

The model for realistic, sustainable new housing



Peril-Proof Building

New programs and products help VISION House Orlando up the ante on safety. **By Cati O'Keefe**

In June, the 2011 VISION House broke ground in the charming College Park neighborhood of Orlando. The home was designed to respect traditional central Florida architecture, and it incorporates some heavy-duty sustainable attributes, which we'll explore in depth as we cover this house each month until its debut in January at IBS.

Of the important stories unfolding behind the scenes as this project takes shape, one stands out as particularly timely: disaster mitigation. Hurricane season always brings images of battened-down roofs and shatter-proof windows to mind, especially for those builders putting up houses in disaster-prone areas.

Veteran builders Jon Pleveich and Kim Foy of Southern Traditions Development decided early in the process to consider disaster mitigation as they worked through the design of the show house. Step one: They signed on with the "Blueprint for Safety: A Stronger Shade of Green" program administered through the Federal Alliance for Safe Homes (FLASH).

"The program is essentially taking the Florida building code and adding to it—going beyond it," explains Pleveich, company vice president. The program is voluntary, but the builder wanted to exceed the code to produce a stronger product, help the buyers reduce their insurance costs, and limit the damage that could occur should a heavy storm blow through the area.

"Our goal is to deliver prototype homes that are affordable, safe, green, and energy efficient," says Leslie Chapman-Henderson, president/CEO of FLASH. "Our first project is focused on the VISION and ReVISION Homes for the 2011 IBS. This is an enormous challenge, but the case for building smart and strong has never been more urgent."

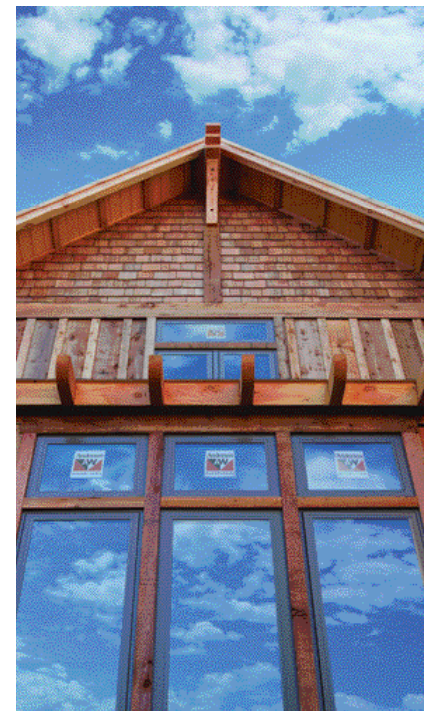
While these are all good attributes to include in a home, the challenge becomes

This cracker-style infill house is attractive and durable. It adheres to the "Blueprint for Safety: A Stronger Shade of Green" program administered through the Federal Alliance for Safe Homes (FLASH).

how to adhere to the program while keeping the 3,000-square-foot house on budget? Pleveich notes that in the area he builds, prices range from about \$175 to \$215 a square foot. "My goal is to get the price point under \$150 a square foot," he says. "We toyed with different products and techniques and felt that the ones we chose would help us meet our goals and keep it affordable."

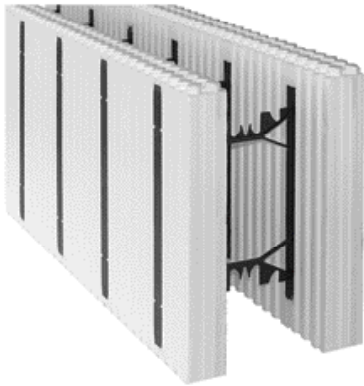
Focusing on the durability aspects, here are some of the key products the team picked:

- › **Anderson 100 Series windows** (below). Pleveich notes that these units must be sealed tight to avoid window blow-outs.
- › **Roof is decked with 5/8" plywood as opposed to OSB.** This thicker, heavier material won't deteriorate if it gets wet. The team uses ring shaped nails, and nails 6" on edges and 6" in the field. The additional nails and their strategic placement means



VISION HOUSE

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that under pressure the roof is less likely to come up.

- ARXX Prime (photo above).** The building team felt that ICFs enable significant energy savings, security, noise attenuation, and a faster build than conventional construction. "ICF block is changing the way we're building houses now," says Pleveich. Not only is the R factor higher in ICFs, but they go up very quickly, which saves money on labor. "Everyone thinks it's more expensive, but it took an ICF crew of



four men only three days to put up the first story," Pleveich points out.

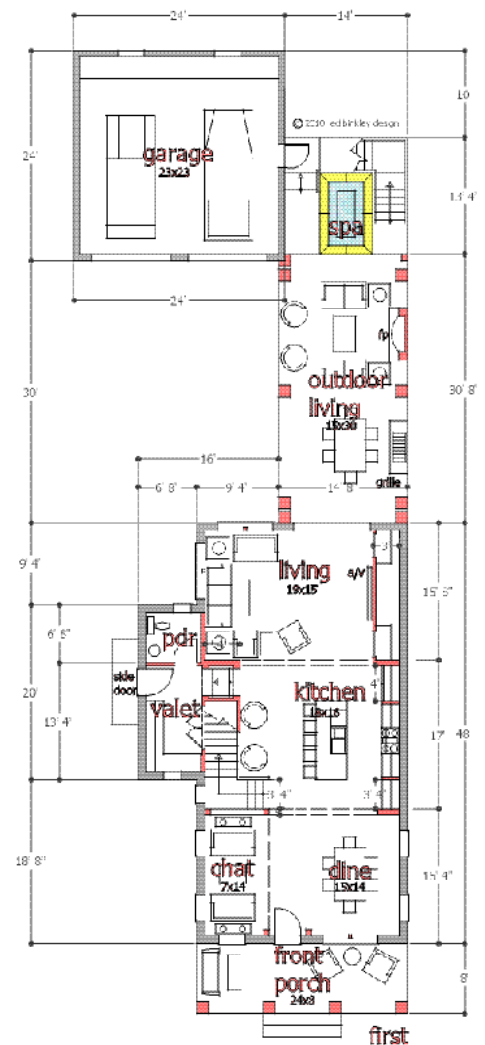
- Uponor Aquasafe Residential Fire Safety System (photo above).** While sprinkler systems are not commonly used in Florida, Pleveich points out, about 34 states have made it mandatory. "It's a really good idea," he says. "It's not that much of an upcharge, and it's one of those things that will help home buyers save money on insurance."

- Simpson Strong-Tie.** The company is doing a customized tie down system to secure roof trusses and the floor system.

Pleveich believes that durability—along with energy and water efficiency—are benefits that people are starting to see, and he looks forward to a time in the near future where people look at those attributes as an interesting story line. "We want them to first and foremost show visitors their solar panels before they show them the granite. Or show them the dual-flush toilets that conserve," he says. "It's important to get people to see that it's not just a green house. It's not a plain Jane house, and the most important benefits of owning it are energy efficiency and durability." GB

Path to Safety

The Blueprint for Safety Education Program's mission is to provide residential builders and citizens with accurate, current, and reliable information about how to make homes more disaster-resistant. *The Blueprint for Safety Field Manual* supports the mission by offering information about how to build, remodel, or restore homes using disaster-resistant techniques, technologies, and products. This website is a starting point and includes references that provide a road map for additional learning; however, it is not intended to replace the counsel of registered architects, engineers, or licensed contractors. For information regarding this program or any other Federal Alliance for Safe Homes program, visit www.flash.org.



The efficient narrow floor plan of the house blends indoor and outdoor living space for a spacious feel.

Behind the VISION

Green Builder Media's VISION House Series presents sustainable new housing and retrofit models appropriate for today's economy.

The VISION House Orlando '11 is a new home that Green Builder Media is constructing with partners Southern Traditions Development www.southerntraditionsfl.com, Ed Binkley Designs www.edbinkleydesign.com, and Designs by Pat Gaylor www.patriciagaylor.com. The project will incorporate the essentials of sustainable design and construction and will incorporate education and training for building professionals and consumers about green building products and techniques, as well as broader aspects of sustainable living. Visit the VISION House Orlando '11 pages regularly during the course of the project for updates, case studies, videos, articles, and other important information. To learn more about green design and construction, visit Green Builder College (www.greenbuildercollege.com), our online educational platform, which offers a comprehensive curriculum about sustainable development.