

Green Mission News

September 2012 Green Mission News

External Article Links:

"Whenever the people are well-informed, they can be trusted with their own government."
- Thomas Jefferson



- The MyEnvironment search application is designed to provide a cross-section of environmental information based on the user's location.

<http://www.epa.gov/myenvironment/howUsePage.html>

- Florence Zero Waste Altermeeting: Reduce, Reuse, Recycle and REDESIGN

www.zerowasteurope.eu/2012/09/florence-zero-waste-altermeeting-reduce-reuse-recycle-and-redesign/

- New Markets Emerge for Carbon Dioxide

www.forbes.com/sites/pikeresearch/2012/09/14/new-markets-emerge-for-carbon-dioxide/

- Inspirations from Cradle to Cradle, the book (2008 Edition)

www.balance3.com.au/files/C2Cinspirations.pdf

- Connecting With Nature: An educational guide for grades four to six

www.davidsuzuki.org/what-you-can-do/downloads/CWN_TeachersGuide.pdf

- The Ecology of Hope: Reconnecting Children and Nature

livinggreenmag.com/2012/09/28/mother-nature/the-ecology-of-hope-reconnecting-children-and-nature/

- How Extended Producer Responsibility Can Boost Recycling Rates

www.triplepundit.com/2012/09/extended-producer-responsibility/

- Packaging for Organic and Natural Foods

Contemporary package designs displace brown paper and granola-esque graphics.

www.foodprocessing.com/.../packaging-for-organic-and-natural-foods.html

- Long term toxicity of a Roundup herbicide and a Roundup-tolerant genetically modified maize

research.sustainablefoodtrust.org/wp-content/uploads/2012/09/Final-Paper.pdf

- Study linking GM maize to cancer must be taken seriously by regulators

Trial suggesting a GM maize strain causes cancer has attracted a torrent of abuse, but it cannot be swept under the carpet

www.guardian.co.uk/environment/2012/sep/28/study-gm-maize-cancer

- Myths about industrial agriculture.

Organic farming is the "only way to produce food" without harming the planet and people's health. by Vandana Shiva

www.aljazeera.com/indepth/opinion/2012/09/2012998389284146.html

- Cargill and Others Behind anti-Organic "Stanford Study"

Anti-organic "study" is not news, rather, coordinated propaganda campaign.

landdestroyer.blogspot.com/2012/09/cargill-and-others-behind-anti-organic.html

- Michael Pollan Responds to Study Finding 'No Significant Health Benefit' to Organic

kqed.org/newsfix/2012/09/04/michael-pollan-organic-study/

- Fighting a global agribusiness through the power of film

by Marie-Monique Robin, Filmmaker

ajw.asahi.com/article/globe/economy/AJ201209230022

- The Hunger Grains

Time to scrap EU biofuels mandates and subsidies.

www.oxfam.org/en/grow/policy/hunger-grains

- California's Prop 37: Monsanto, GMO Labeling and the Public Interest

by Charlotte Silver

www.aljazeera.com/indepth/opinion/2012/09/20129257471016420.htm

Charlotte Silver is a journalist based in San Francisco and the West Bank, Palestine. She is a graduate of Stanford University.

- Media Advisory: Arctic sea ice breaks lowest extent on record

nsidc.org/news/press/20120827_2012extentbreaks2007record.html

- Sea ice reduction at tipping point (Brisbane Australia Times) 6 minute video

www.brisbanetimes.com.au/environment/climate-change/sea-ice-reduction-at-tipping-point-20120922-26dm6.html

- Arctic sea ice falls below 4 million square kilometers

nsidc.org/arcticseaicenews/

- Book Review: Peter Senge's "The Necessary Revolution"

www.sustainabilityconsulting.com/blog/2012/8/30/book-review-peter-senges-the-necessary-revolution.html

- Mounting Evidence of Bug-Resistant Corn Seen by EPA

<http://www.bloomberg.com/news/2012-09-04/-mounting-evidence-of-bug-resistant-corn-seen-by-epa.html>

- Behind the 'Green Economy': Profiting from environmental and climate crisis

GRAIN, Alianza Biodiversidad, WRM, ATALC | 11 September 2012

www.grain.org/article/entries/4571-behind-the-green-economy-profiting-from-environmental-and-climate-crisis

- GM crops may not resolve food crisis, scientists say Yes to Paradigm Shift.

articles.timesofindia.indiatimes.com/2012-09-24/science/34060804_1_gm-crops-aruna-rodrigues-gm-technology

Prof. Hans Herren, Co-Chair of IAASTD, the International Assessment of Agricultural Knowledge, Science and Technology for Development, who was awarded the World Food Prize in 1995, said, "What we really need is a shift in paradigm, where a holistic approach drives our interventions in agriculture without reductionist solutions hogging the center-stage and taking away precious resources."

- Sweet times for cows as gummy worms replace costly corn feed

www.reuters.com/article/2012/09/23/us-usa-cattle-candy-idUSBRE88M05N20120923

- Spotlight: The Farm Bill with Dan Imhoff

outervoices.org/wp/?p=624

- Nuclear power is the Betamax of the energy world

We need to stop being distracted by this technology and focus on promoting and investing in renewables

www.guardian.co.uk/environment/blog/2012/sep/28/nuclear-power-betamax-energy-world

- A New Economic Narrative: Five Pillars of the Third Industrial Revolution

eomega.org/learning-paths/sustainable-living-sustainability/a-new-economic-narrative?content=FEAT&source=OM.DBN

- South Invited to 'De-Grow'

www.ipsnews.net/2012/09/south-invited-to-de-grow/

- Whole Foods endorses Prop. 37

Los Angeles Times: The natural goods retailer is backing the proposition to require labeling of genetically engineered food ingredients. But changes it suggests cannot be made to the measure before the vote.

www.latimes.com/business/la-fi-whole-foods-endorse-20120915,0,2481280.story

Whole Foods Market: Going Cold Turkey Will Not Improve the Meat Industry

Posted on September 12, 2012 by [Michael Pettitt: Writer, OneGreenPlanet](#)

www.onegreenplanet.org/news/whole-foods-market-going-cold-turkey-will-not-improve-the-meat-industry/

Full Length Articles Below:

- We Eat by the Grace of Nature, Not by the Grace of Monsanto
- Food on global casino
- Farming Changes Can Limit Risks
- Food and Extreme Weather: It's the Soil, Stupid

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We Eat by the Grace of Nature, Not by the Grace of Monsanto

Published on Saturday, September 8, 2012 by [Common Dreams](#)

www.commondreams.org/view/2012/09/08-3 by [Jennifer Browdy de Hernandez](#)

“Organic, schmorganic,” fumes New York Times columnist Roger Cohen sarcastically in an article entitled “The Organic Fable.”

He bases his sweeping dismissal of the organic foods movement on a new Stanford University study claiming that “fruits and vegetables labeled organic are, on average, no more nutritious than their cheaper conventional counterparts.”

Cohen does grant that “organic farming is probably better for the environment because less soil, flora and fauna are contaminated by chemicals.... So this is food that is better

ecologically even if it is not better nutritionally.”

But he goes on to smear the organic movement as an elitist, pseudoscientific indulgence shot through with hype.

“To feed a planet of 9 billion people,” he says, “we are going to need high yields not low yields; we are going to need genetically modified crops; we are going to need pesticides and fertilizers and other elements of the industrialized food processes that have led mankind to be better fed and live longer than at any time in history.

“I’d rather be against nature and have more people better fed. I’d rather be serious about the world’s needs. And I trust the monitoring agencies that ensure pesticides are used at safe levels — a trust the Stanford study found to be justified.”
Cohen ends by calling the organic movement “a fable of the pampered parts of the planet — romantic and comforting.”

But the truth is that his own, science-driven Industrial Agriculture mythology is far more delusional.

Let me count the ways that his take on the organic foods movement is off the mark: Organic food may not be more “nutritious,” but it is healthier because it is not saturated with pesticides, herbicides, fungicides and preservatives, not to mention antibiotics, growth hormones and who knows what other chemicals.

There are obvious “health advantages” in this, since we know—though Cohen doesn’t mention—that synthetic chemicals and poor health, from asthma to cancer, go hand in hand.

Organic food is only elitist if it comes from Whole Foods—the one source Cohen mentions. I grow organic vegetables in my backyard, and they save me money every summer. We don’t need the corporatization of organic foods, we need local cooperatives (like the CSAs in my region) to provide affordable organic produce that doesn’t require expensive and wasteful transport thousands of miles from field to table.

About feeding 9 billion people: first of all, we should be working hard to curb population growth, for all kinds of good reasons. We know we’ve gone beyond the carrying capacity of our planet, and we shouldn’t be deluding ourselves that we can techno-fix our way out of the problem. Industrial agriculture is a big part of the problem. It will never be part of the solution. Agriculture must be relocalized and brought back into harmony with the natural, organic cycles of the planet. If this doesn’t happen, and soon, all the GMO seed and fertilizers in the world won’t help us survive the climate cataclysm that awaits.

Mankind is better fed and longer lived now than any time in history? Here Cohen reveals his own elitist, Whole-Foods myopia. Surely he must know that some billion people go to bed hungry every night, with no relief in sight? Mortality statistics are also

skewed heavily in favor of wealthy countries. So yes, those of us in the industrialized nations are—again, depending on our class standing—living longer and eating better than in the past, but only at the cost of tremendous draining of resources from other parts of the world, and at increasing costs in terms of our own health.

Just as HIV/AIDS is the scourge of the less developed world, cancer, asthma, heart disease and diabetes are the bane of the developed world, and all are related to the toxic chemicals we ingest, along with too much highly processed, sugary, fatty foods.

For someone who is calling the organic movement “romantic,” Cohen seems to have an almost childlike confidence in authority figures. He says he trusts “the monitoring agencies that ensure pesticides are used at safe levels — a trust the Stanford study found to be justified.” And I suppose he also still believes in Santa Claus? We cannot trust that the “safe levels” established by the EPA or FDA are in fact safe, given the fact that we in an environment where thousands of chemicals enter the market without sufficient testing, presumed innocent unless proven guilty—but to win the case against them, first people must get sick and die.

Cohen’s concluding zinger, “I’d rather be against nature and have more people better fed,” displays his own breathtaking blind spot as regards the human relation to the natural world.

Human beings cannot be “against nature” without being “against ourselves.” We are a part of the natural world just like every other life form on this planet. Our fantasy that we can use our technological prowess to completely divorce ourselves from our material, physical reality is just that—a fantasy. We eat by the grace of nature, not by the grace of Monsanto.

For the entire history of homo sapiens, we have always eaten organic. It’s only been in the last 50-odd years, post-World War II, that wartime chemicals and technologies have found new uses in agriculture.

The result has been the rapid and wholesale devastation of vast swaths of our planet—biodiversity giving way to monoculture, killer weeds and pesticide-resistant superbugs going wild, the weakening and sickening of every strand of the ecological web of our planet.

The relevant fable to invoke might be the tale of Jack and the Beanstalk. We might be able to grow a fantastically huge beanstalk if we fed it with enough chemical fertilizers, and we might even be able to climb it and bring back a goose that lays golden eggs. But in the end, that beanstalk will prove to be more dangerous to us than it’s worth—we’ll have to chop it down, and go back to the slow but solid organic way of life that has sustained us unflinchingly for thousands of years.

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Food on global casino

Sep 12, 2012 www.asianage.com/columnists/food-global-casino-250 by [Vandana Shiva](#)

Food is our nourishment. It is the source of life. Growing food, processing, transforming and distributing it involves 70 per cent of humanity. Eating food involves all of us. Yet, it is not the culture or human rights that are shaping today's dominant food economy. Rather speculation and profits are designing food production and distribution. Putting food on the global financial casino is a design for hunger.

After the US subprime crisis and the Wall Street crash, investors rushed to commodity markets, especially oil and agricultural commodities. While real production did not increase between 2005-2007, commodity speculation in food increased 160 per cent. Speculation pushed up prices and high prices pushed an additional 100 million to hunger. Barclays, Goldman Sachs, JP Morgan are all playing on the global food casino. A 2008 advertisement of Deutsche Bank stated, "Do you enjoy rising prices? Everybody talks about commodities — with the Agriculture Euro Fund you can benefit from the increase in the value of the seven most important agricultural commodities."

When speculation drives up prices, the rich investors get richer and the poor starve. The financial deregulation that destabilised the world's financial system is now destabilising the world food system. The price rise is not just a result of supply and demand. It is predominantly a result of speculation. Between 2003 to 2008, commodity index speculation increased by 1,900 per cent from an estimated \$13 billion to \$260 billion. Thirty per cent of these index funds are invested in food commodities. As the Agribusiness Accountability Initiative states, "We live in a brave new world of 24-hour electronic trading, triggered by algorithms of composite price indices, fits of investor 'lack of confidence' and of unregulated 'dark pools' of more than \$7 trillion in over the counter commodities derivatives trades."

The world commodity trading has no relationship to food, to its diversity, to its growers or eaters, to the seasons, to sowing or harvesting. Food diversity is reduced to eight commodities and bundled into "composite price index". Seasons are replaced by 24-hour trading. Food production driven by sunshine and photosynthesis is displaced by "dark pools of investment". The tragedy is that this unreal world is creating hunger for real people in the real world.

In *The Food Bubble: How Wall Street Starved Millions and Got Away with it* — a cover story for Harper's — Fredrick Kaufman says, "The history of food took an ominous turn in 1991, at a time when no one was paying much attention. That was the year Goldman Sachs decided our daily bread might make an excellent investment."

And the entry of investors like Goldman Sachs, AIG Commodity Index, Bear Sterns,

Oppenheimer and Pimco, Barclays allowed agribusiness to increase its profits. In the first quarter of 2008, Cargill attributed its 86 per cent jump in profits to commodity trading. ConAgra sold its trading arm to a hedge fund for \$2.8 billion.

Gambling on the price of wheat for profits took food away from 250 million people. Speculation had separated the price of food from the value of food. As Austin Da-mani, a wheat broker, told Fred Kaufman, "We're trading wheat, but its wheat we're never going to see. It's a cerebral experience".

Food is an ecological experience, a sensory experience, a biological experience. With speculation it has been removed from its own reality. Grain markets have been transformed, with futures trading by the grain giants in Chicago, Kansas City and Minneapolis combined with speculation by investors. And as Mr Kaufman says, "Imaginary wheat bought anywhere affects real wheat bought everywhere." So if we do not decommodify food more and more people will be denied food; as more and more money is poured into the global casino, the artificial processes of speculation are driving up prices of food and taking it beyond the reach of millions.

The rules of the World Trade Organisation, the structural adjustment programmes of the World Bank and the IMF and bilateral free trade agreements have forced the integration of local and national food economies into the global market. And now the global financial system is speculating on food commodities, influencing prices and the right to food of the poorest person in the remotest corner of the world.

The spike in the world food prices started to reappear in 2011. According to the Food and Agriculture Organisation of the UN, in January 2011, the food price index was up 3.4 per cent from December 2010. Cereal price index was three per cent above December, and at the highest level since July 2008, though still 11 per cent below its peak in April 2008.

In India, the prices of onion jumped from Rs. 11/kg in June 2010 to Rs. 75/kg in January 2011. While production of onion had gone up from 4.8 million tonnes in 2001-2002 to 12 million tonnes in 2009-2010, prices also went up, showing that in a speculation-driven market there is no correlation between production and prices. The price difference between wholesale and retail was 135 per cent.

Food that has been put on a global casino is serving speculative investors and agribusiness well, but it is not serving people. We need to get food off the global casino and back on people's plates. Food democracy and food sovereignty can only be achieved by putting an end to financial speculation.

Josette Sheeran, the executive director of the World Food Programme, related the Egyptian revolution of 2010 to the rise of food prices. "In many protests, demonstrators have brandished loaves of bread or displayed banners expressing anger about the rising cost of food staples such as lentils. When it comes to food, the margins between stability and chaos are perilously thin. Volatility on the markets can translate quickly to volatility on the streets and we all should remain vigilant."

The growing concern about speculating on food has forced some banks to stop investing in food commodities. Germany's Commerzbank and Austria's Volksbanken have both removed agricultural products from their index fund products. Deutsche Bank had earlier done the same. It is time that every government and every financial institution put people's right to food above the hunger for profits.

The writer is the executive director of the Navdanya Trust

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Farming Changes Can Limit Risks

Updated July 25, 2012, 11:12 PM [link to article](#)

[Jonathan Foley](#) is the director of the Institute on the Environment at the University of the Minnesota, where he holds a McKnight Presidential Chair in global environmental sustainability.

Droughts happen. They have happened in the past, and they will happen in the future. Whether the odds of extreme droughts are changing is still an open question, but signs point to shifting patterns of climate.

No matter the cause, droughts have a heavy impact on agriculture. This year, American corn and soybean crops are being crippled by high temperatures and low rainfall. Only a lucky few farmers will have a decent harvest.

Sadly, much of America's commodity agriculture is especially vulnerable to climatic extremes – whether droughts, floods, heat waves or cold snaps. In particular, it is hard to imagine a system more susceptible to bad weather than the American corn and soybean belt.

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Why are these farms so vulnerable to climatic extremes?

First, they are vast monocultures. You can drive from one end of the Midwest to the other and see almost nothing but corn and soybeans. If either crop fails (in terms of production or price), farmers are doomed. (Imagine a mutual fund that only invested in two companies. Wouldn't that be incredibly risky?) Diversification – from two crops to dozens – would help guarantee at least some production and income each year. Second, corn and soybeans are annuals with shallow roots, bred for rapid summertime growth. They cannot withstand a bad season. Shifting to other farming systems, with

more perennial crops, deep-rooted grasses and trees, could increase resilience to extreme weather.

Third, decades of industrial farming have depleted the natural organic matter (and “tilth”) of many Midwestern soils, reducing their ability to absorb and store moisture. Fortunately, no-till agriculture and organic farming practices can restore the health of the soil, and greatly improve the resilience of crops to extreme weather.

Finally, commodity agriculture suffers many built-in inefficiencies. American corn and soybeans are mainly used to feed animals (where cattle require 30 pounds of grain to add one pound of boneless beef) and produce ethanol rather than feed people directly. A system that replaces some of the corn-soybean belt with grains, fruits and vegetables that go directly into the human diet and with grasslands to feed animals and create cellulosic biofuels would feed more people, and be far more resilient to climatic extremes.

Extreme drought will happen again, guaranteed. Will American agriculture take a cue from this summer and prepare for it?

###

Food and Extreme Weather: It's the Soil, Stupid

Mon Jul. 9, 2012 3:00 AM PDT by [Tom Philpott](#)

- <http://droughtmonitor.unl.edu>
- www.motherjones.com/tom-philpott/2012/07/what-organic-ag-teaches-us-about-feeding-ourselves-while-planet-heats

As the climate warms up and "extreme" events like heat waves and droughts [become more common](#), what will become of food production? I started to examine that question in my [last post](#), published Wednesday. A front-page [article](#) in Thursday's *New York Times* brought a stark reminder of why the topic is crucial.

Reports the *Times*' Monica Davey:

Already, some farmers in Illinois and Missouri have given up on parched and stunted fields, mowing them over. National experts say parts of five corn-growing states, including Indiana, Kentucky and Ohio, are experiencing severe or extreme drought conditions. And in at least nine states, conditions in one-fifth to one-half of cornfields have been deemed poor or very poor, federal authorities reported this week, a notable shift from the high expectations of just a month ago.

The message from the Midwest is clear: Chemical-intensive, industrial-scale farming is vulnerable to spells of hot, dry weather—some of the very conditions we can expect to

become common as the climate warms. In my last post, I argued that the solution to this problem favored by US policymakers—to keep industrial agriculture humming along with novel seeds engineered for "drought tolerance"—probably won't work.

What might? I think the answer lies outside of some Monsanto-funded university lab and right beneath our feet: in the dirt. Or, more, accurately, in how farmers manage their dirt. A while back, I [wrote about](#) this 2012 *Nature* paper comparing the productivity of organic and industrial ag systems. The study found that on average, industrial systems produce crop yields on average 25 percent higher than organic ones. (I took issue with some of the assumptions behind that conclusion [here](#).) But under conditions of extreme weather, things change:

Soils managed with organic methods have shown better water-holding capacity and water infiltration rates and have produced higher yields than conventional systems under drought conditions and excessive rainfall.

In other words, organically managed soils deal with water better—both in conditions of drought and heavy storms (the frequency of which is also expected to increase as the climate changes). Soil rich in organic matter (well-decayed remnants of plants and other living creatures) bolster soil in weather extremes by helping store water in times of scarcity and by holding together and not eroding away during heavy rains.



Corn in the [organic] legume-based (left) and conventional (right) plots six weeks after planting during the 1995 drought. The conventional corn is showing signs of water stress. Photo and caption: Rodale Institute

And why would organically managed soils contain more organic matter? It quite likely has to do with the ways conventional and organic farmers feed the soil.

If you're a conventional farmer, you probably fertilize annually with synthetic nitrogen fertilizer in the form of anhydrous ammonia. This is isolated plant food, free of any organic matter. (It's the equivalent of taking a vitamin pill—pure nutrients without actual food.) The only organic matter your soil gets comes from the crop residues that you leave in your field. This brings the advantage of convenience—crop nutrients come from tanks that can efficiently be sprayed on to fields. And it also gives crops a quick jolt of

ready-to-use nitrogen.

If you're an organic farmer, you don't have the luxury of blasting your soil with straight nitrogen. To replenish nutrients, you have to have physical stuff that contains nitrogen bound up in organic matter—think compost and manure. You can also grow legume cover crops that trap nitrogen from the air and deliver it to the roots of plants in a form that can be taken into the soil. In this case, too, you're adding a nice dose of organic matter along with nitrogen, in the form of the plants that rot in the ground when the cover crops do. And, like conventional farmers, you get the benefit of crop residues left in the field.

As a result of these differences, organically managed soils trap more carbon in the soil and all of that carbon allows these soils to hold in water and nutrients better. (Note that carbon stored in soil in a stable fashion is carbon that isn't in the atmosphere trapping heat and causing the planet to warm. So organically managed soils don't just help farmers adapt to climate change—they also help mitigate climate change.)



The organically managed soil is darker and aggregates are more visible compared to the conventional. *Photo and caption: Rodale Institute*

The oldest US tests plots comparing organic and conventional farming, the Rodale Institute's fields in Pennsylvania, bear this out. In the [latest report](#) on its side-by-side experiment, which started 1981, Rodale found that "Organic corn yields were 31% higher than conventional in years of drought." Researchers theorize that this is because the organic fields continue storing more carbon year after year, while the conventional ones have "shown a loss in carbon in more recent years." (Another long-term study, Iowa State University's [Long-Term Agroecological Research Experiment](#), found similar results.)

Here's how Rodale describes the role of carbon:

Carbon performs many crucial functions such as acting as a reservoir of plant nutrients, binding soil particles together, maintaining soil temperature, providing a food source for microbes, binding heavy metals and pesticides, influencing water-holding capacity and aeration, and more.

Now, this insight doesn't mean that our food security depends on the farmers who

manage the Midwest's vast corn and soy fields converting to organic immediately, complete with USDA certification. But it does mean that these farmers have something important to learn from organic farming: that feeding the soil means much more than lashing it with isolated nitrogen. It also requires judicious use of manure, much more focus on compost, crop diversification (no more rotations of just corn and soy), and a new dedication to winter-season cover-cropping. Without diving into the wonky depths of agricultural economics, I can say for sure that none of this will happen without a serious nudge from US farm policy.

Here is my modest proposal, which will not make it into [the once-in-five years farm bill now being debated in Congress](#), but may look attractive down the road as climate change proceeds apace: Stop using farm policy to prod farmers to grow as much corn, soy, and as few other commodities as possible, as is being done now and for the foreseeable future, and start subsidizing them based on how much carbon they store in their soil. As the Rodale results show, crop yields will take care of themselves as the Midwest's soils gain organic matter.

In short, a climate-ready agriculture system will not likely arrive gift-wrapped in the form of a silver-bullet technology from the ag-biotech industry. Rather, if we achieve it, it will be because we figured out how to convince farmers en masse to use their land to sponge up carbon.