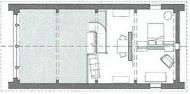


hudson river school

dennis wedlick, aia, designs a passive house in new york's scenic river valley.

hile most architects have heard the term "passive house" over the past few years, many still aren't sure exactly what it means. New York-based Dennis Wedlick, AIA, wants to change that. The architect and his team at Dennis Wedlick Architect



second floor



first floor

(DWA) are finishing up the Hudson Passive Project, a spec home in New York's Hudson Valley that they hope will create a wider understanding of passive house design. "For me, it's been a revelation," Wedlick says. "This is really quite simple and fundamental and obvious."

The passive house concept, which originated in Germany, entails lowering heating costs by up to 90 percent through a rigorous set of steps that includes

passive solar design, superinsulation, highperformance windows, and carefully calculated thermal bridging. "It's just keeping the house thermally isolated from the swings of temperature, minimizing infiltration, and maximizing insulation," Wedlick says. Working with developer Frank Sciame, builder Bill Stratton, building science consultant the Levy Partnership, and the New York State Energy Research and Development Authority (NYSERDA), DWA has designed a house that meets both passive house requirements and its own high standards for beauty and livability. In a nod to the rural setting, the 1,650-square-foot residence features a timber-frame structure and local stone cladding. SIPs walls and ceilings and triple-paned glass windows ensure an airtight building envelope.

The house is slated for completion in October, when it will be open for tours. Hard costs are running about \$200 to \$250 per square foot; the sale price of \$595,000 includes the 7-acre lot. Funding was a collaborative effort. DWA and NYSERDA paid for the research and design process, while Stratton backed the construction





Renderings: Courtesy Dennis Wedlick Architect

and Sciame provided a discount on the land. "The point of the Hudson passive house project is to raise awareness of the passive house model for architects, builders, and developers," says Wedlick, who is studying to become a certified passive house consultant. "It's meant to be a kind of industry-wide knowledge effort."—meghan drueding

The Hudson Passive Project's insulated foundation, passive solar design, and tight building envelope will combine to keep it at a comfortable temperature year-round. Wedlick and his staff drew its overall form and massing from barns and other rural buildings near its site in Claverack, N.Y.