

## **The Modular Challenge**

by John Grissim

### **Note to readers accessing this article from the Grissim Guides web site:**

Unlike manufactured homes, which are Federally regulated by HUD, and whose sections must be built on a chassis with wheels and a hitch, then are towed to the home site, modular homes are not regulated by the federal government. However, they must conform to state and local building codes. And they don't have to be mounted on a chassis (although some models are). Instead, they're constructed as modules, trucked to their destination on a flat bed truck, and craned onto the foundation.

Modular homes are more expensive than manufactured homes (million dollar modular homes are not unusual), and they are mostly sold to general contractors and home builders who in turn offer them to home buyers. Many modular homes are comprised of six, ten, 12, and even 20 or more sections (or boxes). They can be high end mansions.

Most HUD-code manufacturers also build modular homes, usually two sections only, rarely more than three. Some even put their modular models onto steel I-beam chassis just like manufactured homes. These hybrid moduls are often called "Hudulars," and can cause homebuyer confusion. As you will read below, many modular-only manufacturers are not at all happy about this.

During the nearly ten years I have studied factory-built housing in the US, I have watched very smart and knowledgeable people from every sector of the industry grapple with one very perplexing question: Why hasn't modular home building taken off? With their seemingly obvious advantages over site-building, including great time and cost efficiencies, and models that have drawn uniformly high praise from the traditional home-building industry, modular homes should occupy a significant and growing share of the mainstream housing market.

But they don't. According to consultant Fred Hallahan, of Maryland-based Hallahan Associates whose tracking data on all things modular are considered the industry standard, the total modular home sales nationally for 2007 was around 33,000, down 15% from the 2006 total of 38,500. Sales for both '04 and '05 were 43,000. On a positive note, the modular industry is faring slightly better than the site-built sector which fell about 28% last year. Thayer Long, director of the National Modular Housing Council (NMHC) of the Manufactured Housing Institute (MHI), says modular homes account for less than three percent of the residential home market, adding "The industry is currently in a holding pattern, and change will come slowly."

In an effort to find answers to this vexing question, I recently spoke with many industry veterans, including CEOs of companies that produce modular homes only, as well those who manufacture homes built to both the HUD code and the modular code. From these interviews a clearer picture of the dilemma has emerged, along with insights that point to possible ways forward, even as a definitive answer to the question remains elusive.

## **History and the current landscape**

As a concept, factory modular home building has been around for over century, but the industry itself didn't develop until the late-Sixties and early Seventies in the Midwest and the Northeast. Today modular building has grown into a mature industry with a strong presence in those regions as well as the East Coast. In the West modular building has much less of a presence, in large measure because it has yet to compete successfully with site-builders. Still, over the years there have been efforts to expand modulares into a national presence.

Take Champion Enterprises, for example. In the mid-90s, then Champion CEO Walt Young, seeking to position his company as a major producer of factory built homes, visited many small modular manufacturers in the Northeast to gauge the potential of buying them as part of a contemplated industry roll-up.

“What I discovered,” Young recalls, “is they were almost all neat little businesses, and were happy with their six-to-eight month backlog, and they didn't have a lot of management talent or financial depth, and weren't interested in investing to expand capacity to bring their backlog down to a normal two-to-three month period that would help grow their market. So from Champion's standpoint, there was no one there to buy. That's why we bought so many HUD manufacturers and later converted many of them to produce modulares.”

Champion went on to create Genesis Homes, a standalone modular manufacturer with plants in regional markets. By 2000 nearly all of Champion's 13 HUD code subsidiaries were offering some modular code products (typically in the 5% to 20% percent range of overall production) along with their manufactured home lines. By this time, too, just about every HUD code manufacturer was doing the same, and at about the same percentages of output.

Today there are an estimated 180 manufacturers of modular homes. Of this number about 75 are HUD manufacturers whose principal output is comprised of HUD code homes (call them HUD/mod manufacturers for the purposes of this discussion). That leaves 105 “pure modular”

manufacturers whose product is strictly modular. Significantly, this bifurcation of modular manufacturers has created concerns for many pure modular manufacturers.

It is no secret—although you will rarely see mention of this in print—that most pure modular manufacturers are horrified by the incursion into their turf by HUD/mod manufacturers, fearing that their hard-won reputations for quality and excellence will be sullied by the trailer house image that the MH industry is still trying to shed. For example, the Building Systems Council (BSC) of the National Association of Home Builders, the Big Kahuna of home building trade associations, specifically excludes HUD/mod manufacturers from its 45-member roster unless, explains BSC director Jeremy Bertrand, “their modular offering is a standalone brand and built in factories dedicated to modular product only.” By this definition, Palm Harbor’s two modular lines—Discovery Custom Homes and Nationwide Custom Homes—qualify, and are BSC members.

Elsewhere, the trade magazine *Building Systems* (“the premier guide to off-site construction”) covers the modular, log & timber, panelized, and SIP [structural insulated panels] segments of the factory-built industry, but nary a hint of anything to do with HUD-code homes. “We’ve had advertisers call us,” one senior staffer told me, “asking for our promise that we will never print anything about manufactured homes.” Implicit is the threat to pull ads if the magazine should renege on its promise.

One can understand the pure modular manufacturers’ concern. From what I’ve seen, the model lines of most modular homes produced by HUD/mod manufacturers are largely upgraded HUD code homes (rarely more than three boxes) that are a couple of clicks in quality and curb appeal below the entry level offerings of pure modular manufacturers. Plus, HUD dealerships increasingly are adding modular homes to their mix of display models, and these tend to be vanilla two-box models that are similar in appearance to their HUD counterparts. Supporters of pure modular builders claim this confuses homebuyers and creates the impression that modular homes are simply more expensive variations of manufactured homes. Put another way, modulars are showing up on the likes of Cousin Billy Bob’s Mobile Home Center, undermining modulars’ reputation as a respectable segment of mainstream housing. Muddying the waters further, many HUD/mod manufacturers are turning out hybrid “hudulars”—modular code homes atop HUD-code chassis—mostly in an effort to qualify them for conventional home financing.

## **Marketing & sales —the heart of the matter**

One might take issue with the pure modular manufacturers' argument. For example, if comparing HUD and modular homes built with the same construction quality, features and options, a case can be made that there is very little difference between the two, save the requisite steel I-beam chassis beneath the sections of the HUD model. But what can't be denied is, when it comes to distribution and marketing, the HUD/mod manufacturers have a potential advantage: they have sales centers to display their modular products, and the pure modular manufacturers, with very few exceptions, don't.

And here we get to the heart of the issue. Both pure modular and HUD/mod producers agree that the #1 problem they face with modulares is marketing and sales. And the business model each has been using, while different, is flawed. Until those flaws are eliminated, and new strategies developed, the modular home industry won't take off. What follows is a brief assessment of each.

### **HUD/mod sales model**

HUD/mod manufacturers market directly to dealerships through their existing network of sales centers that are already selling HUD homes. Or, if the manufacturer owns the sale center, they market directly to the home buyer. Essentially, modulares are piggybacked onto the business model used to sell HUD homes. Looks good on paper, but in practice the implementation has been anything but smooth, for the following reasons:

- Unlike HUD homes that are 95% complete when delivered to the site, modular homes require 35%-40% of on-site construction to complete. Their engineering is more complex (hinged roofs, for starters), requiring considerably greater expertise, something that many third-party installers lack, sometimes resulting in problems and costly delays.
- Successful execution of a modular home sale and placement requires retailers to become builders: knowing the varying requirements of the local jurisdictions in which the homes are sited, shepherding the permit process, bird-dogging a host of local inspections, and finding and recruiting (sometimes training) qualified set crews, and coordinating with subcontractors. Many retailers with a drop-the-box-and-go

mindset are unable or unwilling to take on these increased responsibilities, and both the homebuyer and the manufacturer lose.

- Many potential buyers of modular homes fall outside the affordable housing consumer demographic, and they are wary of street dealerships, perceiving their products as akin to trailer homes, regardless of their code or construction quality.

One builder, Idaho-based Kit Homebuilders West, is well aware of the distribution model's shortcomings, but remains convinced it can work.

"We're staying within the retail model," says GM Mike Wolf. "Yes, we see it as a hurdle to educate our retailers about modulares, especially the new ones joining our network, but we believe they'll come up to speed. They all see the value in being able to offer a modular product. In the meantime, our staff is doing everything they can to help retailers, especially by working directly with local building departments so that we know before we put any mod home on the line that it meets all the local requirements. This way we can be sure of protecting the home buyer."

As for resolving the difficulties set-up crews are encountering with modulares, anecdotally, many retailers are resorting to training their own crews and carefully screening for qualified contractors elsewhere in their market region. Remarked one HUD/mod executive, "My guess is it's mixed. A lot of our independent retailers are winging it with their own HUD crews."

The one persistent flaw in the HUD/mod sales model is the absence of a single party accountable for the entire process, including the post-move-in warranty period. Unlike a general contractor whom one would hire to site-build a home, soup to nuts, and be held legally responsible for correcting any shortcomings if things go south, the buyer of a modular home through a HUD sales center still faces the potential of being trapped in the center of finger-pointing between the retailer, the set-crew/installer, and the manufacturer if problems arise.

In sum, real growth for the HUD/mod producers rests in correcting this flaw, significantly improving the quality of HUD/mod sales centers (in both appearance and professionalism) to appeal to mainstream homebuyers, and—need it be said?—spectacular customer service.

### **The pure modular sales models**

Unlike HUD/mod builders, pure modular manufacturers don't market to retailers (there being very few) or sell directly to homebuyers. Instead, with few exceptions, they target builder groups. The first are small builders, often general contractors (GCs), usually family owned, who build six to 15 single-family homes a year, and are often referred to as "onesie-twosie builders." These builders typically build on scattered consumer-owned lots, and they are responsible for more than 20% of the site-built homes constructed annually in the U.S. In comparison, the big merchant builders, such as Pulte and Centex, collectively account for roughly one-third of the total. The second target group is comprised of small regional builder developers who develop land for subdivisions, typically 25 to 50 homes and up, and who either build the homes themselves or sell to someone who does. Each of these target groups presents its own challenges:

### **Small builders**

On paper, convincing a onesie-twosie builder that he or she can significantly grow annual profits by offering customers modular as an option, seems an easy sell. A builder could increase the total homes built from, say, six, to eight. But virtually every manufacturer interviewed for this article agrees marketing to small builders, and retaining converts, is problematic. Among the difficulties:

- Small builders are cautious, fiscally conservative, and often biased against factory-built housing. Marketing to them is expensive, time consuming, and not especially cost-effective. Some observers believe traditional modular manufacturers have not done a good job of recruiting converts to the benefits of modular.
- Successfully finding qualified GC's, and screening out those unsuited for the responsibility, can be hit-and-miss. And the misses can hurt a manufacturer's reputation.
- Getting up to speed with the unique complexities of modular on-site work involves a significant learning curve (one to two years), a good deal of factory support, and a builder's commitment to master a new skill set.
- Small builders encounter more problems. As one manufacturer put it, "How good can he be if he's only doing one or two mods a year in addition to his site-built homes? You're just asking for problems, and they reflect badly on the manufacturer."

- Builders are prone to drop out or lose interest in modulars before getting fully up to speed, sometimes as a result of encountering on-site problems that caused delays and a resulting loss of profit.
- During even minor housing downturns, small builders are among the first affected. Many suspend operations and take other jobs. Modular factories are quickly affected.

### **DYI builders**

There exists a subset of small builders who specialize in selling modular homes but who have never been site-builders; instead, their backgrounds are in areas such as real estate and marketing. Their business model: sell and set the home (hiring a set crew), and leave the rest to willing do-it-yourself consumers who can save money by finishing the job, either themselves and/or by hiring local contractors to do the flatwork, build decks, paint, trim out interiors, etcetera. Increasingly, with variations, sales are being done this way, especially in the Northeast, and reluctantly most manufacturers are being pushed into accepting this approach.

### **Small regional builder developers**

Conceptually, the small regional builder developer who develops the land for housing (streets, utilities, and other infrastructure), then sells the land to others (i.e., large builders) who build and market the homes, is an excellent prospect for modular. As NMHC's Thayer Long explains, "The approach is, 'Mister Developer, with mods you don't have to do much more than you're doing now. You can build the homes yourself and sell them, making a significantly greater profit. You hire a staff project manager to general the project and oversee the subs who build the foundations, crane on the boxes, and finish the set-up. And you can work with a local Realtor who would do the selling and arrange the financing.'"

The principal drawback to this model is, the land developer needs to become a home builder (entailing a whole new set of investments, skill sets, and risks), while the theoretically greater profit from doing so may still not pencil out, given that the subcontractors to be hired will also need their profits.

[Aside (and outside the scope of this article): Guerdon Homes of Boise, Idaho, has successfully pioneered a different model involving very large projects in the hundred-million dollar-plus range (townhouses, multifamily dwellings, and apartments) in which Guerdon's large

in-house engineering staff works closely with the developer in the multi-year task of custom designing modules for the developer's needs.]

As for small regional builder developers who do site-build homes on land they develop, selling them on modulars is no easy walk, either.

"I can go to any sizeable builder, say twenty-five to fifty homes a year," explains Roger Lyons, CEO of Pennsylvania-headquartered Penn Lyon Homes, Inc., an upscale manufacturer of mostly large high-end modular homes, "and the first thing he'll say to me is, 'Here's how much profit I make on a home I build myself. If I buy from you, there's not enough profit for me.' I could advance a strong argument that a partnership would be profitable enough, because I can cut the overhead costs, but I can't cut his overhead if he continues site-building along with putting in mods."

Lyons, who is also current chair of the NMHC, is one of the industry's most thoughtful, articulate manufacturers. He has given the challenge facing modulars a good deal of thought.

Of the onesie-twosie small builder business model, he believes it's been a failure. "Not only is recruiting and keeping them very cost-inefficient, but we as an industry have taken the manufactured home model, where the product is 95% complete at the factory, and tried to use it in the modular industry when our homes need 35%-40% of on-site construction. And we're turning over this demanding, often complex completion work to a one- or two-man operation, to folks who don't have the knowledge, manpower or the understanding, and sometimes the commitment, to finish the job. That whole thing has got to stop. It only took me forty years to figure this out! (laughs)"

Lyons' solution: Penn Lyon now takes full responsibility to set and install the home on the foundation, then turns the building over to the builder for final trim out.

"Now, when I sell to a builder," Lyons continues, "and it could be a onesie-twosie GC, I give him the price of a home delivered and installed on his foundation. It's my responsibility to subcontract the cranes and the set crews who are certified by us. If an eight- or ten-box home, or more, is involved, we have an on-site manager there during the set to answer questions and talk directly to our engineers if needed. Our system is working well."

### **The Home Store— a template for success**



Penn Lyon Homes' move to take on greater responsibility for their homes' completion is a welcome move. One can only hope manufacturers—both modular and HUD—will follow suit. Yet, even now, another solution to the modular challenge has been quietly flourishing in the Northeast: a modular home only sales center. In 1986, Andrew Gianino, a child psychologist with an entrepreneurial flair, opened The Home Store in western Massachusetts, featuring several fully furnished modular home models from several manufacturers in an attractive setting that resembled the display models for an upscale development. Gianino created a trained in-house set crew for local placements, and developed a network of carefully screened GCs to handle sets elsewhere throughout his New England market region. Business flourished from the start.

Today, The Home Store ([www.the-homestore.com](http://www.the-homestore.com)) has grown to four sales centers (two in Massachusetts and one each in Connecticut and New York), accounting for 1,000 homes sold to date, most three- and four-box models. Currently, he sells Avis America and Manorwood homes. Gianino has also authored an excellent comprehensive consumer guide, *The Modular Home*, that warrants inclusion in the library of every professional in the factory-built universe.

Gianino agrees with Roger Lyons that getting good GC partners is a big challenge, and he is diligently hands-on with customer service. “As builders we understand there are always going to be some construction problems, and we do whatever it takes to take care of our customers. We do a lot of turn-key sales. Basically, you can take the retail price of a modular home and double it for a total turn-key package price, and for that we take full responsibility. That works well for us.”

The success of the Home Store would appear to be a template for success for both the pure modular and HUD/mod sectors of the industry.

### **The future of modular**

Consultant Fred Hallahan believes that there are distinct opportunities emerging out of the current state of the modular home industry, for both pure modular and HUD/mod manufacturers.

“In my opinion, the future of modular clearly rests on exploiting two opportunities: converting established site-builders to modular, and converting HUD dealers to builders.

“By ‘established site-builder’ I mean someone who is not necessarily a GC, but someone who deals with the financing, for both his company and his home buyers, who buys the land in

the right location, who does the marketing, and who has design offerings to offer customers. A typical scenario involves a guy or a gal—and a lot are women—in their late 30s who have entered the market with these qualifications, and they say, ‘If I can get a mod manufacturer who can give me that product 65%-70% complete, and I know it’s done right, and the manufacturer stands behind the product, I can then focus on the marketing and financing side for my home buyers.’ That’s your market for modular manufacturers. These builders are going to put money into their model homes, into decorating them, and they’ll convince buyers to buy homes from them. That is the kind of growth person the industry should look to. And there are a lot of them coming into the housing industry.”

As to the second strategy involving HUD dealers, Hallahan admits that his belief that the existing HUD code dealer base presents an opportunity for modulars is a bit controversial, at least with some in the pure mod sector.

“The key is that [HUD/mod] manufacturers have to establish parameters and standards for qualifying HUD dealers the same way they would for the builder candidates. These dealer candidates have to be growth focused, they have to be sufficiently capitalized, they have to have marketing and financial discipline, and they have to make a strong commitment to convert. And last, their design offerings must have market appeal. They can’t be plain Jane ranch homes or multi-section homes. Their designs must be close to the local customer preferences, including such things as on-site remodels, add-ons, window treatments, dormers, side-gable overhangs, and other aesthetic touches.”

Hallahan estimates only a small percentage of HUD dealers would be willing and qualified to make the transition to modular builder status, but the potential impact of hundreds of modular dealer/builders would be significant. “Take the Carolinas, for example, where a number of these conversions are already happening. Savvy dealer/builders are aware of the growing consumer demand for modular product, and manufacturers are responding. What you’re seeing is marketplace feedback that is very healthy.”

It’s ironic that the early challenge to modular building—developing the engineering know-how to build modulars efficiently—has long been resolved, yet bringing the product to market should prove to be so vexing. But, if The Home Store and the suggested strategies of Fred Hallahan, Thayer Long, and Roger Lyons are any indication, resolving successfully the modular challenge is only a matter of time.

“We don’t have a complete solution right now,” says Lyons, but in five years I guarantee you that Penn Lyon Homes will be operating entirely differently than we are today....The beauty of this modular industry is, it’s still so young and so up and coming, that all we need to do is solve the minor problems, and it will take off.”