



# Eco-Link

Linking Social, Economic, and Ecological Issues

## Embracing Change Lessons from Nature

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**Change is inevitable, necessary, and even desirable.** In *Leadership and the New Science*, Margaret J. Wheatley says, "Equilibrium is neither the goal nor the fate of living systems, simply because as open systems they are partners with their environment. To stay viable, open systems maintain a state of non-equilibrium so they can change and grow. They participate in an active exchange with their world, using what is there for their renewal. Every organism in nature, including us, behaves in this way."

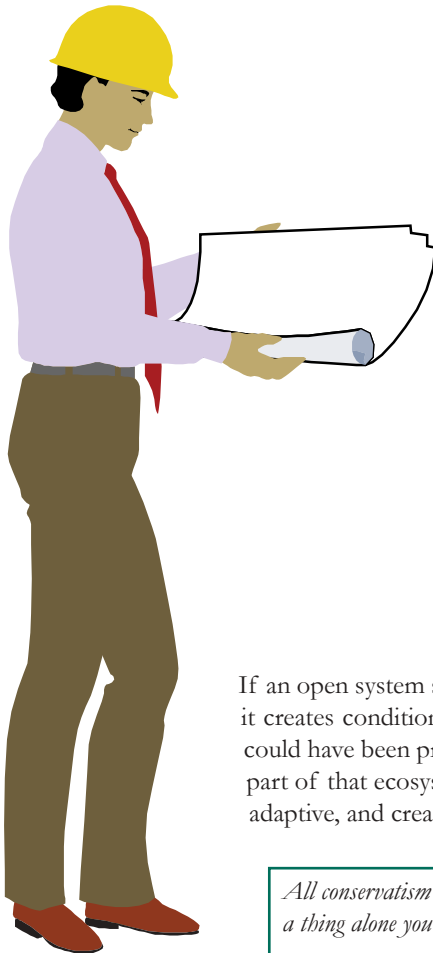


Photo of plant regrowth in Yellowstone National Park after the 1988 fires.  
NPS Photo [<http://www.nps.gov/yell/slidefile/fire/index.htm>]

If an open system seeks to establish equilibrium through constraints on creativity and local changes (disturbances) it creates conditions that threaten its survival. All we have to do is look at Yellowstone's catastrophic fire. That could have been prevented by allowing many smaller disturbances including thinning and controlled burns. Fire is part of that ecosystem. Stasis, balance, and equilibrium are temporary states. What endures is process...dynamic, adaptive, and creative. Whether it's a forest ecosystem or your business, the same principles apply.

*All conservatism is based on the idea that if you leave things alone you leave them as they are. But you do not. If you leave a thing alone you leave it to a torrent of change.*

G.K. Chesterton

## Organizational Change

**Change is a constant.** It's said that the only one who likes change is a baby with a wet diaper. However, change is a constant in our lives. Just like nature, organizations undergo constant change. Resisting, or failing to anticipate, change will lead to catastrophic events. When Smith Corona went out of business they still made the world's best typewriters, but computers made them obsolete. It isn't enough to have excellent products and services, and it isn't even enough to have innovative products and services. They have to be in the right place at the right time and with the right price. The Swiss enjoyed 80% of the world's watch business when watches were made from springs, gears, and bearings. However, the digital quartz watch changed all that. The Swiss watch industry lost 60,000 jobs, literally overnight, when Seiko and Texas Instruments introduced the digital quartz watch to the market. Guess who invented that watch? The Swiss of course! They put it in a trade show as a novelty, failing to recognize their own invention as the new paradigm. With all change there are winners and losers. Some resist change because it threatens the existing paradigm from which they benefit. Others embrace change as an opportunity to grow and prosper. In business, the longer one resists change, the bigger the risk of being caught in a paradigm shift where everyone goes back to zero.



Photo from US Forest Service Image Database, G. E. Griffith  
Mt. Hood National Forest, Oregon

VS



Photo from Temperate Forest Foundation  
2003 Lake States Teachers' Tour, Michigan

**The rate of change is accelerating.** Some studies say that the world's knowledge base is now doubling every six years. There is a lot to know. As individuals and organizations we may not have the luxury of slow incremental change. In his book *Deep Change: Discovering the Leader Within*, Robert E. Quinn says, "We have always had to choose between making deep change or accepting slow death, but today the dilemma is more blatant. As soon as we find meaning and equilibrium, it is distorted." Quinn says deep change is different from incremental change in that it requires new ways of thinking and behaving. However, organization and change are not complimentary concepts. Leaders are able to bring deep change to an organization by articulating a vision and strategy, and then mobilizing people to follow them from an old paradigm to a new paradigm. Managers can operate extremely well within existing paradigms but it takes a leader to get people to go where they would never go on their own.



**The keys to the future are excellence, innovation, and anticipation.** Leaders anticipate change and position their organizations to create and capitalize on change. In business as in nature, everything is connected and everything is changing. Understanding these dynamics helps leaders achieve desired outcomes. Fortunately we humans have a unique ability to visualize the future. We can picture what we want to do, be, and have. We can try different strategies out in our head. We need vision like flowers need rain. It's what motivates us to move forward and to change. True leaders are able to visualize where they want to take their organizations and then play "what if" games on how to get there. Our current realities tend to pull us down or keep us frozen in space and time, but our vision pulls us up. We are able to visualize and anticipate the future. The mind can scarcely tell the difference between something vividly imagined and the "real" thing. All leaders can articulate a vision and a strategy. The vision must be: positive, inspiring, and shared.

*Vision without action is just a dream. Action without vision just marks time. Vision with action can change the world.*

Joel A. Barker, *The Power of Vision*

## Personal Change

A key to successful leadership is continuous personal change. Empowered leaders are the only ones who can induce real change in an organization. By themselves having the courage to change, they model the behavior they are asking of others. Personal change is a reflection of inner growth and empowerment. Leaders make sure the needs of the organization and the demands of the environment are in alignment.

Deep Change



Organization

Deep Change



Leader

Constant External Change



Environment

<<-----Dynamic Alignment----->>

Successful living is also a result of deep personal change. The alternative to deep personal change (rebirth, reinvention) is slow death. When we are growing personally, we have a sense of meaning and impact. We are full of energy and radiate a successful demeanor. To have such feelings in a constantly changing world, we must continually realign ourselves with our environment.

*Self-reference is what facilitates change in turbulent environments. In human organizations, a clear sense of identity—the values, traditions, aspirations, competencies, and culture that guide the operation are the real source of independence from the environment. When the environment demands a new response, there is a reference point for change.*

Margaret J. Wheatley

### New Ways of Thinking

**Think Systems.** Open systems use disequilibrium to avoid deterioration. Systems are capable of exchanging energy, taking in free energy to replace the entropy that had been produced. If a system has the capacity to react, then change is not necessarily a fearsome opponent. It's a paradox, but order and chaos go together. If we can think about dynamic self organizing systems, we can get in tune with the discordant harmonies of nature. Everything is connected and everything is changing.

**Think Core Competencies.** One of the best ways for a company to cope with change is to organize itself around core competencies. This can lead to a great combination of well-defined boundaries and openness. A business that focuses on core competencies identifies itself as a portfolio of skills rather than business units. It can respond quickly to new opportunities. Such an organization can be sensitive to its environment and yet resilient from it. In the assessment of Prahalad and Hamal, companies focused on core competencies are able to “invent new markets, quickly enter emerging markets, and dramatically shift patterns of customer choice in established markets.”

### It Couldn't Be Done

*Somebody Said that it couldn't be done,  
But he with a chuckle replied  
That "maybe it couldn't," but he would be one  
Who wouldn't say so till he'd tried.  
So he buckled right in with the trace of a grin  
On his face. If he worried he hid it.  
He started to sing as he tackled the thing  
That couldn't be done, and he did it.*

*Somebody scoffed: "Oh, you'll never do that;  
At least no one ever has done it";  
But he took off his coat and he took off his hat,  
And the first thing we knew he'd begun it.  
With a lift of his chin and a bit of a grin,  
Without any doubting or quiddit  
He started to sing and he tackled the thing  
That couldn't be done, and he did it.*

*There are thousands to tell you it cannot be done,  
There are thousands to prophesy failure;  
There are thousands to point out to you, one by one,  
The dangers that wait to assail you.  
But you buckle in with a bit of a grin,  
Just take off your coat and go to it;  
Just start to sing as you tackle the thing  
That "cannot be done," and you'll do it.*

Edgar A. Guest, 1934

## Terms

### Creative Tension

The natural tension created by the tug of war between our current reality and our vision of the future. Our vision pulls us up, and our current reality pulls us down. People who learn how to work with creative tension use the energy it generates to move more reliably towards their goals.

### Entropy

A measure of disorder in terms of the amount of unavailable energy in a closed thermodynamic system. Energy may be transformed from one form (e.g. light) to another (e.g. food) but is never created or destroyed. To survive and prosper, natural and human-made ecosystems alike require a continuous input of high-quality energy, storage capacity (for periods when input is less than needed, and the means to dissipate entropy.

### Energy

The driving force of ecosystems. The physiology, anatomy, stature, abundance, behavior, distribution, and ecological role of individual organisms are largely determined by the manner in which they satisfy their energy requirements. Life is a complex physical-chemical organization that has evolved to become self-perpetuating. Everything about life is associated with energy.

### Evolution

(From the Latin, *evolutio*: unrolling) is widely used for temporal change—change with time—usually with the connotation that the change is for the better (lower to higher, or from a simpler to a more complex state, for example). Thus, we may speak of the evolution of one's personality or the evolution of the automobile or airplane

### Guiding Principles

The "core values" that ensure the rightness of your direction. While only a vision can give you direction, values ensure that you are on the right path.

### Legacy

How do you want to be remembered and how will your organization be remembered? Writing your own legacy is an excellent way to come up with a vision statement.

### Logotherapy

*Logos* is a Greek word that denotes "meaning." According to logotherapy, striving to find meaning is the primary motivational force in man.

### Mutualism

To survive an organism does not compete with its environment as it might with another organism but must adapt to, or modify, its environment and its community in a cooperative manner.

### Options

The different alternatives available for action. All options have strengths, weaknesses, risks, and trade-offs. Informed decisions are made by understanding the options and then choosing the best one.

### Paradigm

A Greek word for a *model* or a set of rules and regulations necessary for success. We have paradigms for everything.

### Paradigm Effect

As people filter information through their existing paradigms they often fail to recognize new and better models.

### Paradigm Paralysis

A terminal disease of certainty

### Paradigm Shift

What happens when a new model comes along, rendering the old model obsolete. In every shift there are winners and losers.

### Punctuated Equilibrium

A theory of evolution where change happens in great bursts rather than gradual evolutionary change.

### Strategic Planning

Long range planning, which allows an individual or organization to exercise control over the future. Without an overall strategy, short term tactics are often misguided.

### Vision Statement

An explicit statement of what you want to do, be, or have in the future. It must be positive and detailed enough for people to form a mental picture. It must be inspiring, challenging, and worth the effort.

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*Comfort is not the objective of a visionary company. Indeed, visionary companies install powerful mechanisms to create discomfort-to obliterate complacency-and thereby stimulate change and improvement before the external world demands it.*

James Collins and Jerry Porras: Built to Last



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