国NVIRONMENTALLY SPEAKING Peter Schwartzman

We all need a birdie - one to remind us

The 36th Earth Day celebration has come and gone. What started in 1970 in the United States, after many years of planning, now is an event celebrated throughout the world. Hopefully, everyone had a chance to get outside and commune with their environment this past week. But isn't absurd to think that we should take only one day out of the year to celebrate our connection with the planet Earth? As a means to understand this apparent absurdity, let's look at another celebration which is coming up soon—Mother's Day (May 8th this year). If you only celebrated, showed appreciation for, or paid attention to your mother one day a year, clearly you would expect your relationship with her to suffer irreparably, wouldn't you? The same applies to the relationship each one of us has with the planet. It is a relationship that needs continual nurturing and consideration. In light of this, I want to celebrate this year's Earth Day, albeit belatedly, by considering some of the principles and ideas that have been offered by environmental thinkers. If we were to remind ourselves of these on more regular basis—whether by post-it notes on our refrigerators, a subtle reminder from a close friend, or a birdie in the wind—we might bring our lives closer into harmony with the sustainable future that

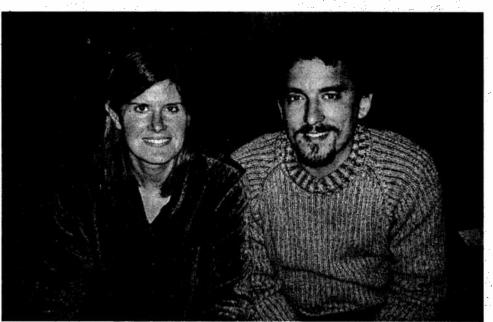
many of us desire. "Think globally, Act locally." — Rene Dubos, author of the Pulitzer Prize-winning book, So Human an Animal. The world is a big place and most of us only get to know intimately a little piece of it over the course of our lifetimes. Yet, our impact is felt globally. From our clothes and shoes sewn and molded in Bangladesh, to our phones and televisions assembled in China, to the mercury that is released when the coal we use for electricity is burnt or extracted, the materials that we "require" directly affect other human lives the world over. Additionally, only in the past fifty years or so have humans become aware of how often environmental problems have a global face—consider climate change, ozone depletion, nuclear fallout, to name a few. This mantra of the environmental movement recognizes that 6.3 billion people on the planet (as well as the millions of species of animals) are interconnected and that if one suffers then, ultimately, we all suffer. Yet, its greatest insight suggests that since we are best situated to act on a local level, we can exploit this opportunity recognizing all along that sustainable changes made locally will reverberate throughout the global system making all of us (plants and animals alike) healthier and happier. As we begin to protect our neighborhoods (from pesticides, synthetic chemicals, conspicuous consumption, and poverty), we will be moving human civilization in a sustainable

"**Think locally, Act globally." –** Unknown. This proverb takes the previous one and spins it around. In a sustainable world, living cyclically is a must. Hence, we have to complete the loop. We need to consider how we want to live (with clean air, clean water, bountiful flora, and disease-free neighborhoods) and make it happen but we cannot ignore others as we do so. We, those of us living in the United States, cannot live independently of the other 96 percent of the world's people. We must maintain peaceful and mutually-supportive relationships with one another. We must recognize and respect the sovereignty of other nations as well as international law and treaties (including all Articles of the Universal Declaration on Human Rights adopted and signed by the world's nations in December 1948—for a look at this document, visit: www.un.org/Overview/rights.html). To disregard or overlook (when convenient) the above foundations of world governance

is to undermine peace and justice in a very egregious way. When one is only 4 percent of the world's population, one cannot afford to ignore or violate such agreements. (Obviously, morally, one can't afford to do this no matter how big one's population or military force.) Wangari Maathai, the latest Nobel Peace Prize recipient, offers a prescription for the relationships that must be fostered: "We can work together for a better world with men and women of goodwill, those that radiate the intrinsic goodness of humankind. To do so effectively, the world needs a global ethic with values which give meaning to life experiences and, more than religious institutions and dogmas, sustain the non-material dimension of humanity. Mankind's universal values of love, compassion, solidarity, caring and tolerance should form the basis for this global ethic which should permeate culture, politics, trade, religion, and philosophy." We all live on the same boat—Earth—and we'd better begin acting like we are all brothers before the boat sinks and nearly everyone drowns.

"Every time you get into your car, you have already made a multitude of decisions that have environmental significance." - Peter Schwartzman. Every vehicle (whether an automobile, SUV, small truck, or motorcycle) has many characteristics—the fuel that it burns, the efficiency with which it burns the fuel, its weight, its size, it durability, its fluids, its structural components, etc.—that dictate the impact that its use has on the planet. For example, a typical SUV or small truck may require three or four times the fuel (and hence produces up to four times as much air pollution—in the form of carbon dioxide, nitrogen oxides, benzene, etc.) as a hybrid automobile. Further, choosing to drive somewhere, rather than walk, bike, or bus, is a decision that has significant environmental consequences as wellmore habitat has to be despoiled (for roads, highways and parking lots) and more materials have to be extracted (for tires, tubes, batteries, etc.). If we had to confront these differences every time we got in our vehicles, say by way of a dashboard panel (as do many hybrids that report on fuel efficiency in real time), I suspect we would make more environmentally-sound decisions. Yet, since gasoline, water, and electricity are still relatively cheap, we consume extraordinary quantities of them without much thought about them and the external costs of their use—in terms of respiratory disorders, depleted aquifers, or war profiteering. Next time you hop in your car, take just one minute to consider some of these issues before shuttling off to your destination. You might be surprised what happens.

"A thing is right when it tends to preserve the integrity, stability, and beauty of the biotic community. It is wrong when it tends otherwise." - Aldo Leopold, author of The Sand County Almanac. Every action we take must consider first and foremost (not secondly or lastly) whether it maintains or enhances the ecosystems in which we live. If it doesn't, we should find a way to accomplish our task in a way that does. As an example, if we want to make a book, we need to find a way to do so that is 100 percent recyclable and biodegradable. Architect William McDonough and engineer Michael Braungart did so with their masterful work, Cradle to Cradle. Any number of materials exist that could greatly reduce our dependency on foreign oil and the carcinogenic properties of pesticides and other synthetic chemicals. For instance, hemp is one of the most versatile materials on the planet; yet its growth is outlawed in the U.S. because of its sensationalized



Environmentalist author and lecturer Sandra Steingraber and Peter Schwartzman after her talk at Knox College last weekend. Photo: Tom Foley

association with marijuana. Just consider all the materials that can be manufactured from one hemp plant (seed—food, solvent and lubricant; stalks—biomass fuel; leaves bedding; phloem—rope, caulking, fabric), and it is no surprise that many dangerous industrial chemicals could be eliminated immediately if hemp were legalized. Fortunately, China, Hungary and Canada are growing and distributing hemp and providing a substance that meets Leopold's requirements. Additionally, linoleum (for flooring), lemon juice (for disinfecting and cleaning), corn (for natural plastics), and soy (for inks) make safer and sounder replacements to the hazardous chemicals that fill our homes as well.

"The plain fact is that the planet does not need more successful people. But is does desperately need more peacemakers, healers, restorers, storytellers, and lovers of every kind. It needs people who live well in their places. It needs people of moral courage willing to join the fight to make the world more habitable and humane. And these qualities have little to do with success as our culture defined it." - David Orr, Environmental Educator, and author of Earth in Mind. Think of all the things you learned in school. Were you educated to eat in a way that is healthy and sustainable? Were you informed of the health impacts of low exposures to chemicals? Were you taught to understand the basic scientific, economic, and political aspects of climate change, biodiversity, and water availability—thought by many to be the three key environmental problems of our time? Were you ever prompted to consider if pollutants or other adverse environmental hazards are distributed equitably (devoid of classist, racist, or ageist tendencies) in our society? Were you ever able to learn about your connection to the natural environment—how you depend on it, what impact you have on it, where you fit in it—through field trips or other dedicated time immersed in the wild? If you answer "no" to many of these questions, as I suspect it is, then this, in itself, should serve as a wake up call. (The answers are even "no" for me, if you consider my schooling from Kindergarten through four years of undergraduate training at an elite engineering/science college.) Orr asks us to consider how we can call ourselves educated when we are lacking virtually any training in these essential areas. How many of our 535 Congressional representatives have such training? Why do we continue to reproduce an educational system that is clearly lacking in basic environmental education? Can environmentally-challenged citizens or politicians be responsible for acting as watchdogs over major economic activities? The stories of the use of lead (in gasoline and paint), mercury (in

coal), polyvinyl chloride (PVC), MTBE (in gasoline), and CFCs (in refrigerators and air conditioners) demonstrate the answer is, emphatically, "No." Thus, it is imperative that we all work to educate ourselves, our family members, our neighbors, and our political representatives about environmental issues and do what we can to ensure that our future generations aren't so lacking in educational fundamentals. (Unfortunately, the "No Child Left Behind" policy created, lauded and, ironically, severely underfunded by the G.W. Bush administration, only tests our nation's children in English and Math. Apparently, science, or more specifically environmental science, isn't worthy of assessment; and this is just one of the policy's many flaws.) We need a new vision and program. We need you to promote it. Now is the time.

Never doubt that a small group of thoughtful, committed citizens can change the world; indeed, it is the only thing that ever has." - Margaret Mead, anthropologist. This sentiment, more than any other, should serve to empower us all. As an environmentalist, one often feels helpless to the unyielding drum of profit disguised at progress. In a country where money for prisons and war comes easily but money for basic health care and education is a constant battle, we need people to speak up. If our debt continues to grow at a rate similar to the building distrust of the world's people concerning the United States, our nation is in a heap of trouble. To right our course it will take people working tirelessly to steer our ship away from the metaphorical giant iceberg. Dr. Martin Luther King, Jr., once said, "Human progress is neither automatic nor inevitable . . . Every step toward the goal of justice requires sacrifice, suffering, and struggle; the tireless exertions and passionate concern of dedicated individuals." May Dr. King and Dr. Mead's insights ring in our ears regularly so that we can maintain our passionate commitment to a more peaceful relationship with the Earth and its inhabitants.

Only about 360 days till the next Earth day. What can we all do between now and then to make our neighborhoods and our world safer, healthier, friendlier, and happier? Please share your ideas with me and our community; perhaps this will be the year we move forward. Listen to that birdie, and we will make the change.

Peter Schwartzman is associate professor and chair of the Environmental Studies Program at Knox College. He is a research climatologist with peer-reviewed publications in the area of climate change and human population growth. He is currently writing two books which will attempt to communicate environmental understanding to a broad audience.