Added to volume on 3 January 2013

COMPASSION VS RESOURCE SCARCITY

Truth crushed to earth will rise again. William Cullen Bryant
as quoted by The Reverend Martin Luther King, Jr.

By showing hunger, deprivation, starvation and brutality, as well as endurance and nobility, documentaries inform, prod our memoires, even stir us to action. Such films do battle for our very soul.
Theodore Bikel

. . . the planet is robust, economic freedom is fragile.
Fred Smith, Competitive Enterprise Institute
(as quoted by Carl Pope 2012)

Conservation can no longer conserve, because any conservative who tried would not be funded.
John Grey, British Traditionalist
(as quoted by Carl Pope 2012)

If global warming is a serious problem requiring effective action, its solutions are governmental, global and majoritarian — and conservation exists to oppose those outcomes.
Jerry Taylor, the Cato Institute
(as quoted by Carl Pope 2012)

Compassion is easily expressed for an individual who is starving that one has been in contact with for a short time. One can also be persuaded by news stories, television or even books to become involved in situations of the disadvantaged. However, compassion is less easily fueled for posterity (i.e., individuals not yet born), even though intergenerational ethics requires humanity do so. Leaving a habitable planet for future generations will require great sacrifice in an era of dwindling resources per capita. Unfortunately, convincing people in developed and developing countries will not be easy, even though the beneficiaries will be their own descendants. The above quotes are selected from two, now opposed, viewpoints.

"*The German Advisory Council on Global Change (WBGU) . . . had advised against subsidizing biofuels in developed countries, since this could not be justified from the point of view of sustainability*'" (Press Release 2012). "*World grain prices have risen so high that families in poorer countries are being forced to schedule 'food-free days' each week, according to one of the leading experts on global agriculture*" (McCarthy 2012).

Ethical issues must be considered when humanity converts food (e.g., corn) into automotive fuel (e.g., ethanol) (Cairns 2007). Basically, biofuels involve transforming the sun's energy into living material that can be converted into alcohol. If corn is the material used, approximately 1,000 tons of water are needed to produce a ton of grain. Arable land must be used to produce the corn, and much energy is used for cultivating and harvesting the corn. Energy is then expended, converting part of the plant into ethanol.

Why not collect the sun's energy directly with solar panels? Why not use the government subsidy for ethanol production to encourage the production of solar panels? Some solar panel production plants have failed in the United States, even with government subsidies. However, production and use of solar panels has flourished in other nations, so the basic concept is sound.

However, the basic dilemma is an ethical/moral lack of compassion for the very poor. "In a world hungry for biofuels, food security must come first. . . . US ethanol policies have increased the food bills of poor food-importing countries by more than $9 bh [US$] since 2006. . . . With or without biofuels, many regions are, and will remain, highly reliant on imports to feed their citizens" (de Schutter 2012).

The basic ethical/moral question centers on which should have the highest priority: food security or energy security? "*. . . a new planetary boundary, terrestrial net primary (plant) production (NPP), that may be as compelling conceptually, integrates many of the currently defined variables* [as proposed by Rockstrom et al. 2009], *and is supported by an existing global data set for defining variables*" (Running 2012). Compassion for the 30+ million species with which *Homo sapiens* shares the planet requires a deep respect for planetary boundaries. Compassion for the very poor of the human species requires serious attention to global food prices that are on the rise (Nixon 2012). Compassion for all planetary life forms requires that nuclear meltdowns be prevented. "The utility that owns the Fukushima nuclear power plant has admitted that it failed to take proper safety measures . . ." (Halper 2012).

Two major problems, both suppressing scientific information and delaying the transition to non-carbon energy sources, are the result of "A dearth of competition in major U.S. industries and a government with policy making that has been severely corrupted by moneyed interests have led to depressed wages and stifled innovation . . ." (Worthington 2012).

Compassion for both humans and other life forms often declines during crises (e.g., potable water), which is likely to increase substantially if the nine interactive crises (Cairns 2010, 2012) continue to worsen. For example, if positive feedback loops accelerate, especially of the greenhouse gases methane and carbon dioxide, they will markedly hasten climate change. Temperature changes in ". . . the Gulf Stream are rapidly destabilizing methane hydrate along a broad swathe of the North American margin'" (Phrampus and Hornbach 2012).

A perpetual global food crisis is a distinct possibility, especially in an era of extreme weather. "World grain reserves are so dangerously low that severe weather in the United States or other food-exporting countries could trigger a major hunger crisis next year, . . ." (Lacey 2012).

The global reduction in renewable resources per capita is already underway. During World War II, most countries rationed scarce resources, such as food and fuel, although most also had a "black market" for scarce resources as well as an unregulated barter system. In the era of perceived resource abundance and financial globalization, resources were moved rather freely about the planet, but now the reality of resource scarcity and resource export is being banned by some nations (such as the Ukraine) (Reuters 2012). The United States discourages food export bans (Moffett 2011); the Economic Union has condemned the Ukraine for banning wheat exports; and India is rethinking its frequent ban" on the export of food grains and other farm commodities (Sen 2012).

Obviously, poor, developing countries with a major dependence on imported food (e.g., Egypt) would be seriously affected by export bans on food and agricultural commodities. A major consideration is exponential human population growth congruent with food insecurity. An equally important consideration is protecting the integrity and health of the present Biosphere, which must not be threatened by short-term efforts to resolve the global food crisis. The long-term common good of humanity requires nurturing the present Biosphere. Compassion may suffer during long-term resource scarcity, but it should not disappear.

Acknowledgment. I am indebted to Darla Donald for transcribing the handwritten draft and for editorial assistance in preparation for publication and to Paul Ehrlich and Paul Kullberg for calling useful references to my attention.

LITERATURE CITED

Cairns, J., Jr. 2007. Corn for the starving or ethanol for fuel?: an ethical dilemma for members of the automobile culture. *Science and Society* 5(2):117-126.

Cairns, J., Jr. 2010. Threats to the biosphere: eight interactive global crises. *Journal of Cosmology* 8:1906-1915.

Cairns, Jr. 2012. The ninth threat to the biosphere: human thought processes. Supercourse Legacy Lecture: National Academy of Sciences Members' Lectures. http://www.pitt.edu/~super1/lecture/lec46811/index.htm.

De Shutter, O. 2012. In a world hungry for biofuels, food security must come first. The Guardian 17Oct http://www.guardian.co.uk/global-development/poverty-matters/2012/oct/17/world-hungry-biofuels-food-security.

Halper, M. 2012. Fukushima utility: we could have prevented nuclear meltdowns. Smart Planet 15Oct http://www.smartplanet.com/blog/bulletin/fukushima-utility-we-could-have-prevented-nuclear-meltdowns/2479.

Lacey, S. 2012. World grain reserves "at a very low level, leaving no-room" for extreme weather, UN warns. Think Progress 15Oct http://thinkprogress.org/climate/2012/10/15/1010821/october-15-news-world-grain-reserves-at-a-very-low-level-leaving-no-room-for-extreme-weather-warns-un/.

McCarthy, M. 2012. The year the grains failed: why poorer countries are scheduling "food free days." The Independent 11Oct http://www.independent.co.uk/life-style/food-and-drink/news/the-year-the-grains-failed-why-poorer-countries-are-scheduling-foodfree-days-8206042.html.

Moffett, S. 2011. U.S. to discourage food export plans. Wall Street Journal 22Jun http://online.wsj.com/article/SB10001424052702304657804576401702920220860.html.

Nixon, R. 2012. Global food prices on the rise. New York Times 4Oct http://www.nytimes.com/2012/10/05/world/global-food-prices-on-the-rise-united-nations-says.html?_r=0.

Phrampus, B. J. and M. J. Hornbach. 2012. Recent changes to the Gulf Stream causing widespread gas hydrate destabilization. *Nature* 490:527-530.

Pope, C. 2012. The great fear among American conservatives. Huffington Post 31Oct http://www.huffingtonpost.com/carl-pope/climate-change-republicans_b_2026169.html.

Press Release. 2012. The WBFU welcomes reversal of EU bioenergy policy. 1Oct http://www.wbgu.de/en/flagship-reports/fr-2008-bioenergy/.

Reuters. 2012. Update 4 — Ukraine confirms wheat export ban. 24Oct http://www.reuters.com/article/2012/10/24/ukraine-grain-wheat-idUSL5E8LO2SM20121024.

Rockstrom, J., W. Steffen, K. Noone, and 29 others. 2009. A safe operating space for humanity. *Nature* 461:472-475.

Running, S. W. 2012. A measurable planetary boundary for the biosphere. *Science* 337(6101):1458-1459.

Sen, A. 2012. India rethinks frequent ban on export of foodgrain, other farm commodities. The Economic Times 4Jul http://articles.economictimes.indiatimes.com/2012-07-04/news/32537290_1_export-ban-unrestricted-exports-abinash-verma.

Worthington, D. 2012. How corporations are crippling U.S. prosperity. Smart Planet 15Oct http://www.smartplanet.com/blog/bulletin/how-corporations-are-crippling-us-prosperity/2633.