central to a failure to secure, or to the loss of, a social licence to operate. For instance, the closure and ultimate abandonment of Rio Tinto’s Bougainville copper mine in Papua New Guinea resulted, in part, from the widespread environmental damage associated with the project. Numerous proposed projects in every region of the globe have been delayed and many ultimately abandoned because of concerns regarding their potential environmental impact (Humphreys 2000) and it is evident that local communities and populations affected by multiple projects distinguish clearly between them on the basis of their expected environment impact (Ali and Grewal 2006).

Relevant performance criteria in relation to the social licence to operate in this area might include the absence of project relays, disruptions of consumer boycotts and, on a positive note, improving corporate reputation.

Conclusion: prospects for positive change

The ultimate goal of this compendium is to provide some further impetus for positive change in environmental management within the extractive industries and also to inform the larger debate on the viability of CSR for economic and ecological success. The legacy of environmental harm that many extractive communities have endured is immense and has led to tremendous suspicion towards future projects. In essence, environmental concerns are a primary point of influence on various other dimensions of CSR that we have highlighted in this introductory essay. Furthermore, the environmental attribute of non-renewability is of particular importance when considering extractive industries since it is tied to economic and social planning decisions that corporations and regulators alike must make for such projects. Communities also give this matter particular importance in giving companies a ‘social licence to operate’.

Environmentalists have, however, despaired too easily with this attribute of non-renewability, and with appropriate approaches to decision-making and changes in corporate culture it is possible to pursue a trajectory for these communities that can lead to sustainable development. Institutions such as the Extractive Industries Transparency Initiative (Dias, this volume) and the Diamonds and Development Initiative are attempting to make this paradigm shift across the sector. As the papers in these issues of GMI show, the challenges that face extractive industries and other stakeholders in pursuing the goal of sustainable development are often daunting but can be surmounted.
References


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