

***LA PALABRA* ARTICLES for SUSTAINABILITY POSITION STUDY**

1. DOES LWVNM NEED A NEW STATE POSITION ON SUSTAINABILITY?

LWVLA plans to propose a state study of sustainability with the goal of adopting a position for LWVNM during the 2005-2007 program year. Because of the complexity of the subject, we plan to publish a series of articles in La Palabra during 2005 to introduce the issues. We hope to follow up with presentations to the local Leagues in 2005-2006 in order to develop the basis for a state position.

To some extent the concept of “sustainability” is already present in LWVUS and LWVNM positions. For example, the national position on Natural Resources states that resources “should be managed as interrelated parts of life-supporting ecosystems.” The subsection “Further Guidelines and Criteria” includes many sustainable concepts, such as “promote policies that manage land as a finite resource and that incorporate principles of stewardship” and “support environmentally sound policies that reduce energy growth rates, emphasize energy conservation and encourage the use of renewable resources.” The state position on Natural Resources strongly supports resource conservation.

However, it has become clear that the solutions suggested by these existing Natural Resource positions do not address all aspects of sustainability. We need to consider not only the growing resource shortages, that is, the biophysical limitations, of the planet but also the systemic economic, political and social structures that are making it difficult for humanity to address the problems that it faces. Certainly technology has an important role to play: we must not merely recycle and reuse but learn to design so that there is

little or no waste; we must tailor industry and transportation to require no more energy than can be sustainably supplied by the sun. But we believe that technological solutions will not be enough, as an economic system that relies on future growth to lift billions out of poverty collides with an increasingly stressed biosphere.

We share the premise of the League that such major problems can be solved only by democratically organized, informed citizens. We believe that the concept of sustainability must inform the League’s positions on Government, Social Policy and International Relations as well as Natural Resources. And because unsustainable societies are likely to become undemocratic, we believe that the League should be taking positive leadership on these difficult issues.

Each of the articles that we are preparing for La Palabra will include a few questions. If you have thoughts on these or related questions, we would very much like to hear from you. Please send your ideas to Kathy Campbell at ksmithcamp@cybermesa.com or 225 Rim Road, Los Alamos, NM 87544. They will be of great help to us as we prepare a position for study and possible adoption by LWVNM.

Questions: Do you agree that a notion of sustainability should inform all League positions? Why or why not? Do you think that the League needs a stronger position in this area or do you find the existing positions [national and state] sufficient? Are there worthy legislative initiatives that the state League is currently unable to support for lack of sufficient positions in this area?

2. SUSTAINABILITY: LIVING WITHIN OUR (RENEWABLE) MEANS

In the article “Does LWVNM Need a New State Position on Sustainability”, which appeared in the March issue of *La Palabra*, we pointed out that the concept of sustainability is already present in many state and national positions. In particular, several of the LWVUS Natural Resources positions emphasize preservation of “the physical, chemical and biological integrity of ecosystems” and mention the “carrying capacities of earth area’s natural resources”. Nevertheless, League positions fail to address some essential aspects of sustainability. In particular, as LWV California has pointed out in their Sustainable Communities Action Policy (<http://ca.lwv.org/lwvc/issues/suscomm/suscommmap.html>), “to take action with respect to limits on population, growth, or consumption, further study leading to new positions would be needed.”

Indications that we are approaching, or have even overshoot, some physical and biological limits of our ecosystems are appearing almost daily in the news. Consider:

- Speaking at an international conference in Mauritius in January of this year, the Chairman of the Intergovernmental Panel on Climate Change reported that concentrations of carbon dioxide in the atmosphere have already reached dangerous levels and that immediate, deep cuts in the pollution are required for human survival. The rate of increase of the concentration of carbon dioxide in the atmosphere has accelerated abruptly in the past two years. A readable series of articles, “The Climate of Man” by Elizabeth Kolbert in *The New Yorker* (April 25, May 2 and May 9, 2005), captures the escalating scientific alarm.
- All over the world, water tables are falling as water is pumped from aquifers

faster than they can be recharged. New Mexico too has become increasingly dependent on groundwater pumping, undermining a legal framework that is based primarily on surface water and temporarily masking the effects of unmanaged growth. A good summary of the situation in New Mexico is the 2002 report prepared by 1000 Friends of New Mexico, *Taking Charge of Our Water Destiny*, available at http://www.1000friends-nm.org/publications/new_water.html.

- In the middle of the twentieth century M. King Hubbert, a geologist working for Shell Oil, used his knowledge of reserves in the United States to predict, correctly, that American oil production would peak about 1970. When applied to oil production world wide, Hubbert’s technique, as well as other estimation methods, suggest a production peak within the next two decades and quite possibly within the next two years. Unperceived by the general public even a few months ago, “peak oil” has become the subject daily news stories (see <http://www.energybulletin.net/>.)

These are symptoms that the global economy is outgrowing not only its nonrenewable resource base—oil and other mineral resources—but also resources that are nominally renewable, such as fresh water and nature’s ability to absorb our wastes. Ultimately the sustainability of the economy will depend on its using renewable resources at a rate that does not exceed the rate at which they can be regenerated. Scientists have concluded that the limiting factor in this regeneration is the rate at which solar energy is converted to biomass by photosynthesis, a process which produces useful materials—food, fiber, building materials—while reabsorbing carbon

dioxide from the atmosphere. This natural “bioproductivity” of the Earth is limited by the amount of land and continental shelf area suitable for the growth of plants and bacteria capable of photosynthesis. It also requires suitable temperature ranges, minerals made available by healthy soils and oceans, and the decomposition and pollination services provided by other organisms.

One way to compare human consumption rates to this bioproductive capacity of the Earth, or “biocapacity”, is called an “ecological footprint”. The *Living Planet Report 2004* (LPR2004), available at <http://www.footprintnetwork.org/>, summarizes footprint calculations both globally and by country. Using globally available economic production statistics, LPR2004 calculated that the world’s population of 6.15 billion in 2001 (set to pass 6.5 billion this year) required 120% of the actual biocapacity of the Earth for the production of economic goods and services. Like any deficit, this “ecological deficit” represents a debt against the future, one on which no defaults will be allowed.

U.S. consumption exceeds its own biocapacity by almost a factor of two, even though our per capita biocapacity is more than 2.5 times the world average. Unsurprisingly, the most rapidly growing component of our footprint is the need for additional absorption capacity to remove excess carbon dioxide from the atmosphere, but of course we also “import” biocapacity in the form of goods from other countries.

Are there solutions to these seemingly intractable problems? The first step, surely, is to acknowledge their existence. Currently many American politicians and the population at large appears to be in denial.

Once the problems are faced, however, there are indeed a wealth of alternative visions and promising proposals to consider, spanning the areas of governance, social and economic policy with which the League has always concerned itself. To be sure, technology will also play a role in human survival, but it is clear that technology by itself is not enough. Unguided by a policy of conservation, technology has so far served mostly to enable human production and consumption to grow well beyond the Earth’s capacity to support them with any semblance of social equity.

The laws of nature are not subject to human legislation. As Ross Gelbspan writes in **Boiling Point** (2004), “Nature’s laws are not about supply and demand. Nature’s laws are about limits, thresholds, and surprises.” But we can revise our human systems. In the remaining articles of this series, we will address the economic, social and governmental opportunities that are available to the League and to our country once we recognize the very real physical constraints on our future that have been outlined above and decide to face them head-on.

Questions: Should League positions explicitly acknowledge the limits to growth and the importance of recognizing them? Should the League take a leading role in educating politicians and the public on the urgency of global warming? (Note: LWVUS does support the U.S. signing the Kyoto Treaty, but has not gone further to acknowledge that much more is required of us.) Does LWVNM need an explicit position on a New Mexico water budget in order to develop a coherent set of action priorities for water legislation?

3. SUSTAINABILITY REQUIRES AN ECONOMIC PARADIGM SHIFT

Faced with the litany of ecological limitations, many individuals and whole cultures retreat into simple denial. They tell us that there is no alternative but to continue in the current direction, assuming that the market and technology will solve the short-term problems, leaving the long-term problems to be solved by future generations. The trouble with this approach, as the last article in this series attempted to show, is that the future is now (not to mention, of course, that this attitude is not at all League-like!) So in the final two articles of this series we sample the proposals for alternative paths forward.

An economy is sustainable only if it complies with the principles of ecology. A sustainable economy must respect the capacity of the ecosystem on which it depends, both for material resources and for the recycling of waste materials. It must acknowledge that ecosystems provide not only goods but also indispensable services.

Ecological economists describe three objectives for an economic system: allocating resources among competing uses, distributing income among participants, and optimizing the scale of the economy relative to the ecosystem within which it is embedded. Allocation and distribution are familiar concepts from traditional economic theory. Markets do an excellent job of allocating resources within the constraints imposed by society regarding the distribution of income and more generally goals of economic activity. Without such constraints there are an infinite number of mathematically optimal solutions to the allocation problem, some of which lead to highly undesirable distributions of income. For this reason many governments, some economists, and organizations such as the League of Women Voters recognize the

need for society to constrain the operations of markets.

Virtually no government and only a handful of economists and organizations have tackled the problem of scale. But it is the scale of the economy that is the main problem today. The economy is no longer small relative to the Earth, something that is implicitly assumed by all traditional economic theory. Indeed, the March 2005 global assessment report of the Millennium Ecosystem Assessment

www.millenniumassessment.org estimates that almost two-thirds of the natural systems that support life on Earth are being degraded by human pressure. As Herman Daly as pointed out in **Beyond Growth** (1996, p. 13), “we must distinguish *growth* (quantitative increase by assimilation or accretion of materials) from *development* (qualitative improvement, realization of potential.)” The ecosystem has developed, not grown, into the marvelously complex web that supports life as we know it.

Creating a sustainable economy will require rapid change in both economic theory and practice. Forward-looking individuals, organizations and even governments are beginning to recognize opportunities for innovation, employment and investment.

The economy must be redesigned so that it produces little or no waste. While eco-efficiency, or doing more with less, is an admirable concept, it falls short of the fundamental change that is needed. After “the next industrial revolution” (the title of a very readable article that appeared in the October 1998 Atlantic Monthly, by William McDonough and Michael Braungart), industrial products will be designed so that, after serving the purpose for which they were created, they will provide nourishment for something new. Biological materials,

including all packaging, will return to the organic cycle to be consumed by microorganisms, fungi, and other decomposers. Durable goods such as computers and vehicles will be designed so that most of their components can be reused as is while others can be extracted and remanufactured. Customers will purchase the services of such products rather than the products themselves. An industrial park that attempts to put some of these ideas into practice has been constructed at Kalundborg, Denmark (www.symbiosis.dk), where residual products are exchanged among a group of about 20 projects.

Energy use needs major overhaul on both the supply and demand sides. The ten-point plan of the Apollo Alliance www.apolloalliance.org calls for major investment in existing technologies—more efficient and less polluting buildings, automobiles, and manufacturing, as well as smart urban growth and multimodal transportation. The Alliance claims that their proposal will add over 3 million good jobs to the American economy at the same time as it produces substantial energy savings and reduces carbon emissions. The World Energy Modernization Plan (WEMP) new.heatisonline.org makes similar claims for its plan to facilitate a rapid transition to climate-friendly modes of power generation worldwide.

A common theme among economic visionaries is the need to reverse the trend towards a single global economy. As the Irish economist Richard Douthwaite explains, globalization destroys the local environmental and economic signals that used to warn communities that their behavior was unsustainable, while rewarding those that consume the Earth's resources most rapidly (www.feasta.org/documents/review2/douthwaite.pdf). The sustainable economy will not be a single, uniform global system but a

much more complex network of production and trading systems. Basic needs—food, fiber, shelter, energy—will be met within bioregions whenever possible. Only rare essential materials and products with a high technological content will be traded on larger scales. Distributed renewable electricity generation will supply most energy needs, together of course with major improvements in efficiency of use. Construction will be adapted to use local materials, rather than the current one-size-fits-all frame or steel construction, and buildings will require little or no energy-intensive climate control. Far more diversity will exist in transportation, both locally and interregionally.

The benefits of the required transition, in addition to enabling us to live within a thriving ecosystem, are many. The transition will require much innovation, opportunities that are already being exploited by the rest of the world while the U.S. lags behind. It will provide opportunities to invest constructively, rather than solely for speculative gain. And most important, it will increase local employment for those who are unable to find meaningful work in today's economy.

What does all this have to do with the League, which by and large is concerned with actions that can be legislated or executed by governments? In fact, government has essential roles to play, both in ceasing to promote harmful practices and systems through misguided subsidies and in encouraging more sustainable practices through taxes and market-guiding incentives. Markets must be regulated to preserve resources for future generations and to reduce the concentration of wealth. Producers must internalize ecological costs and pass them on to consumers so that market prices provide correct signals to consumers. The League has an opportunity on all levels, from local to national, to make

its voice heard as a proponent of a rapid transition to a sustainable economy.

Questions: Should the League strengthen the “maximum protection of the environment” clause in its national position to make it clear that this requirement may not be overruled by short-term economic considerations? Should the NM League reevaluate its position on taxation, promoting ecological tax reform, and

augment this with strong positions against the use of tax money to subsidize economic development that does not take ecological constraints into account? Should the national League be supporting the expansion of international trade as a goal? Should LWVNM’s economic development position make a clear distinction between development and growth?

4. SUSTAINABLE DEMOCRACIES

The economic paradigm shift outlined in the third article in this series is necessary, but not sufficient to bring about the transition to a sustainable world. Major changes in the organization of society will also be needed. We hinted at some of this in the last article, mentioning in particular government’s role in steering market forces through taxation and subsidization policies. In this article we consider the relationship between government and sustainability.

- Internationally, the Kyoto Protocol contains many of the elements that will be required to deal with the most pressing international ecological problem, global climate change. (unfccc.int/essential_background/kyoto_protocol/items/2830.php) It addresses the problem of *scale* by setting international goals, which translate into a cap on world-wide emissions. It *distributes* corresponding emission “rights” in the form of quotas to be met by signatory nations. And it sets up mechanisms whereby markets can *reallocate* these rights through trading. A carbon emissions trading program for power plants and fuel-intensive manufacturers has been established in Europe as a way to meet the Kyoto goals

(www.climateark.org/articles/reader.asp?linkid=38806).

Much work has also been done on trade within countries, a good example being the tradable “Personal Carbon Allowances” that have been designed to help Great Britain meet its Kyoto objectives

(www.fcnp.com/519/peakoil.htm). The United States, of course, has refused to participate in the Kyoto Protocol, but there are many local and citizen initiatives within the U.S., from the US Mayors Climate Protection Agreement (www.ci.seattle.wa.us/mayor/climate) to a Peoples Ratification of the Kyoto Global Warming Treaty (www.climatecrisiscoalition.org).

- At the other end of spectrum are locally designed solutions to the problems of water scarcity. While water scarcity now affects almost every country around the globe, both developed and underdeveloped, solutions are intrinsically more local than solutions to the climate change problem. Privatization, the one-size-fits-all “solution” proposed by neoliberal economists, has failed to deliver promised efficiency and access in third-world countries from Brazil to

Bangladesh, as described in Reclaiming Public Water (www.tni.org/books/publicwater.htm). It is being replaced by increased public participation and democratic control. In the United States, the Pacific Institute favors relying on decentralized systems to supply water, replacing the wasteful once-through consumptive use of current systems. Community participation and direction is a critical component of this vision (www.pacinst.org/publications/worlds_water/worlds_water_2002_chapter1.pdf).

The structural impediments to promoting sustainability through government action must be addressed. In the U.S., these are largely the result of a political system that has become increasingly unrepresentative, captured by wealthy corporate entities. The League of course works around the edges of this problem, notably in its attempts to promote campaign finance reform, but has so far failed to address more basic issues. For example, it lacks positions on corporate personhood (www.ratical.org/corporations) and media consolidation under corporate control, two structural issues that are at the heart of the current democratic deficit in this country. And in considering legislative apportionment, the League must think beyond the single-member, winner-take-all system that leads to more than half of all elections being noncompetitive and disenfranchises a substantial proportion of the electorate. See for example “Full Representation Voting Systems” at www.fairvote.org/?page=378 for a discussion of alternatives.

The League has positions on democracy, on the role of government, on international relations and in other areas that bear on the issues that we will be considering in the state sustainability position study. But we need to re-evaluate these positions carefully in the light of 21st century realities. By and

large the existing positions reflect the optimism of the 20th century, when energy from fossil fuels and carbon-based technological advances seemed endless and when our two-party system had not yet converged to an unrepresentative “center” that today severely limits the range of public discourse. Now that we understand that this path is not sustainable, many of these positions need rethinking; otherwise the League is in peril of becoming irrelevant. Can we put the League’s reputation and contributions to civil society back on track by adopting a new and overriding criterion of sustainability?

Questions: What should the League advocate beyond its (poorly advertised) support for the U.S. signing the Kyoto Treaty? Should we be observing the NM Citizen’s Climate Advisory Group deliberations? Are we prepared to take a position on any resulting legislative proposals in 2007? Should LWVABC positions on sprawl and transportation be adopted by consensus by the state so that we can lobby for (or against) legislation at the state level as appropriate? Should the League augment its support for representative democracy to encourage voting systems that produce more representative results? Should we be more aggressive in promoting opportunities for participatory democracy, particularly as we face the state’s water problems? Internally, should the League continue to rely on “experts” to tell us what to think (or at least prescribe the scope of the debate) about topics such as economic development, apportionment, and trade?