

A Sustainable Economics and Business Reading List

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These are books that provide valuable knowledge about the fundamental challenge of 21st century civilization:

Aligning global economies with what is environmentally and socially sustainable.

Following the title, author and publisher/date, I have provided a brief description of the book and an excerpt that summarizes its content and style. I hope this is useful in your quest for wisdom and tools, and that you enjoy them as much as I did.

-- Christopher

Believing Cassandra – An Optimist Looks at a Pessimist's World

Alan AtKisson (sustainability activist / consultant; founder Sustainable Seattle)

Cheslea Green, 1999

Insightful look at the practical psychology of being a successful environmental advocate. AtKisson is founder and leader of AtKisson Inc., a sustainability consultancy.

Excerpts:

"To understand that humanity is on a collision course with the laws of Nature is to be stuck in what I call Cassandra's Dilemma. You can see the most likely outcome of current trends. You can warn people about what is happening, and underscore the need for a change in course. Some people can understand you, and a few may even believe you and try to

take action - but the vast majority cannot, or will not, respond. Later, if catastrophe occurs, they may even blame you, as if your prediction set in motion the process that resulted in disaster (self-fulfilling prophets are the most reviled).

If, however, the World manages to avoid the potential catastrophe, thanks in part to the work of those who were motivated to action by your warning, many will point to that escape from danger as evidence of your incompetence as a prophet. The role of Cassandra, issuing unpopular warnings of avoidable danger, is a no-win situation. Failure to convey the message effectively results in catastrophe. Success in being understood means ultimately being proven wrong. The worst and most painful outcome for any Cassandra is to be proven right.” (p. 22)

The world is a collection of systems which is the problem, especially when feedback to the system is delayed. Few people are actually doing evil things. The problem is that Nature and our World don't dance very well; feedback isn't precise or quick enough. But Nature leads the dance and we need to get with the rhythm. New England cod tragedy is an example of poor feedback resulting in fishery collapse. So the World is out of control.” (p. 70)

Biomimicry: Innovation Inspired by Nature

Janine M. Benyus (biologist, science writer and founder of the Biomimicry Guild))

Harper Perennial, 2002 (originally published 1997)

Inspirational description of scientific research on nature's efficiency secrets that may dramatically reduce our ecological footprint, plus principles for organizing businesses around “how would nature do it?”.

Excerpt: From the www.biomimicry.net website of current information (2003)

“The core idea is that nature, imaginative by necessity, has already solved many of the problems we are grappling with. Animals, plants, and microbes are the consummate engineers. They have found what works, what is appropriate, and most important, what *lasts* here on Earth. This is the real news of biomimicry: After 3.8 billion years of research and development, failures are fossils, and what surrounds us is the secret to survival.

“Like the viceroy butterfly imitating the monarch, we humans are imitating the best and brightest organisms in our habitat. We are learning, for

instance, how to harness energy like a leaf, grow food like a prairie, build ceramics like an abalone, self-medicate like a chimp, compute.

“Nature as Model: Biomimicry is a new science that studies nature's models and then imitates or takes inspiration from these designs and processes to solve human problems, e.g., a solar cell inspired by a leaf.

Nature as Mentor: Biomimicry uses an ecological standard to judge the "rightness" of our innovations. After 3.8 billion years of evolution, nature has learned: What works. What is appropriate. What lasts.

Nature as Measure: Biomimicry is a new way of viewing and valuing nature. It introduces an era based not on what we can extract from the natural world, but on what we can learn from it.

“Already, biomimics are learning to grow food like a prairie, harness energy like a leaf, weave fibers like a spider, compute like a cell, find cures like a chimp, and run a business like a redwood forest. Nature manufactures in water, without toxins, using abundant raw materials and very little energy. Nature banks on the diversity of polycultures rather than the vulnerability of monocultures. Nature computes using shape, not symbols. These and other new ideas will surprise you, and help you brainstorm about ways to not just tweak old paradigms, but to overturn them completely.”

Biosphere Politics – A New Consciousness for a New Century

Jeremy Rifkin (President of the Foundation on Economic Trends)
Crown Publishers Inc., 1991

Broad historic description of how commodification of nature and management of land for export rather than nurturing people on it threaten collective security and ecological health.

Excerpt:

“The environmental threats facing the planet are not simply the result of scientific miscalculation. Nor are they merely the consequence of ill-conceived management decisions. Ironically, it is the notion of security upon which our entire modern worldview is based that has led us to the verge of ecocide. A thorough understanding of the current ecological crisis will require a vigorous examination of the social forces and philosophical currents that underlie our contemporary views of economic, political and military security.

More important still, saving the earth will require a fundamental change in our thinking about security, and a new worldview that is more compatible with our species' awakening ecological consciousness. The past several centuries have been dominated by the mechanistic thinking of the

Enlightenment, with its emphasis on the privatization and commodification of nature and man; detachment and isolation from the natural world; and a near pathological obsession with creating a secure, autonomous existence, independent of the forces of nature.

The nation-state and its appendages, the modern business corporation and the professional military establishment, have emerged as the primary institutional vehicles for implementing the modern notions of individual and collective security. Geopolitics, in turn, has evolved as the primary expression of nation-state ideals and objectives. In less than a century, the practice of geopolitics has pushed the world to the brink of both nuclear Armageddon and environmental catastrophe, forcing us to reconsider the basic assumptions of security that animate the modern worldview.

Fortunately, the elements of “a new way of thinking” about security have been in the making for nearly a quarter of a century and are now steadily edging forward from the margin to the center of human consciousness, providing the context for a wholesale challenge to the existing world order.” (pp 2-3)

Cannibals With Forks – The Triple Bottom Line of 21st Century Business

John Elkington (business consultant; founder of Sustainability, Inc.)
New Society Publishers, 1998

High-level look (with many practical corporate examples) at the turmoil in capitalism adopting sustainability and corporations pursuing sustainability strategies and partnerships - from a “granddaddy” of sustainable business consulting and terrific writer heading an international consultancy from the U.K.

Excerpt:

“Capitalism and sustainability, however much we may wish it otherwise, do not make easy bedfellows. ... Meanwhile, although it is far from clear that capitalism is significantly more environmental damaging than the alternatives, it has been in the spotlight recently both because of its rising global power and because of what some would have us believe is the “end of history.

So capitalism it is, but we are seeing an interesting shift towards a debate about the limits and weaknesses of market mechanisms. Stripped to its essence, capitalism – of whatever brand – is an economic (and, necessarily, political) system in which individual owners of capital are (relatively) free to dispose of it as they please and, in particular, for their

own profit. As we will see, there are many ways of calculating, defining and valuing capital, but a key question for all capitalist societies in the 21st century will be whether their particular version can be sustained in the face of broader economic, political, social and environmental challenges?” (pp. 24-26)

Capitalism As If The World Matters

Jonathon Porritt (Founder, UK's Forum for the Future and Chair, UK Sustainable Development Commission)
Earthscan, 2005

The best recent book on the unsustainability of the industrial economic system and how to make capitalism work from a well-rounded and highly respected sustainability leader of the UK. Includes the “five capitals” framework designed to emphasize (similar to Natural Capitalism) that good capitalists build all the forms of capital needed – and don’t consume it to our lasting detriment.

Excerpt:

“Behind the notion of capitalism lies the notion of capital – which economists use to describe a stock of anything (physical or virtual) from which anyone can extract a revenue or yield. Although it is true that many environmentalists and social justice campaigners remain wary of getting sucked too deep into the working practices and language of capitalism, the premise behind the idea of the Five Capitals Framework is that we can’t reform capitalism without adopting some of its insights, tools and drivers.

But most of today’s “reform agendas” (from the progressive left, for instance) simply refuse to face up to some of the issues covered in Part I of this book as they do not to confront the challenge of learning to live within non-negotiable biophysical limits.

Although many critics of today’s dominant capitalism paradigm would profoundly disagree with such a position, a viable hypothesis emerges from this preliminary analysis that there is no inherent, fixed or non-negotiable aspect of capitalism in general (rather than today’s particular form of capitalism) that renders it for all time incompatible with the pursuit of a sustainable society.” (p. 111 – Intro to Part II)

Democracy At Risk – A Populist Vision for the Twenty-First Century

Jeff Gates (attorney and founder, Shared Capitalism Institute)
Perseus Publishing, 2000

Detailed, courageous description of how wealth concentration threatens democracy itself including specific populist solutions to protect the environment, enhance equitable wealth distribution and deliver a future that works for all. Also see Gates' *The Ownership Solution* for a brilliant look at how and why employee ownership is a sustainability solution – with examples from around the world.

Excerpt:

“To suggest that a personalized free enterprise might be possible raises eyebrows within the mainstream. Yet that is precisely the sort of intimate capitalism we need. Broad-based leadership is consistent with the populist resistance both to traditional hierarchies and to political elites. Its success is measured by its capacity to evoke local leadership excited about the prospect of taking on more personal responsibility for the future of their community.

Capitalism needs ways to learn with something more than just financial feedback, because that alone fails miserably to advance the sort of multidimensional learning now needed. This global, multidimensional, and intergenerational learning requires a very new sort of leadership – one that distinguishes the external knowledge provided by markets from the inner knowledge within each individual and community.

The challenge facing populist leaders lies in helping people regain the self-confidence required to translate their democratic instincts into institutions and rulemaking. Success in that domain is what gains social traction for people's democratic sentiments – and for their commitment to future generations.” (pp. 241, 247)

For The Common Good – Redirecting the Economy Toward Community, the Environment, and a Sustainable Future

Herman E. Daly (renowned pioneering environmental economist) and
John B. Cobb, Jr. (theologian)
Beacon Press, 1989

A timeless, readable synthesis bringing spirit and common sense to modern economics – from proposing to replace Gross National Product with Net Social Welfare to showing how markets need to be used as tools for the community good, not a religion.

Excerpt:

“While the book is a severe critique of the contemporary discipline of economics, our purpose is not to reject the core of its teaching. ... The economy, the Great Economy, is far larger than what economics studies. We think that our collaborative work is a type of reflection in which citizens

from many backgrounds needs to share. Decisions that will be made soon in this country will shape the world of our children and grandchildren, probably irreversibly. They should not be made within the restricted context that now governs the academic discipline of economics.” (p. 19)

Good News for a Change – How Everyday People are Helping the Planet

David Suzuki (scientist, environmentalist and broadcaster) and Holly Dressel (writer/researcher)
Greystone Books, 2002.

A very readable and inspiring tome (slightly dated now in 2007) on the sustainability movements in business/economics, global trade, agriculture, consumption, water, forest and wildlife management, and personal consumption, drawing from the best thinkers/activists worldwide to demonstrate progress, models of progress, and barriers.

Excerpt:

“Sarah Severn, a pretty blond woman with a light English accent who came to Nike’s big Portland office five years ago, says, “I was brought over here to help bring a European perspective to a U.S.-based company, because there was emerging legislation in Europe beginning to look at the impact of all sorts of chemicals in products.” Today Severn is the director of Sustainable Development for all of Nike, seen by many in the company as the instigator of an entire new ethos. At that early point in her Nike involvement, Severn found out about The Natural Step and she also read Paul Hawken’s seminal book *The Ecology of Commerce*. “That was really the wake-up call that helped explain all the issues very dramatically.”

Phil Berry, today in charge of Footwear Sustainability, was brought in to work on pollution prevention. Nike labs were given the goal of replacing inorganic solvents with water-based adhesives, cleaners and primers. “And that’s been an incredible success,” Severn says. “But it hasn’t been easy. There’s been a lot of research that didn’t pan out. People were very committed, and they kept trying.” She says the key is a forward-looking approach: “You can’t just beat yourself up when you find out how dangerous some material you’ve been using is.” She says the goals are to substitute positive materials for hazardous ones and to produce things that can be safely returned to the earth.

As The Natural Step suggests, whatever can’t be absorbed into the earth, like lead or certain plastics, needs to remain within the manufacturing process and be used over and over again. She says, “That’s obviously a challenge when you have a very broad-spread consumer-based business.” (p. 23)

Leading Change Toward Sustainability – A Change Management Guide for Business, Government and Civil Society

Bob Doppelt (Dir. of Program for Watershed and Community Health, Univ. of Oregon)
Greenleaf Publishing, 2003

Doppelt draws on his years of experience in promoting sustainability to describe a cogent and compelling approach for leaders (or “champions”) in organizations. Based on three years of research with organizations on the sustainability journey, Doppelt addresses the business case for sustainability performance and the challenges of getting there.

Excerpt:

“After being appointed CEO of Herman Miller Inc., a global manufacturer of office furniture, one of the first steps Dick Rupp took was to encourage the organization of the Environmental Quality Action Team (EQAT). The team’s mission was to ‘help the corporation through the muddy waters of environmentalism.’ Prior to the EQAT, no formal mechanism existed to engage its 9000 employees in environmental issues. Senior executives recognized that every employee and every unit must be involved if the firm was to improve its environmental management.

Once the EQAT was clear on its mission, it proceeded to form nine subcommittees. Over 200 people participate on the subcommittees, all on a volunteer basis over and above their regular job responsibilities. The 20 person “design for the environment” (DfE) team, for example, was established to formulate sustainable products. The Ergon3 office chair is one outcome of this group’s efforts. This ergonomically sound chair is made with 60% recycled content, and 95% of its materials can be recycled and re-used.” (p. 108)

Living Within Limits – Ecology, Economics, and Population Taboos

Garrett Hardin (Professor Emeritus of Biology, Univ. of California)
Oxford Univ. Press, 1993

Hardin has been an intellectual leader in the field of sustainability for several decades. He popularized the “tragedy of the commons” in the 1960s and is willing to brazenly confront what others shy away from: ecological carrying capacity and population control. Plus, he’s a brilliant, broad-thinking writer and researcher.

Excerpt:

“The ideas that are necessary for population control are easily accessible to the ordinary mind. They are widely known, but people are not as acutely aware of them as they must be if population control is ever to be achieved.

If talented teachers can find striking ways of fitting the following generalizations into primary and secondary education, the advance of population control will be greatly furthered. (1) Exponential Growth; (2) Our world is finite; (3) There will never be a perpetual motion machine; (4) Diseconomies of scale are the rule; (4) Carrying capacity is measured in terms of number of people multiplied by the physical quality of life; (5) Population size is demostatically controlled; (6) Zero population growth (ZPG) is the NORM for every population; (7) ZPG can be exciting; (8) Without the control of immigration, no country can succeed in controlling its population size; (9) One of the most reliable things in the world is human unreliability; (10) So long as demand increases exponentially, solving a material shortage is impossible; (11) Every “shortage” of supply is equally a “longage” of demand; (12) Every complex function is subject to spontaneous decay and loss of the sort that physicists call “entropy.” (pp. 308-310)

Natural Capitalism – Creating the Next Industrial Revolution

By Paul Hawken, Amory Lovins and L. Hunter Lovins
Little, Brown, 1999

A brilliant, hopeful book demonstrating that capitalism can become sustainable through the use of markets as short-term tools rather than long-term plans, business adoption of long-term thinking that enhances profitability, and community development models that nurture prosperity within ecological limits. Full of company examples and fundamental concepts such as lean management, whole-system engineering, full-cost accounting, and promising advanced technologies.

Excerpt:

“Humankind has inherited a 3.8 billion year store of natural capital. At present rates of use and degradation, there will be little left by the end of the 21st century. This is not only a matter of aesthetics and morality, it is of the utmost practical concern to society and all people. Despite reams of press about the state of the environment and rafts of laws attempting to prevent further loss, the stock of natural capital is plummeting and the vital life-giving services that flow from it are critical to our prosperity.

Natural capitalism recognizes the critical interdependency between the production and use of human-made capital and the maintenance and

supply of natural capital. The traditional definition of capital is accumulated wealth in the form of investments, factories, and equipment.

Actually, an economy needs four types of capital to function properly: (1) human capital, in the form of labor and intelligence, culture and organization; (2) financial capital, consisting of cash, investments, and monetary instruments; (3) manufactured capital, including infrastructure, machines, tools and factories; and (4) natural capital, made up of resource, living systems, and ecosystem services.” (pp. 3-4)

Profit Beyond Measure – Extraordinary Results Through Attention to Work and People

H. Thomas Johnson (Professor of Quality Management, Portland State University) and Anders Broms (Managing Partner, SAM Samarbetande Konsulter AB (Swedish consultancy))
The Free Press, 2000

A synthesis of the success stories behind the amazing profitability of Toyota (40 continuous years without losses) and Scania, a Swedish truck maker that is, like Toyota, the most profitable company in the industry, with principles for organizing a company and its value-chains with respect to natural systems – specifically self-organizing leadership and “management by means” rather than ends. Johnson is a rare combination of a hard-nosed business consultant and cost accounting professor who understands sustainability and natural systems.

Excerpt:

“Thinking mechanistically, oblivious to the principles underlying the evolution of all matter in the universe, today’s business and economic leaders have devised systems that threaten mass extinction. These leaders not only do not grasp and nurture the pattern underlying life, but they thwart it. This system inordinately pursues growth at the cost of the individual worker’s dignity, distress in the company and the community, and the health of the ecosystem.

Currently managers responsible for bulldozing everything on the pathway to achieve shareholder wealth are the strongest proponents of Management By Results. Their results-oriented style of management prompts them to “take control” for the sake of growth, expansion, and accumulation. Those who manage by results, oblivious to nature’s patterns, impose human objectives on nature’s system. In so doing, they violate nature’s fundamental principles of self-organization, interdependence, and diversity.

Business and national leaders would do well to conduct economic affairs according to the three principles that guide the operation of natural living systems. Pursuit of nature's principle of self-organization, coupled with adherence to nature's principle of interdependence, will lead to businesses that nurture relationships. When the human creative impulse focuses on relationships, humankind will reinforce nature's principle of diversity. The flowering of diversity sustains all life in the universe. Business leaders who cultivate diversity maintain nature's delicate balance between creation and absorption." (pp. 208-210)

Something New Under the Sun: An Environmental History of the Twentieth Century World

J.R. McNeill (Professor of History, Georgetown University)
W.W. Norton & Sons, 2000

Historic perspective of how humanity dealt with environmental challenges during the "first industrial revolution". This book is a fascinating survey of challenges and solutions with global breadth (but not too much depth) that illustrates important trends, such as our inability to act in a timely fashion to correct problems that take decades to recover from.

Excerpt:

"It is impossible to know whether humankind has entered a genuine ecological crisis. It is clear enough that our current ways are ecologically unsustainable, but we cannot know for how long we may yet sustain them, or what might happen if we do. In any case, human history since the dawn of agriculture is replete with unsustainable societies, some of which vanished but many of which changed their ways and survived. They changed not to sustainability but to a new and different kind of unsustainability.

Perhaps we can, as it were, pile one unsustainable regime upon another indefinitely, making adjustments large and small but avoiding collapse, as China did during its "3,000 years of unsustainable development." Imperial China, for all its apparent conservatism, was more rat than shark, adopting new food crops, new technologies, shifting its trade relations with its neighbors, constantly adapting – and surviving several crises. However, unsustainable society on the global scale may be another matter entirely, and what China did for millennia the whole world perhaps cannot do for long. If so, then collapse looms, as prophets of the ecological apocalypse so often warn.

Perhaps the transition from our current unsustainable regime to another would be horribly wrenching and a fate to be avoided – or at least delayed – at all costs, as beneficiaries of the status quo so regularly claim. We

cannot know for sure, and by the time we do know, it will be far too late to do much about it.” (Epilogue)

The Age of Access – How the Shift from Ownership to Access is Transforming Modern Life

Jeremy Rifkin (President of the Foundation on Economic Trends)
Penguin Books, 2000

Rifkin makes a habit of identifying trends, overt or subtle, and calling out their systemic effects. Sometimes seen as an alarmist (he’s been a big thorn in the side of the biotechnology industry for the past decade) he nevertheless has consistently provided thoughtful challenges to norms and “the new big thing” that can’t be ignored. Property ownership is a foundation of capitalism and society, and since sustainability techniques include shifting from ownership to service leasing that continue to leave the ownership with the supplier of the product/service, the downside of this trend needs to be understood as well.

Excerpt:

“The role of property is changing radically. The implications for society are enormous and far-reaching. For the whole of the Modern Age, property and markets have been synonymous. Indeed, the capitalist economy is founded on the very idea of exchanging property in markets. The marketplace is a pervasive force in our lives. We all are deeply affected by its moods and swings. Now the foundation of modern life is beginning to disintegrate. The institution which once drove men to ideological battles, revolutions, and wars is slowly dying out in the wake of a new constellation of economic realities that is moving society to rethink the kinds of bonds and boundaries that will define human relations in the coming century.

In the new era, markets are making way for networks, and ownership is being replaced by access. This doesn’t mean property disappears in the coming Age of Access. Quite the contrary. Property continues to exist but is far less likely to be exchanged in markets. Instead, suppliers hold on to property in the new economy and lease, rent, or charge an admission fee...the exchange of property between buyers and sellers – the most important feature of the modern market system – gives way to short-term access between servers and clients operating in a network relationship.”
(pp. 3-5)

The Divine Right of Capital – Dethroning the Corporate Aristocracy

Marjorie Kelly (former Editor and Founder, Business Ethics magazine)
Berrett Koehler Publishers, Inc., 2003

Kelly writes that while politics are basically democratized, we are still functionally feudal in our wealth systems since capital providers drive management of wealth far more than they deserve. She boldly calls for a revolution to shift management of corporate assets to reflect its true stakeholders, including employees and the environment, rather than excessively maximize returns to the speculators who are owners of modern corporations.

Excerpt:

“What do stockholders contribute, to justify the extraordinary allegiance they receive? Very little. Yet this tiny contribution allows them essentially to install a pipeline and dictate that the corporation’s sole purpose is to funnel wealth into it. The productive risk in building businesses is borne by entrepreneurs and their initial venture investors, who do contribute real investing dollars, to create real wealth. Those who buy stock at sixth or seventh hand, or one-thousandth hand, also take a risk – but it is a risk speculators take among themselves trying to outwit one another, like gamblers. It has little to do with corporations, except this: public companies are required to provide new chips for the gaming table, into infinity.

It’s odd. And it’s connected to a second oddity – that we believe stockholders are the corporation. When we say that a corporation did well, we mean that its shareholders did well. The company’s local community might be devastated by plant closings. Employees might be shouldering a crushing workload. Still we will say, “The corporation did well.” One does not see rising employee income as a measure of corporate success. Indeed, gains to employees are losses to the corporation. And this betrays an unconscious bias: that employees are not really part of the corporation. They have no claim on wealth they create, no say in governance, and no vote for the board of directors. They’re not citizens of corporate society, but subjects.

It is true that throughout history capitalism has been a system that has largely served the interests of capital. But then, government until the early twentieth century largely served the interests of kings. It wasn’t necessary to throw out government in order to do away with monarchy – instead we changed the basis of sovereignty on which government rested. We might do the same with the corporation, asserting that employees and the community rightfully share economic sovereignty with capital owners.” (pp. 3-4).

The Ecology of Commerce – A Declaration of Sustainability

Paul Hawken (author, businessperson)

Harper Business, 1993

This book effectively launched the concept that business must pursue sustainability for the planet, not only because it is responsible for much of the unsustainable production levels and techniques being used, but also because it has the power and know-how to deliver solutions. Now used more in business schools than when published a decade ago, it remains essential reading for inspiration, perspective, and a proper understanding of the role of business v. governments.

Excerpt:

“A business is similar to an organism insofar as it takes food and energy from the environment. However, creatures in their natural habitat consume only renewable resources: leaves, nuts, seeds, grass, water, berries, insects, fungi, bark, fish. Companies consume renewables, too, in addition to nonrenewable resources, including oil, coal, and natural gas. While use of renewables can theoretically be sustained perpetually, resources such as fuels and minerals are irreplaceable. And renewables, if over-consumed or depleted, can become nonrenewable.

The ability to over-exploit the earth’s stored-up supply of resources is what we call economic progress. One statistic makes clear the demand placed on the earth by our economic system: every day the worldwide economy burns an amount of energy the planet required 10,000 days to create. Or put another way, 27 years worth of stored solar energy is burned and released by utilities, cars, houses, factories, and farms every 24 hours.

Another measure of our wholesale plunder of the ecosystem is provided by estimating the net primary production (NPP) of the planet, defined as the sum of all photosynthetic production minus the energy required to maintain and support those plants. The annual figure arrived at is the area of 225 billion metric tons of wood, grass, fiber and food. Of this total, 60 percent is produced on land and 40 percent in the oceans. An oft-quoted study suggests that our human economy currently utilizes, consumers, converts, burns or clear cuts annually 40% of the total net primary production on land. In short, one species – our own – out of 5 to 30 million species is directly and indirectly claiming 40 percent of the earth’s production for itself.” (pp. 21-22)

The Long Emergency – Surviving the Converging Catastrophes of the Twenty-First Century

James Howard Kunstler (urban development author)
Atlantic Monthly Press, 2005

Kunstler, a long-time eloquent critic of suburbs, makes a strong case that the entire US economy is so dependent on cheap fossil fuels, which are a thing of the past (peak oil production combined with rising global demand), that the US will suffer a “long emergency” in coming decades of being grossly and sadly uneconomic – especially the suburbs. He cogently explores all the alternatives to cheap fossil fuels and finds them unlikely to be very good substitutes. An edgy book that is both fun to read because of Kunstler’s skill as a thinker and writer, and provocative in its call for action.

Excerpt:

“Based on everything we know right now, no combination of so-called alternative fuels or energy procedures will allow us to maintain daily life in the US the way we have been accustomed to running it under the regime of oil. No combination of alternative fuels will even permit us to operate a substantial fraction of the system we currently run – in everything from food production and manufacturing to electric power generation, to skyscraper cities, to the ordinary business of running a household by making multiple car trips per day. We are in trouble.

The belief that “market economics” will automatically deliver a replacement for fossil fuels is a type of magical thinking like that of the cargo cults of the South Pacific (In the eighteenth century, Europeans first appeared in that part of the world, bringing all sorts of wondrous cargo with them in awesome great sailing ships – telescopes, cannons, felt hats, pocketknives, metal cookpots, you name it – and astounding the natives. When the Europeans sailed away, as they did periodically for long periods of time, the islanders would build effigies of the ships out of whatever plant materials they had at hand in an attempt to lure back the great ships.

This age-old tendency of humans to believe in magical deliverance and to wish for happy outcomes has been aggravated by the very technological triumphs that the oil age brought into existence. A hopeful public, including leaders in business and politics, views the growing problem of oil depletion as a very straightforward engineering problem that is exactly the kind of technology and human ingenuity have so successfully solved before, and therefore it seems reasonable to assume that the combination will prevail again. There are, however, several defects in this belief.” (p. 100)

The Mystery of Capital – Why Capitalism Triumphs in the West and Fails Everywhere Else

Hernando DeSoto (Peruvian economist and founder, Institute of Liberty and Democracy, Peru)

Bantam Press, 2000

As compellingly told in *The Commanding Heights* by Daniel Yergin, governments have often over-regulated businesses in order to insure they operate for the common good...sometimes resulting in backlashes that dismantle regulations. DeSoto articulates over-regulation of businesses (especially small businesses) throughout the developing world, which drives business underground into black markets and eliminates the ability of business owners to accumulate legal capital, and offers solutions based on his own experiences legalizing black market businesses in Peru that benefited both the businesses and the governments (the businesses didn't pay more in taxes than they were paying in bribes to avoid being caught). Drives home the importance of balanced regulation and solid property laws in capitalism.

Excerpt:

“Capitalism stands alone as the only feasible way rationally to organize a modern economy...but the marketplace extolled by the West has been supplanted by the cruelty of markets, wariness towards capitalism and dangers of instability. There is growing concern among West businesspeople that failure of most of the rest of the world to implement capitalism will drive rich economies into recession. ... The alarms prompt West leaders to repeat the same wearisome lectures: stabilize currencies, hang tough, ignore food riots, and wait for foreign investors. “When these remedies fail, Westerners all too often respond not by questioning the adequacy of the remedies but by blaming Third World peoples for lack of entrepreneurial spirit or market orientation.

But the cities of the third world are teeming with entrepreneurs. So “Why does capitalism only thrive in the West, as if enclosed in a bell jar? The major stumbling block is the rest of the world's inability to produce capital. Yet most of the poor of the Third World already possess the assets they need to make a success of capitalism, but they hold these resources in defective forms: houses built on land whose ownership rights are not adequately recorded, unincorporated businesses with undefined liability, industries located where financiers and investors cannot see them...assets that cannot be readily turned into capital, cannot be traded outside of narrow local circles where people know and trust each other, cannot be used for collateral for a loan and cannot be used as a share against an investment.” (pp. 1-5)

The Natural Step for Business – Wealth, Ecology and the Evolutionary Corporation

Brian Nattrass and Mary Altomare (Natural Step / sustainability consultants)

New Society Publishers, 1999.

The Natural Step is a leading global framework for sustainability developed by Karl-Henrik Robèrt (see his book *state title in italics*). Nattrass and Altomare looked at how different businesses approached sustainability and use of The Natural Step System Conditions and produced this seminal book describing corporate experiences and best practices.

Excerpt:

“In the course of research, we traveled to over 50 different industrial and commercial sites and spoke to hundreds of people across North America and Europe. From this research, we have drawn nine key lessons set out below and expanded upon in greater detail. Although some of these insights seem very basic, it is surprising how few managers seem to understand them at a visceral level:

(1) Moving a corporation toward sustainability means change, often fundamental change, in the corporation’s culture;

(2) Leadership is the cornerstone of any major change initiative;

(3) Conscious organizational learning is fundamental for success in making change;

(4) The vision of sustainability for the company should be well articulated and aligned with the visions and values of individuals within the company;

(5) A common knowledge base about sustainability throughout the corporation accelerates involvement and innovation;

(6) Feedback at every level of the process reinforces learning and involvement and helps move ideas into action;

(7) From a whole-systems perspective, the company views itself as part of a larger system of relationships of influence that includes shareholders, employees, suppliers, customers, competitors, communities and other stakeholders;

(8) The move toward sustainability is an evolutionary shift;

(9) The Natural Step framework is not an end in itself – it is a means to move humankind toward a sustainable society in balance with the rest of the natural world.” (pp. 149-151)

The Natural Step Story – Seeding a Quiet Revolution

Karl-Henrik Robèrt (Swedish pediatrician; The Natural Step founder and consultant)

New Society Publishers, 2002

The personal story of Dr. Robèrt’s personal journey from cancer researcher to world renowned sustainability advocate and founder of a global organization dedicated to helping companies merge prosperity with deep sustainability goals. Includes stories of working with companies and

cogent explanations of The Natural Step system conditions, a set of ratios defining sustainability within limitations of ecological carrying capacity.

Excerpt: (Note: This excerpt regards why he created The Natural Step System Conditions for Sustainability)

“What would an economic system look like that could stimulate our economy in the direction of sustainability? All the systems I knew of existed according to certain conditions that placed physical limits on their potential growth. Physically, growth could exist only during a transitional period as when, for example, you build the frame of a house to fit the size of your lot and income, or when a body grows. Thereafter, growth must be transformed into development – the house frame stops growing, evolves, and eventually turns into a home; the child stops growing and becomes mature.

In integrated systems of high-level performance, continued physical growth becomes counterproductive to development. For this reason, sustainable systems have built-in mechanisms to slow down and eventually arrest growth in a controlled way. If this “smart” mechanism is not present in growing systems, then, as with bacteria multiplying in a laboratory testing dish, the only outcome beyond a certain point of exponential growth is sudden death and extinction (the bacteria don’t die from starvation but from their own toxins).

Business seemed to be the overall driver of the problems at hand. Businesses polluted, and we polluted when we used their products. Business corporations were attacked, and they defended themselves, and neither seemed particularly difficult. Since there was no structured systems perspective in the debate, the octopus technique always worked: anybody could hide in a cloud of fragmented facts. The problem was that the heart of business was not into sustainability yet, in spite of the growing demands of the market.” (pp. 10-12)

The Nature of Order – An Essay on the Art of Building and The Nature of the Universe

Christopher Alexander (architect)
Oxford University Press, 2001 (first in series of four)

Alexander helped revolutionize architecture with *The Pattern Language* in 1979; this is the first of a four volume set to be fully published in 2003 articulating principles that underlie design in harmony with nature; it is essentially a compendium of insights from the lifework of an amazing mathematician/designer/scientist who seeks the truth and isn’t afraid to take on an entire profession (architecture) for building ugly stuff.

Excerpt:

“In the 20th century, we have had the illusion that all the order we see around us in the world can be explained by science – mainly, we assume, by physics. But physics and the other sciences tend to represent certain things for us as mechanisms. This gives us a partial picture of some kinds of order. That is all. We may take, for instance, the structure of a leaf, the structure of a bridge, the structure of an atomic nucleus. In each of these cases we have a well-worked-out conception of the mechanical order which is there.

(But) the order is always described – and even invented – in relation to the way the thing works as a mechanism. So in the present scientific world-picture, the order which we see in the thing, the way we describe it to ourselves, is essentially the order of a machine which has a certain mechanical mode of operation – of which, at any rate, has a certain kind of mechanical behavior as a result of the arrangement of its parts. But what of the order itself? The order itself – that order which exists in a leaf, in the Ise shrine, in the yellow tower, or in a Mozart symphony, or in a beautiful tea bowl – a harmonious coherence which fills us and touches us – this order cannot be represented as a mechanism. Yet it is this harmony, this aspect of order, which impresses us and moves us when we see it in the world.” (p. 15)

The Seven Cultures of Capitalism – Value Systems for Creating Wealth in the U.S., Japan, Germany, France, Britain, Sweden, and the Netherlands

Charles Hampden-Turner (European management professor and consultant) and Alfons Trompenaars (Managing Director of Center for International Business Studies, Netherlands)
Doubleday, 1993

How a nation, a culture, or a specific business deals with the rules and opportunities of capitalism concerns its values, and sustainability is all about long-term values being manifested in whole-systems from business accounting to cultural norms. This entertaining (i.e., glib) look at how cultures interact with the conduct of capitalism is based on global surveys conducted by the authors of business managers, revealing the differences generated by cultures worldwide and helping explain global competitiveness, or not. Frequently referred to in business literature as a landmark work.

Excerpt:

“Because of their current and historical economic success, seven nations have much to teach us about the best practices capitalism: the U.S., the

U.K., Sweden, France, Japan, the Netherlands, and Germany. All call themselves capitalist and free enterprise nations and subscribe generally to the same philosophy, but there the resemblance ends. When we look at the day-to-day details, the meaning found in work, the attitude towards stakeholders, the styles of managing employees, the various negotiation tactics, the differences are wide.

Something is out of kilter in the Anglo-American business community, which has for the past forty-five years been the world's chief advocate of capitalist ideology. We have believed our own propaganda, and this has prevented us from considering that our wealth creation systems could be vulnerable.

Economics has, from its inception, been an academic discipline, describing the creation of wealth after such creation has been accomplished by persons not employing the discipline. Entrepreneur-economists i.e. persons who actually use the discipline of economics to create value, are virtually unknown. Economics is so concerned with counting and itemizing that it has lost sight of one component, almost unmeasurable, that makes all economic activity possible: human relationships.

So, far from regarding enterprises and their products as being, as Economics tell us, mere accretions of resources, it would be truer to say that an enterprise is the fine-tuning and harmonizing of values often in tension with one another, the reconciliation of the dilemmas caused by conflicting values." (pp 5-7)

The Sustainability Advantage – Seven Business Case Benefits of a Triple Bottom Line

The Next Sustainability Wave – Building Boardroom Buy-in

Bob Willard (sustainability consultant; former senior manager at IBM, Canada)

New Society Publishers, 2002 (Sustainability Advantage) and 2005 (Sustainability Wave)

Willard draws heavily from Natural Capitalism and other studies of business competitiveness (e.g., surveys by major management consulting firms) to assemble perhaps the most down-to-earth, cogent descriptions of the business case for sustainability strategies yet published. He translates his findings into spreadsheets that an individual business can quickly use to estimate its own opportunities. Many of the benefits reflect the productivity of personnel who stay with and perform extraordinarily for a firm that reflects their own personal values.

Excerpt: (*Sustainability Advantage*)

“Today’s companies are squandering bottom line benefits that could easily be achieved by adapting sustainable development strategies. The business benefits are quantifiable and real – the return on investment from aggressively improving company-wide sustainable development knowledge and initiatives can make other traditional investment opportunities seem trivial. Whichever company captures these benefits soonest will have a significant competitive edge.

Sustainable development gives companies a sustainable advantage. It is a race to the top. Addressing environmental and sustainability issues in a systematic way provides new opportunities to focus on core business objectives such as reducing hiring and retention costs, improving productivity, reducing expenses at manufacturing and commercial sites, increasing revenue and market share, reducing risk, increasing shareholder value, and increasing profit.” (p. 3)

State of the World 200x and Vital Signs 200x (annual series)

Worldwatch Institute

Each year, Worldwatch produces two important books: *State of the World*, and *Vital Signs*. The first is a series of highly documented interpretive essays on the most important trends in global sustainability; the *Vital Signs* books are reporting on 36 key indicators of the planet’s health. Both are highly valuable for their informed perspective, and data.

Excerpt: From *Vital Signs 2003: Bicycle Production Seesaws*

“Global production of bicycles fell by some 7 percent in 2001, to 97 million units, as the production oscillations of the 1990s continued into the new century. And although production data are not yet available for 2002, preliminary indications suggest that the industry’s sluggish performance continued.

The sluggish bicycle market stands in contrast to scattered local interest in promoting more diverse urban transportation systems, including an expanded role for bicycles. The disadvantages of car-centered transportation including air pollution, sprawl, and congestion, have prompted many cities to rethink their transportation priorities. Programs that restrict the use of private cars for a day are on the rise; some 2,000-3,000 “car-free days” of varying levels of comprehensiveness have been held in the last ten years.

The residents of Bogota, Columbia, voted overwhelmingly to make that city's February 2000 car-free day experiment an annual event, and in 2002 eight other Columbian cities restricted car use for a day. Such initiatives help citizens imagine a transportation system with options other than cars."