

GREEN BUILDING



Changing Times by David Eisenberg

Something big has shifted. One indication is how difficult it is to keep up with all the changes in the field of green building and more sustainable development. Yet it isn't only all the new products, programs, organizations, evaluation systems and standards, but all the jurisdictions that are seeking to "green" their building and development codes and the organizations that are embracing this shift.

When large cities like Los Angeles or Boston take action to make green building a requirement for all larger construction projects, whether their own or those in the private sector, and a major regional home builders association comes out in support of mandatory green building standards (more on that shortly), there can be little doubt that a major shift toward more environmentally responsible building and development is underway. It has also been gratifying to see ICC's responsiveness in adapting to greener concepts and ways of building, particularly considering the three-year development cycle between editions of the *International Codes*. There are certainly many challenges yet to be overcome, but we're at a point where it is relatively straightforward in most places to do "mainstream green" projects using commercially available green materials and products and striving to meet performance targets in the range of what most green building programs require today.

That's great news, demonstrating that we have

taken important steps in overcoming the resistance and inertia that accompanies any movement for change. As people awaken to the realities of the supply and cost of energy, water and other resources and concerns about climate change and other environmental factors, the pressing need for change has become much more widely accepted; and as awareness has grown about the role that buildings play in these crises, there has been a growing understanding of the beneficial role we can all have in addressing them. The spirit that is emerging in how we're starting to approach these challenges is refreshingly reminiscent of earlier times when the famed American "can-do" attitude was in full bloom.

As evidence of that forward-looking attitude, just as we're learning to convert mainstream design and building practice to cost-effectively save 30 percent or more in energy use in new buildings, we're seeing a sudden interest in net-zero energy homes and buildings. Similarly, as we get comfortable with the basic elements and goals of green building programs, along comes the Living Building Challenge (LBC—www.cascadiagbc.org/lbc) to help pull us further toward buildings, projects and communities that go beyond doing less harm with the goal of providing a net benefit in all of their impacts.

Developed by the Cascadia Region Green Building Council, one of the oldest and largest chapters of the U.S. Green Building Council and a chapter of the Canada Green Building Council—covering

Washington State, Oregon, British Columbia and now Alaska—the LBC is pushing the envelope in a number of ways. The sixteen prerequisites for achieving Living Building certification include not building on previously undeveloped land, zero net energy usage, zero net water usage, a list of materials that can't be used on site, limitations on how far away resources come from, very high indoor environmental quality, and educational and aesthetic requirements.

Conceived as a continually evolving bridge to the future, the LBC weaves each of the individual elements it addresses into an integrated whole with the goal of creating restorative and, eventually, regenerative projects. The bar is set high and will rise as we learn how to fit the things we create into the same productive and generative flow that enables natural systems to continuously evolve, do productive work and create surpluses. In keeping with the theme of encouraging trends, King County, Washington, is partnering with the LBC to help identify and address code and regulatory barriers to the LBC.

New Alliances and New Challenges

As important as what is emerging is the formation of surprising new alliances, opening all kinds of collaborative possibilities. Like King County's interest in partnering with Cascadia to help develop the LBC, the Home Builders Association of Northern California (HBANC) has announced its support for mandatory adoption of green building standards for all Bay Area cities and counties. An integral aspect of HBANC's commitment to serious goals in energy efficiency and reduced climate impact is its partnership with Build It Green (www.builditgreen.org), an independent, nonprofit organization based in Berkeley, California, whose Green Point Rated Program has been successfully implemented in many jurisdictions in the region over the past few years.

"HBANC believes that making sustainable green building standards mandatory is not only good for the environment and our planet, but is good for business, good for consumers, good for our growing clean-tech economy and is the right thing to do," says HBANC President Joseph Perkins. "Of the one hundred and one cities and counties in the nine-county region, fifteen have so far

adopted Build It Green's Green Point Rated standards as mandatory and we intend to help push that number significantly higher."

"We are very excited to be partnering with HBANC in expanding the Green Point Rated program," says Build It Green Executive Director Brian Gitt. "Together, we can help the Bay Area and California reach the broader goals of dramatically reducing our energy consumption, lowering our carbon emissions and growing our clean-tech economy."

Good News Mixed with Economic Uncertainty

Coinciding with all this good news is the current economic downturn and the uncertainty surrounding its duration, depth and impact on construction and development. We're already beginning to see the effects at all levels of government, including shrinking revenues for building and development departments, and those who remember earlier boom and bust construction cycles are bracing for some hard realities. However, the gathering economic storm clouds may have a silver lining this time around: the emerging economic challenges coupled with energy and climate realities may serve as motivation to implement creative policies for local economic development aimed at producing and retaining real wealth in our communities.

Consider energy, for example. A 1995 U.S. Department of Energy study titled "Dollars from Sense: The Economic Benefits of Renewable Energy" reported that Massachusetts imported 97 percent of the energy it used in 1992, Iowa imported nearly 97 percent of its energy, Wisconsin imported 94 percent of its energy (a 1994 Wisconsin Energy Bureau study observed that "The energy dollar drain from the state due to fossil fuel imports has hindered additional economic growth and job development"), the State of New York depended upon out-of-state resources for nearly 92 percent of its energy, and Rhode Island imported more



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than 90 percent of its electricity. It is unlikely that these percentages have improved significantly.

Given the enormous outflow of money tied to their energy expenditures, a growing number of cities, counties and states have enacted programs supporting energy efficiency and renewable energy projects and businesses, but national leadership is needed to capitalize on this opportunity. The increasingly urgent national agenda tied to energy independence and reduction of carbon and greenhouse gas emissions offers a persuasive rationale for an economic stimulus package based on significant public and private investment in energy efficiency and renewable energy. Rather than focusing on the short-term costs, this should be viewed as a long-term investment with wide-ranging benefits starting now and extending far into the future.

Meanwhile, local governments can focus on implementing green building programs, smart growth development codes and other measures supporting renewable energy systems, and energy upgrades for existing buildings. They could also issue bonds offering low-interest loans and other incentives to start or expand businesses, create jobs, and support the training programs needed to resolve our energy, environmental and economic problems as integral parts of local and regional sustainability policies. Local governments can help stimulate the development of “green collar” jobs and the “clean-tech” economy. Such policies could not only help revitalize communities but address the challenges facing the country as a whole. ♦

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To learn more about DCAT, visit its website at www.dcat.net.