



Deconstruct Your House

If you're building or renovating a home, you can recycle what comes down

BY JENNIFER WEEKS

MANY PEOPLE LEAVE unwanted goods like furniture and books out by the curb, but Sela Barker took this strategy to a new level in 2004 when she offered her 1924 Portland, Oregon, house to anyone who would move it from her property. "I didn't want to tear the house down, but there wasn't much worthwhile about it," Barker recalls. "It had become too small for my family and had no architecturally redeeming qualities." More than 20 takers responded to Barker's giveaway offer on Craigslist.org, but all were deterred by the cost and logistics of relocating the house.

So instead of smashing a usable building to rubble, Barker hired Portland's ReBuilding Center, the largest nonprofit source of reusable building materials in North America, to dismantle everything but the concrete foundation and preserve usable materials and fixtures. Barker donated salvaged items to the

Center and received a tax credit that covered 50 percent of her deconstruction costs, plus a bonus: furniture built by the center's Refind Furniture Studios using old-growth fir recovered from her house.

Home deconstruction is a growing movement in the building industry that recycles valuable materials and minimizes noise and air pollution associated with tearing down buildings. According to the National Association of Home Builders, about 245,000 homes and apartments are demolished every year, generating 74 million tons of jumbled-up concrete, wood, brick, asphalt, metals, glass, and other materials. Building materials in good condition can be reused, but construction and demolition (C&D) waste typically ends up in landfills because home demolitions tend to be quick and dirty: Backhoes and excavators can crush a house into residen-

tial hash in a day or less.

The best candidates for deconstruction are well-maintained properties—either older houses that contain materials like high-quality brick and old-growth lumber, or new houses with modern, high-performance materials and fixtures. "Newer is better if a house is going to be deconstructed down to the foundation, because modern lumber and double-paned windows are easiest for us to sell," says John Grossman, manager of ReStore Home Improvement Center in Springfield, Massachusetts. "Older structures that have been updated can have both kinds of treasure in them."

Sepi Gilani of Weston, Massachusetts, hired the ReStore to do a partial deconstruction, removing valuable items and demolishing the rest, when her family decided to raze their house and rebuild on-site. Tax deduc-

tions and avoided disposal costs offset labor costs, says Gilani, and deconstruction took away some of the stigma associated with doing a teardown. “Environmentally, morally, and socially, if you’re going to do something as extreme as taking down a house and starting over, at least you can make sure those materials are used again,” she says.

Owners can donate recovered materials to nonprofits like ReStore or the ReBuilding Center, or sell them to high-end architectural salvage dealers. Neil Seldman, president of the Institute for Local Self-Reliance (ILSR), estimates that a well-maintained 4,000-square-foot house may yield

With rising energy prices driving up material costs and some states banning C&D waste from landfills, deconstruction and salvage are poised to grow.

\$10,000 to \$20,000 of salvaged materials depending on the house’s style and contents. In many regions, there are strong local markets for signature materials in limited supply, such as Dade County Pine, a dense, strong wood that was used in many of South Florida’s oldest houses, and the light-gold “Cream City Bricks” cast from Lake Michigan clay, which were used in many buildings around Milwaukee.

Home deconstruction projects typically require one contractor to manage the overall project, another to handle deconstruction, and a third specialist to remove hazardous materials such as lead paint and asbestos (some contractors handle several of these tasks).

Betsy Freiburger, a project manager with Krupp General Contractors in Madison, Wisconsin, recommends screening contractors carefully to ensure that they use appropriate safety and material handling practices. Deconstruction is labor-intensive, but Freiburger says that it can be done efficiently. “Time isn’t a big constraint, but you need space for sorting. If you don’t have room for a crane to pick materials out, you need more labor,” she says.

With rising energy prices driving up material costs and some states banning C&D waste from landfills, deconstruction and salvage are poised to grow. ILSR’s Seldman says that thanks to new tools and several decades of experience, deconstruction today is often as fast and affordable as conventional demolition, even without factoring in tax benefits. “If you recycle your house, you’ll probably salvage more materials at once than your family will put into curbside bins in a decade,” says Seldman. “It’s a big opportunity.” ■



TRASH TO TREASURE: Contractors preserve a roof for its timber (opposite page) and save an entire window (right); old items can resold (below).



PROJECT CHECKLIST

FIND A CONTRACTOR. If your general contractor can’t help, contact **Habitat ReStores** (habitat.org/env.restore.html), the **Institute for Local Self-Reliance** (ilsr.org), or your local building materials recycling centers for referrals.

DECIDE WHERE TO SELL OR DONATE MATERIALS. Options include nonprofits that recycle materials or private architectural salvage dealers (salvageweb.com). Specify how proceeds or tax benefits will be allocated between you and the contractor.

MAKE A TARGET LIST. Walk through your house with contractors to identify elements that can be salvaged, highlighting anything you’d like to save. Study building plans and records of previous renovations for features that may be hidden.

DOCUMENT THE PROJECT. Contractors should provide photographs and written inventories of recovered materials, with estimated resale values.

—J.W.