



# Energizing Education

With back-to-school time upon us, *Home Power* applauds a few initiatives that are empowering the next generation with a positive RE outlook.

## Solar Schoolhouse

[www.solarschoolhouse.org](http://www.solarschoolhouse.org)

Started in 2000 by the Rarus Institute, a California-based nonprofit research organization, the Solar Schoolhouse (SSH) is spearheading renewable education for educators. The organization hosts one-day workshops where teachers can learn to build solar-powered fountains, set up a solar derby with miniature solar-electric cars, and design model homes using passive solar strategies and solar-electric principles.

In SSH's one-day Solar Primer workshops, teachers learn basic solar concepts by building miniature power stations and wiring PV modules—projects that can be easily replicated in most classrooms. In the five-day Summer Institute training session, participants learn how to integrate solar concepts into their curricula and tackle hands-on projects like building solar cookers and solar fountains. Educators have come from as far as Israel to take part in the program at Walker Creek Ranch in Petaluma, California.

SSH's signature workshops are an extension of the organization's DVD and books. The *Your Solar Home* series and *Teaching Solar* lessons include easy-to-follow instructions for activities ranging from building a pizza-box solar oven to organizing a "Solar Olympics."

SSH also has partnered with Solar Energy International and SMA America to present PV design and installation workshops at environmental outdoor schools throughout California. During this weeklong, on-site program, participants install a grid-tied solar-electric system at the host school.

## The KidWind Project

[www.kidwind.org](http://www.kidwind.org)

Michael Arquin didn't need a weatherman to know which way the wind was blowing. After teaching sixth-grade science in California, Arquin grew dissatisfied with the cost and quality of teaching materials for energy education. So, in 2004, after studying on a fellowship at Tufts University's Wright Center for Science Education, Arquin struck out on his own.

KidWind began as a Web site offering free lesson plans and other wind energy project ideas for educators. Then, in the fall of 2004, from Arquin's basement office and with a \$1,000 startup investment, KidWind started developing

and selling wind energy kits online. Now based in Saint Paul, Minnesota, Arquin has added other RE kits, and uses the revenue to support community outreach programs and workshops for elementary and secondary education teachers. Budget-strapped educators also can apply to win kits through a giveaway program. Beyond the classroom, KidWind offers educational tools and materials for science fairs, hobbyists, and professionals.

## Wisconsin K-12 Energy Education Program (KEEP)

[www.uwsp.edu/cnr/wcee/keep/](http://www.uwsp.edu/cnr/wcee/keep/)

Wisconsin's state motto is "Forward," and nothing more aptly describes the future-looking vision of "America's Dairyland" than its K-12 Energy Education Program (KEEP), funded by Focus on Energy, a public-private partnership supplying energy information and services to utility customers throughout the state.

KEEP's primary initiative is the Focus on Energy Schools Program, which sponsors development courses for educators, opportunities for faculty to network with energy professionals, and student activities that allow kids to get their hands dirty and minds working. The program also facilitates energy audits for schools and helps them secure the funding to implement energy improvements and upgrades. In its 14 years, KEEP has reached thousands of teachers and more than 200,000 students.

Among the program's most successful and imitated activities is the annual Solar Olympics, where students from across the state compete in contests ranging from the best solar cooker to solar Q&A. The program's annual Energy Bookmark Contest combines art and energy: fifth through seventh graders design bookmarks that exemplify an energy theme, like that of the 2009 contest—"Energy Superheroes: The Quest for an Energy-Efficient Planet." Other competitions, including an international electric vehicle race and student builders of the year, target construction and technology students.

—Kelly Davidson

The nonprofit Redwood Alliance is providing free two-year subscriptions to *Home Power* magazine specifically for K-12 school libraries. School librarians can apply at [www.hpmag.org](http://www.hpmag.org).