# The Business of Development: Self-Reliance through Sustainable Local Enterprise Networks

David Wheeler\* & Kevin McKague September 1, 2004

Not for quoting or circulation – submitted to MIT Sloan Management Review

\*Corresponding Author:
David Wheeler
Erivan K Haub Professor of Business and Sustainability, Schulich School of Business
York University
4700 Keele Street
Toronto M3J 1P3
Canada
Telephone 1 416 736 5809
Fax 1 416 736 5195
Email dwheeler@schulich.yorku.ca

## Introduction

In the decade between the 1992 United Nations Conference on Environment and Development (the Earth Summit) in Rio and the 2002 World Summit on Sustainable Development in Johannesburg, the influence of the private sector in developing economies has deepened considerably. Foreign Direct Investment and other forms of private sector investment in low- and middle-income countries have grown rapidly, eclipsing Official Development Assistance. In a growing number of developing countries, governance processes have shifted, redefining the role of governments, development agencies and civil society organizations and establishing a greater role for business in sustainable development. Today many governments, civil society organizations and communities are looking towards private sector efficiency and creativity to help improve the standard of living of the world's poor. This was emphasized by the 2004 report of the UN Commission on the Private Sector & Development, *Unleashing Entrepreneurship*, which made a number of recommendations for public-private partnerships and private sector activity to make "business work for the poor."

Although there remains a high degree of mistrust of private sector involvement in developing countries, exemplified by the more trenchant anti-globalization commentators, polling data from citizens world-wide demonstrates positive aspirations for the role of business. The overwhelming majority of people around the world want business to go beyond conventional activities of making a profit while obeying the law. In addition, the extensive World Bank *Voices of the Poor* surveys illustrate that the poor have aspirations for commercial enterprises to provide livelihoods for themselves and their families.

In response to this demand for a higher-profile role for business, management literature has begun to describe a business-based approach to development. This Bottom of the Pyramid (BOP) approach is based largely on the capability of multinational corporations (MNCs) and their developing country partners to sell goods and services to the world's four billion poor at the 'bottom of the world economic pyramid.' This analysis argues that multi-national corporations have a special role to play in reducing poverty because they can mobilize resources (for example, in distribution and communications), transfer learning between international markets, more easily build partnerships and commercial infrastructure and transfer products and services between developed and developing countries with relative ease. In the BOP model, profits for the MNCs are made in the normal way, albeit with more creative approaches to partnerships, margins and distribution channels.

This paper takes a different but complementary approach to the role of business in reducing poverty. Based on 40 case studies of successful businesses and their partner organizations in Latin America, Africa and Asia, <sup>10</sup> this paper focuses explicitly on the potential for self-reliant, sustainable enterprise to emerge in the developing world with or without the involvement of external actors (such as MNCs). The approach is more asset (or "resource" based in strategic management terms) and seeks to draw attention not just to market opportunities for large businesses, but also to the capabilities, relationships and other resources that local actors may bring to sustainable enterprise in their own contexts. This approach is captured in the Sustainable Local Enterprise Network (SLE Network) model, which describes how sustainable enterprise in many developing countries can thrive in stakeholder-inclusive networked environments – a phenomenon that is seen as increasingly relevant to business more globally. <sup>11</sup>

# Methodology

Over a period of two years (September 2002 – August 2004), 40 case studies were conducted on apparently successful, self-reliant and sustainable enterprise-based activities in developing countries (see *Appendix A* for a list of enterprises studied). The analysis of the cases utilized a grounded theory approach, consistent with the need for theory building in a nascent field. Enterprises were selected based on preliminary evidence of simultaneous economic, social and ecological gain as well as resilience and their ability to create multiple outcomes including local self-reliance and sustainable livelihoods for the poor. The enterprises were sourced through the International Finance Corporation, the Canadian International Development Agency, the Equator Initiative, various awards for enterprise and sustainable development, a literature review and the personal contacts of the authors.

In each case, the enterprise was categorized according to its most important sector and geographical area of influence. Cases were categorized as international if they were sufficiently global in scope. The numbers and types of cases are described in the table below:

Figure 1: Cases Studies by Sector and Region

rigare in duode diagree by decitor and riegren						
Geography	Africa	Latin America	Asia	International	Total by	
				Network	sector	
Sector						
Agriculture	4	7	2	3	16	
Finance	2	1	5	2	10	
Energy	1	1	3	1	6	
ICT			1	2	3	
Other	2	1		2	5	
Total by region	9	10	11	10		

Cases in the agriculture sector included conservation forest harvesting, textiles and small scale manufacturing from locally sourced natural materials. In seven of the 40 cases, a multinational corporation was involved in a significant way as a major customer, joint venture partner or centre of the network.

Primary research was conducted in some cases, but most of the case studies were based on secondary sources. Following a process of strategic analysis, key success factors, inputs and outcomes were identified for each enterprise. These factors were synthesized into the Sustainable Local Enterprise Networks (SLE Networks) model outlined below. The model describes virtuous cycles of economic, social and ecological growth as demonstrated by these enterprises.

# **Description of Model**

In the analysis we discovered that, typically, the cases involve relatively dense networks of for-profit businesses, communities, not-for-profit organizations and other actors that work synergistically to create value in social, ecological and economic terms. We found that successful SLE Networks require at least one for-profit business to anchor the network and ensure that it is financially sustainable. Businesses with an overt sustainable development mission are frequently an integral part of SLE Networks and they can be small or medium sized or, in some cases, may

be multinational enterprises. Co-ops or profitable social enterprises spun off from NGOs can also perform the role of generating the economic value that ensures the financial sustainability of the SLE Network.

We also found that SLE Networks provide an integrating opportunity for businesses, communities, individuals, governments, development agencies and civil society actors to acknowledge a shared asset base and construct a virtuous cycle of asset growth and sustainable outcomes. These sustainable outcomes include profits and reliable returns on investment, local economic development and trade, enhanced quality of life including human development and ecological enhancement and individual and community self-reliance.

In all cases, robust SLE Networks depend on simultaneous synergistic support for mobilizing four key assets: human capital, social capital, financial capital and ecological (natural) capital. Mobilizing investments and re-investments in these four key assets creates a virtuous cycle leading to the growth and replication of SLE Networks which in turn leads to sustainable benefits and outcomes for all participants. Typically the four capitals are synergistic and are not traded off. Indeed this is a pre-requisite for 'sustainability' in the conceptual sense. <sup>13</sup> The assets may be primed or nurtured through exogenous investments made by bilateral and multilateral development agencies, financial institutions or large companies, but their ultimate manifestation should be within a self-reliant, self-reinforcing, virtuous cycle of local economic development – the only really effective remedy for poverty – as depicted below in *Figure 2*.



Figure 2: Model of Sustainable Local Enterprise Networks

At the centre of the model, the various types of organizations and collaborating partners in a possible SLE network are represented. We found that in many cases networks were fluid or even ambiguous. The various sustainable outcome categories are depicted on the right of the model. They include profits or reliable returns on investment, local economic development and trade, enhanced quality of life and individual and community self-reliance. Many assets associated with

these outcomes are reinvested in the network, creating a self-reinforcing virtuous cycle. These self-generated assets are often further enhanced with additional external exogenous investments in human, social, financial and ecological capital.

One of our most significant findings was that it is not necessary for all participants in the SLE Network to agree on the primary purpose of the network. It is also not necessary for supporters of the network (including external commercial and non-commercial investors) to agree on the ultimate purpose of development. Because of this, SLE Networks can transcend, or at least avoid, ideological constraints to co-operation. National and regional governments may see the network primarily as a conduit to trade and economic development. Communities may see the network as a route to individual or community self reliance. Commercial investors, financial institutions and businesses may see the possibilities for profits and returns on investment. Development agencies and donors may see the potential for enhanced quality of life through human development and ecological enhancement. Participants may see some value in these outcomes occurring simultaneously, or they may be disinterested in some outcomes as long as they continue to obtain the outcomes they believe to be important.

## Value Created in Networks

The SLE Network model is consistent with theories of the firm relating to the intrinsic value of social capital, human capital and natural capital. The model is also consistent with the 'resource-based view' of strategy which asserts that competitiveness often resides as much with 'soft assets' and intangible resources that are rare, valuable and difficult for others to imitate as with 'hard assets' such as financial resources, equipment and technology. <sup>15</sup>

SLE Networks also embody contemporary management thinking about the nature of value creation. Increasingly, management theorists, and especially those interested in 'new economy' phenomena, argue that value is created in networks of businesses and their stakeholders - notably business partners and supply chain participants. More fundamentally perhaps, value is not solely an economic metric (in the sense of 'shareholder value' or 'value for money' for the customer). Instead it is socially constructed by a range of actors and may contain a bundle of activities, products or service attributes that are valued for their intrinsic worth to the stakeholder concerned. Wheeler *et al* have described how, in a globalized, networked world, working with communities of interest and other social networks "united by a common sense of what is valuable" is increasingly a pre-requisite to economic pay-off for the companies in the network. 17

Thus, SLE Networks are organizational arrangements that deliver economic and other benefits for all participants while directly addressing traditional sustainable development and poverty alleviation objectives. The Networks explicitly allow the idea that members of the Network may define value in different ways. Like other partnerships in business, SLE Networks leverage complementary capabilities, competencies, assets and resources from participating organizations in order to generate competitive advantage.

The following two cases exemplify SLE Networks that demonstrate positive outcomes in all four outcome categories.

# **Example Cases**

#### **Honey Care Africa**

Honey Care Africa is a commercial honey company established in 2000 by Kenyan entrepreneur Farouk Jiwa and two other investors from Nairobi. Honey Care buys, processes and sells high-quality honey for the East African domestic market and the European specialty food market. Honey Care also sells high-quality Langstroth hives to individuals, communities and development organizations. By customizing these hives to the Kenyan environment, Honey Care has dramatically expanded productivity and revolutionized the practice of bee-keeping in the region.

Honey Care has a mission to achieve rural development through bee-keeping. Honey Care sources its honey from small scale rural beekeepers, mostly women, who are paid a guaranteed fair trade price in cash for all of the honey they produce. Built into Honey Care's business model is a unique partnership arrangement with microfinance institutions and NGOs, which allows the poorest farmers to buy hives with a microfinance loan that is then paid back in honey production. Honey Care provides training, extension services, a guaranteed market for honey produced and certified fair trade prices.

Honey Care's growth has created an increased and diversified income source for some 2,500 of Kenya's poorest women farmers and provides increased incentive for them to protect the natural areas where the bees collect nectar. Biodiversity is further enhanced through a "Bees for Trees" partnership financed by NGOs and their donors, where farmers receive free hives in exchange for reforesting areas of land.

The success of this highly partnership-based enterprise (Honey Care has partnerships with 17 different donor organizations and NGOs) has led to its rapid expansion to become the largest supplier of high-quality honey in East Africa. Honey Care reached profitability in 2003, employs 23 staff and currently produces 65 metric tonnes of honey annually. The World Bank has recently invested additional capital to facilitate the expansion and replication of Honey Care's business model to Tanzania, with the International Finance Corporation contributing technical assistance. The UK's Department for International Development has invested in feasibility studies to explore how Honey Care's partner microfinance organizations can provide loans at market interest rates, allowing the microfinance component to become financially self-sustaining.

Honey Care's innovative and highly networked business model is successfully allowing a growing number of poor farmers to raise themselves above the poverty line in a way that protects and enhances the natural environment. This has allowed Honey Care to attract and leverage additional investments from investors, development agencies, NGOs and local governments and build an expanding virtuous cycle of beneficial growth for all of the members of Honey Care's network.

#### **Grameen Shakti**

Grameen Shakti is another enterprise that has demonstrated the success of a highly networked approach involving mutually reinforcing investments from a number of organizations. Grameen Shakti is a Bangladeshi enterprise that sells solar electric home energy systems to families that do not have access to electricity – which includes over 70% of the population.

Shakti was established in 1996 as a member of the Grameen Bank's family of enterprises that are dedicated to improving the quality of rural life in Bangladesh. Although registered as a not-for-

profit organization, Shakti is run entirely like a business. In the face of persistent market challenges and in one of the most corrupt countries in the world, Shakti achieved profitability in 2000 after only four years of operation. To date, Shakti has installed over 20,000 solar systems that have provided over 100,000 lower income individuals with access to modern, reliable electricity – essential for increased productivity of agricultural and microenterprise activities and quality lighting for studying in the evenings.

Although Shakti and Grameen Bank are managed as separate entities, Shakti's close relationship with the bank allows it to benefit from the Bank's network and presence in 36,000 villages in Bangladesh. Grameen Bank helps raise awareness of the solar systems and has helped Shakti build the organizational capacity to provide microfinance loans to families who want to purchase a system. A \$750,000 loan from the International Finance Corporation and a \$2 million grant from USAID have allowed Shakti to provide financing terms of up to three years, making monthly payments affordable to families with lower incomes.

Shakti also actively collaborates with Grameen Phone, another member of the Grameen family, to package solar home systems and cell phones together. Purchasing a cell phone and solar home system together, and then selling phone service by the minute is an attractive revenue generating microenterprise that can generate enough income for an entrepreneur to pay off the loan for the solar home system and cell phone while markedly improving the entrepreneur's standard of living.

Grameen Shakti has grown to be the dominant player in the Bangladeshi solar energy market, currently installing an average of 800 systems per month. In addition to the rural development benefits generated by Shakti's activities, Shakti is contributing to improved indoor air quality through the avoidance of biomass-based fuels and is addressing global climate change through the avoidance of kerosene and diesel fuels.

# Discussion: A Complex Systems View of Assets and Resources

The above analysis and two case examples indicate that SLE Networks offer a promising source of positive outcomes for sustainable development. However, to encourage wide scale growth and replication of SLE Networks, significant interventions will be necessary. The conditions required for simultaneous investment in social, human, financial and natural capital do not exist everywhere. All too frequently traditional development interventions focus on investments in just one or two of the required assets.

As noted above, effective SLE Networks depend on mobilizing all four key assets: human capital, social capital, financial capital and ecological (natural) capital. The interconnectedness of these four capital assets requires a 'systems view' of assets, resources, and the flows between them and an understanding of how network phenomena and complex, adaptive systems work in social, ecological and economic terms.

The work of Stacey<sup>18</sup> and others has explored the notion of systems and complexity at a theoretical level. This work provides some helpful insights into the SLE Network model. Wheeler <sup>19</sup> has described the related fields of complexity and chaos specifically in the context of sustainable enterprise thus:

"Complex systems are characterized by high levels of interaction leading to non-linear phenomena, self-organization and adaptation. Constituents of complex systems may co-exist at the 'edge of chaos' for purposes of maximizing adaptability in the event of unpredictable or catastrophic change. Or constituents may self-organize and co-evolve to allow new patterns and a new order to emerge. In this sense complexity and chaos are separable, although the two concepts are frequently linked. But in both cases, interaction or enactment with other actors is the key to remaining competitive and adaptive during incremental or catastrophic change and transition to a new state."

Therefore, in order to significantly transform enterprise-based activities in the developing world, the following logic may apply:

- 1. Sustainable Local Enterprise Networks hold promise because they have the characteristics of self-organizing, complex adaptive systems. They are highly interactive, diverse and resilient.
- 2. However, SLE Networks require particular system conditions to thrive. Strengthening SLE Networks requires *simultaneous* attention to investment and/or re-investment in four classes of capital. These assets form part of interlocking local and international resource systems that have stocks and flows that may facilitate the diminution or growth of capital in all four dimensions.
- 3. The required conditions for SLE Networks are met only in rare cases at the present time. This implies the need for a significant change in relationships between enterprise-based activities in the developing world and broader social, economic and political systems in which they are embedded (for example, global trade and investment systems, national and international governance systems, etc.).

# **Nurturing and Growing Capital for SLE Networks**

Our findings concluded that significant opportunities exist for high-leverage 'systems interventions' to promote the emergence of stronger and more numerous SLE Networks in the developing world. In the 2004 report of the UN Commission on the Private Sector and Development, the report's authors argue that the public sector must foster property rights, simplify regulatory and fiscal systems, apply the rule of law and ensure transparency and good governance in order to 'level the playing field' for entrepreneurship to flourish. <sup>20</sup> The authors also point to the importance of reforming finance and access to capital and developing human skills and knowledge. This list is an excellent starting point for more specific recommendations with respect to opportunities for meaningful 'high leverage' investments in human capital, social capital, financial capital, and ecological capital at a global level. These recommendations are outlined below.

#### **Facilitating the Development of Human Capital**

The presence of effective business and social entrepreneurs was noted in all 40 cases in this study. It is critical that SLE Networks gain access to effective and appropriate management training and capacity building. Such training will allow business and non-business members of

emerging SLE Networks to compete, grow and increase their contributions to sustainable development.

Current mainstream models of business training do not address sustainability or poverty reduction issues directly and are often steeped in a competitive paradigm as opposed to a more collaborative approach to other business or social partners. Most current models of business education also pay little attention to environmental issues or issues relating to sustainable livelihoods. Enabling and supporting developing country universities and business training institutes to incorporate these issues in their programs is extremely important to help educate tomorrow's entrepreneurs and managers. Training for sustainable enterprise could include nurturing sustainability mindsets, building capabilities for participating in networks and partnerships, identifying sources of financing for sustainable enterprise and creating alternative business models. Developing a global network of partnerships between sustainable development-oriented business schools globally<sup>21</sup> and developing country training institutions could be of great value.

#### Facilitating the Development of Social Capital

Social capital binds the members of human networks and communities together. It makes collective action possible and is facilitated through building trust, mutual understanding, shared values and connections between people. Developing social capital between potential members of SLE Networks can facilitate the flow and investment of the various types of capital and can help maximize benefits for all members.

Our research identified a specific opportunity for businesses and business networks to convene strategic dialogues that would maximize social capital and network-to-network linkages between international firms, entrepreneurs, development NGOs, investors, local communities, government agencies and other potential SLE Network members. These strategic dialogues can often work best if focused on a specific geographic region (city, region, community, country, etc.) and/or a specific issue (water, sanitation, AIDS, etc.).

These strategic dialogues and network-to-network connections can enhance the linkages between sectors of a developing country economy with corresponding sectors in developed countries. The developing country industry sectors and SLE Networks could benefit from mentoring, technology transfer and the sustainable practices of leading international companies. Developed country and international businesses could benefit from potential partnerships or supply chain opportunities. NGOs, communities and governments can benefit in many ways as well. Such twinning of 'dense networks' of existing industry associations and networks from the North and South will be far more effective in driving long term development-enhancing partnership possibilities than limitless uncoordinated forays by single companies exploring export or outsourcing opportunities on an individual basis.

#### **Facilitating the Availability of Financial Capital**

The cases studied included some new and innovative approaches to financing sustainable business as part of an SLE Network, ranging from microcredit to venture capital to commercial financing. Facilitating the availability of financial capital at each level of scale is discussed below.

#### Microfinance

As the UN's international year for microcredit approaches in 2005, the challenge for many microfinance institutions is to provide services efficiently and sustainably. There are

opportunities for microfinance institutions, commercial banks and development organizations to enter into innovative partnerships and network together to achieve these goals.

The celebrated success of the Grameen Bank's microfinance model<sup>22</sup> has been such that ICICI Bank, India's second largest financial institution, has recently begun working with NGOs and local community groups to provide microfinance loans directly to the poor.<sup>23</sup> Similarly, MicroVest, a capital-mobilizing intermediary for microfinance organizations organized by CARE and two other international non-profit development organizations, has raised \$15 million to invest in 250 of the most profitable microfinance organizations and is expecting a rate of return of 7-8%.<sup>24</sup>

Further experimentation and collaboration between microfinance institutions, commercial banks, and market-oriented development organizations can help realize the potential of microfinance to generate income and livelihoods for millions of the world's poor and empower them to participate as full partners in SLE Networks.

#### Venture and Growth Financing

The "blended value" that businesses and other organizations involved in SLE Networks create makes it challenging to attract investment from traditional venture capital sources (typically looking only for economic returns) or donor sources (typically looking only for social or environmental returns). Our research found that most often, SLE Network businesses require a tailored mix of patient capital, grants and on-the-ground technical assistance appropriate to their particular market context.

The International Finance Corporation and the World Bank have recently recognized this new financing need and have launched the joint *Grassroots Business Organizations* initiative to provide technical assistance, long-term patient capital and loans to socially and environmentally oriented business ventures that provide direct benefits to the world's poorest and most marginalized people.<sup>25</sup>

Further recognition of the unique financing needs of SLE Network members and the development of tailored financing and training packages will provide the much needed financial capital for many small and medium sized organizations.

#### Commercial Financing

For large and medium sized profitable businesses, commercial financing is available through traditional institutions such as banks and the International Finance Corporation. In particular, the International Finance Corporation has a number of innovative programs including the Environmental Opportunities Facility, the Corporate Citizenship Facility and the Small and Medium Enterprise Program that are designed to support a sustainable private sector in developing countries.

For the increased mobilization of financial capital at various levels of scale, support for a variety of financing arrangements is needed that will invest in sustainable businesses as components of SLE Networks. Further experimentation, gathering of best practices and networking would facilitate additional learning and reduce risks. Importantly, all of the above financing channels need to explore how they can significantly increase their risk-tolerance as they operate in a new way in developing country economies.

#### Facilitating the Protection and Enhancement of Ecological Capital

Our research found that ecological capital can be enhanced through investments in other types of capital (e.g., through education and training in sustainable development, the placement of ecological sustainability as a financing criterion on investment flows, etc.). Ecological capital can also be preserved and enhanced by involving environmental organizations and their investors as an essential part of SLE Networks.

Coalitions of organizations have begun to play a role in enhancing ecological capital, including the Global Environment Facility which helps developing countries fund projects and programs that protect the global environment. More recently the Equator Initiative, funded by UN agencies, national governments and environmental NGOs, has developed a program of awards, research, networking and learning to reduce poverty through the conservation and sustainable use of biodiversity.

# **Implications**

All of these investments in human, social, financial and ecological capital need to be coordinated at various levels from the international level to the local level. This will require a high degree of co-operation between international agencies, governments and businesses and other actors. These actors need to begin thinking of themselves not just as policy-makers, relief agencies, rule-setters and profit makers but must instead re-conceptualize their roles as:

- Network Builders: by building on strategic dialogues between businesses (large and small, local and international), development agencies, government departments and local communities to develop approaches that would maximize business contribution to sustainable development through the creation of SLE Networks;
- 2) *Capacity Builders*: through sharing resources and knowledge with network partners (including low-income individuals, communities and entrepreneurs) in ways that are beneficial for the overarching vision of the SLE Network. We found that all members of successful Networks have something to offer and learn in this regard. Global educational and learning networks focused on new business models and non-traditional partnerships are valuable here;
- 3) **SLE Network Incubators**: through working with financial institutions and other providers of financial capital to explore opportunities for tailored financing and training services;
- 4) *Innovators, Leaders and Disseminators of Good Practice and Lessons Learned*: by capturing the results of experience and experiments and feeding information into the practice, policy, and programming of Network members and a wide international audience.

Through these roles, high-level actors and others may become significant catalysts for profound change and can help create a more bottom-up networked approach to the role of business and entrepreneurship in development. However, to successfully facilitate support for sustainable livelihoods through SLE Networks, risks will need to be taken, many experiments will need to be conducted and some flexibility of roles will be required. In short, the actors will need to role-model exactly those new mind-sets and behaviours that we observe in the best SLE Networks.

Word count: 4869

# Appendix A: Sustainable Local Enterprise Networks Studied

Organization	Region	Sector
ACACIA Fund	Africa	Finance
Aucmen Fund	International	Finance
African Rural Energy Enterprise Development Initiative	Africa	Energy
AmaZoncoop	Latin America	Agriculture
AVIVE	Latin America	Agriculture
Body Shop Community Trade Program*	International	Agriculture
Bolsa Amazônia	Latin America	Agriculture
Café de la Selva	Latin America	Agriculture
CatGen	International	ICT
Cemex*	Latin America	Cement
Certified Pure Ingredients	Latin America	Agriculture
DevelopmentSpace.com	International	Finance
E+ Co	International	Energy
EcoEnterprise Fund	Latin America	Finance
EnterpriseWorks	International	Agriculture
ForesTrade	International	Agriculture
Grameen Phone and Telecom	Asia	ICT
Grameen Shakti	Asia	Energy
Grand Turk Greenhouse	Latin America	Agriculture
Honey Care Africa	Africa	Agriculture
HP e-inclusion*	International	ICT
ICICI Bank*	Asia	Finance
Il Ngwesi Group Ranch	Africa	Tourism
Indigenous Designs	Asia	Agriculture
Kijani Fund	Africa	Finance
Mekong Project Development Facility	Asia	Finance
Natural Resource Business Development Project	Asia	Finance
Ocean Desert Enterprises	Africa	Agriculture
Pamir - Tajikistan*	Asia	Energy
Placer Dome Joint Venture Care Project*	Africa	Mining
Rural Finance Outreach	Asia	Finance
Seawater Farms and Seawater Forests Initiative	Africa	Agriculture
Selco Vietnam	Asia	Energy
Society for Research and Initiatives for Sustainable Technologies		
and Institutions	Asia	Agriculture
Soluz Honduras	Latin America	Energy
Socio-Economic Development through Co-operatives	Asia	Finance
Ten Thousand Villages	International	Manufacturing
Tiviski Dairy	Africa	Agriculture
Treetap (Couro Vegetal da Amazônia)	Latin America	Agriculture
WorldWater*	International	Water

<sup>\*</sup> indicates the involvement of a multinational corporation as a significant member of the network.

#### **Endnotes**

- <sup>1</sup> UN Conference on Trade and Development. "World Investment Report 2001," New York: UNCTAD, 2001, and US Agency for International Development, "Working for a Sustainable World," Washington: USAID, 2001.
- <sup>2</sup> Defined here as development that "meets the needs of the present without compromising the ability of future generations to meet their own needs" after World Commission on Environment and Development, "Our Common Future" (Oxford: Oxford University Press. 1987).
- <sup>3</sup> UN Commission on the Private Sector and Development, "Unleashing Entrepreneurship: Making Business Work for the Poor" (New York: UNDP, 2004).
- <sup>4</sup> Here we may cite commentators such as N. Klein, "No Logo," (London: Flamingo/Harper Collins, 2000) and
- D. Korten, "When Corporations Rule the World," (West Hartford, CT: Kumarian Press/Berrett-Koehler, 1995).
- <sup>5</sup> Environics International, "Corporate Social Responsibility Monitor," public opinion survey conducted on behalf of the World Economic Forum, 2001.
- <sup>6</sup> D. Narayan, et. al., "Voices of the Poor: Can Anyone Hear Us?" (Oxford: Oxford University Press, 2000); and D. Narayan et. al., "Voices of the Poor: Crying Out for Change" (Oxford: Oxford University Press, 2000).
- <sup>7</sup> A. Hammond and C.K. Prahalad, "Selling to the Poor," Foreign Policy, (May/June 2004): 30-37, and C.K. Prahalad, "The Fortune at the Bottom of the Pyramid" (Philadelphia: Wharton School Publishing, 2004). The 'bottom of the pyramid' refers to the 4 billion people who live in subsistence economies and generally survive on a per capita income of less than \$1,500 per annum.
- 8 C.K. Prahalad and S.L. Hart, "The Fortune at the Bottom of the Pyramid," Strategy + Business 26, first quarter 2002.
- <sup>9</sup> S.L. Hart and C. Christensen, "The Great Leap: Driving Innovation from the Base of the Pyramid," Sloan Management Review, Vol. 44, No. 1 (2002): 51-56.
- <sup>10</sup> The research described here was funded by the Canadian International Development Agency, the International Finance Corporation (World Bank) and the MacLean Foundation of Canada.
- 11 D. Wheeler, "The Successful Navigation of Uncertainty: Sustainability and the Organization," in "Leading in Turbulent Times," eds. R. Burke and C. Cooper, (Oxford: Blackwell Publishing, 2003): 182-207.
- <sup>12</sup> B. Glaser and A. Strauss, "The Discovery of Grounded Theory," (Chicago: Aldine, 1967); J. Corbin, and A. Strauss, (1990), "Grounded Theory Research: Procedures, Canons and Evaluative Criteria," in Qualitative Sociology 13 no. 1, (1990); 3-21; and K. Eisenhardt, "Building Theories from Case Study Research," in Academy of Management Review 14 no. 4, (1989): 532-550.
- <sup>13</sup> H.E. Daly and J. Farley, "Ecological Economics: Principles and Applications," (Island Press, 2003).
- 14 P.S. Adler and S.W. Kwon, "Social Capital: Prospects for a New Concept," Academy of Management Review 27 (2002): 17-40;
- J. Nahapiet and S. Ghoshal, 1998. "Social Capital, Intellectual Capital, and the Organizational Advantage," Academy of Management Review, 23 (1998): 242-266; A. Portes, "Social Capital: Its Origins and Applications in Modern Sociology," in Annual Review of Sociology 24 (1998): 1-24; G. Dess and J. Picken, (1999). "Beyond Productivity: How Leading Companies Achieve Superior Performance by Leveraging their Human Capital," (New York: American Management Association, 1999); and P. Hawken, A. Lovins and L.H. Lovins, "Natural Capitalism: Creating the Next Industrial Revolution." (New York: Little. Brown and Company, 1999).
- <sup>15</sup> B. Wernerfelt, "A Resource-Based View of the Firm," Strategic Management Journal 5 (1984): 171-180; J.B. Barney, "Firm Resources and Sustained Competitive Advantage," Journal of Management 17 (1991): 99-120; J.B. Barney, "Looking Inside for Competitive Advantage," Academy of Management Executive 9(4), (1995): 49-61; and J.B. Barney and M.H. Hansen, "Trustworthiness as a Source of Competitive Advantage," Strategic Management Journal 15 (1994): 175-190.
- <sup>16</sup> W. Tsai and S. Ghoshal, "Social Capital and Value Creation: The role of Intrafirm Networks," Academy of Management Review 41 (1998): 464-476; and D. Tapscott, D. Ticoll and A. Lowy, "Digital Capital: Harnessing the Power of Business Webs," (Boston: Harvard Business School Press, 2000).
- <sup>17</sup> D. Wheeler, B. Colbert and R.E. Freeman, "Focusing on Value: Reconciling Corporate Social Responsibility, Sustainability and a Stakeholder Approach in a Network World," Journal of General Management 28(3), (2003): 1-28.
- <sup>18</sup> For a more detailed discussion of complexity and how it relates to a systems view of assets and resources see R. Stacey, "Managing Chaos: Dynamic Business Strategies in an Unpredictable World," (London: Kogan Page: 1992); R. Stacey, "Strategy as Order Emerging from Chaos," Long Range Planning, 26(1), (1996): 10-17; R. Stacey, "The Science of Complexity: An Alternative Perspective for Strategic Change Processes," Strategic Management Journal 16(6), (1995): 477-495; P. Senge, A. Kleiner, C. Roberts, R. Ross, R. Roth and B. Smith, "The Dance of Change: The Challenges to Sustaining Momentum in Learning Organizations," (New York: Doubleday-Random House, 1999); P. Senge and G. Carstedt, "Innovating our Way to the Next Industrial Revolution," MIT Sloan Management Review, (Winter 2001): 24-38; D. Levy, "Chaos Theory and Strategy: Theory, Application, and Managerial Implications," Strategic Management Journal 15, (1994): 167-178; K.J. Dooley and Van de Ven, "Explaining Complex Organizational Dynamics," Organization Science 10(3), (1999): 359-372; and K.A. Frank and K. Fahrbach, "Organization Culture as a Complex System: Balance and Information in Models of Influence and Selection," Organization Science 10(3), (1999): 253-277.
  <sup>19</sup> D. Wheeler, "The Successful Navigation of Uncertainty: Sustainability and the Organization," in "Leading in Turbulent Times," eds. R. Burke and C. Cooper (Oxford: Blackwell Publishing, 2003): 182-207.
- <sup>20</sup> UN Commission on the Private Sector and Development, "Unleashing Entrepreneurship: Making Business Work for the Poor" (New York: UNDP, 2004).
- <sup>21</sup> Such as those identified as leaders in the World Resources Institute's "Beyond Grey Pinstripes" survey of management schools incorporating social and environmental issues into their curriculum. See also D. Wheeler, D. Horvath and P. Victor, "Graduate Learning for Business and Sustainability," Journal of Business Administration and Policy Analysis, 27-29, (2001): 123-144.
- <sup>22</sup> M. Yunis, "Banker to the Poor: Micro-Lending and the Battle Against World Poverty," (HarperCollins, 2003).
- 23 C.K. Prahalad, "The Fortune at the Bottom of the Pyramid," (Pennsylvania: Wharton School Publishing, 2004): 289-318.
- <sup>24</sup> MicroVest was founded by CARE, Mennonite Economic Development Associates (MEDA) and Seed Čapital Development Fund. For more information see www.microvestfund.com.
- <sup>25</sup> For more information on the Grassroots Business Organizations initiative, see www.ifc.org/gbo.
- <sup>26</sup> For more information on the Global Environment Facility see www.gefweb.org.