BY TED CUSHMAN


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A Craftsman-Style Front Porch

Since last winter, *JLC* has been following a construction team from Thompson Johnson Woodworks in the coastal community of Peaks Island, Maine, a mile from shore in the Portland harbor, as the crew has carried out a whole-house energy-efficient gut-rehab job on an aging vacation house. In a series of online stories and slideshows, we've focused mostly on framing, insulation, airtightness, and the exterior water-managed rainscreen system. The energy overhaul was comprehensive, turning the leaky old building into an airtight example of modern building science that can be heated with a pair of mini-split heat pumps.

But as the job neared completion, all those high-performance details got covered up. Now, all you can see is the siding and trim—and while those details may not make the dwelling cheaper to live in, the curb appeal they add can certainly boost the property's value.

TAPERED COLUMNS

In July, we dropped by the job to see carpenters Mark Pollard, Shane Fenton, and Dale Cunningham add some finishing touches to the home's front porch. They wrapped the pressure-treated 6x6 structural porch columns (which support an upstairs front room) in a trim package designed to recall the look of a traditional Craftsman home of about 1915, the year the house was originally built—but using materials updated for the 21st century.

The upper portion of the column wrap is a tapered surround built out of four flat faces ripped with a track saw and nailed together at the column corners with stainless steel nails. The inside dimension of the tapered box is ⅛ inch larger at the upper end than the 6x6 structural post, to allow for possible shrinkage and swelling in service.

Photos: Ted Cushman


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The top end of the build-out isn't nailed to the post, but tacked into the soffit above so that the structural post can move freely. At its lower end, the tapered box-out is fastened to pressure-treated wood blocks attached to the post, but only on the two faces where the railings are attached—again, to allow the box some freedom to move with changes in the weather.

The lower section of the column is built out in the form of a simple vertical box made with pressure-treated 2x4 lumber and plywood **(1)**. The crew wrapped the 6x6 post with 2x4 blocking, then attached vertical 2x4s over the blocks—connecting the upper and lower rings of blocking—and finally fastened the plywood to complete the box-out.

Over the plywood, the crew attached the same MortairVent rainscreen back-ventilation fabric that they had previously used to create a breathing space under wood shingle siding on the home's upstairs dormers **(2)**. The fabric creates an air space that promotes drying for the factory-primed and factory-stained shingles, and helps to extend the service life of the paint job. The carpenters nailed solid wood blocking to the boxes at locations where the lower railings would be attached **(3)**.

Next, the crew shingled the plywood boxes with pre-primed and pre-stained white-cedar shingles up to a horizontal mid-height plinth—which Pollard calls a "shingle base cap"—made of clear red cedar 2-by stock.

The process of shingling the boxed-out base was no different from shingling four very short house walls: The carpenters tacked strips onto the boxes to keep each course straight and level **(4)**. At corners, they scribed the back of each shingle for the matching tapered cut **(5)**. If the cut was not quite perfect, they shaved the shingle edge in place with a razor knife **(6)**.

RAILING AND BALUSTERS

Now it was time to build the railing and baluster assembly. The upper rail would connect to the side of the mid-height plinth at the top of the column base box, and the lower railing would fasten through the


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shingles into the previously installed blocking attached to the plywood box. Project lead Mark Pollard started by finding and marking the center of the red-cedar shelf.

Pollard cut the top rail (also clear red cedar) with a miter saw **(7)** and fit it into position, holding the end in place with a clamp **(8)**. Then he cut and temporarily positioned the lower rail **(9)**, setting the rail on some blocks and shimming it up to fit underneath the second course of shingles.

With top and bottom rails temporarily positioned, Pollard measured and test-fit a piece he calls the "sub-top rail." He would use the sub-top rail, along with the bottom rail, to assemble a whole set of balusters on the bench.

Next, Pollard found the center of the top rail, and plumbed down from that point to transfer the center marking to the bottom rail **(10)**. His balusters would be laid out from this center point for a symmetrical finished appearance.

Now, Pollard could permanently fasten the top railing into place, and use the sub-top rail and the bottom rail to preassemble the rest of the railing and baluster system. He primed the end of the top rail with spray primer, then screwed the top rail to the shingle base cap plinth using 3-inch #8 stainless steel screws **(11)**.

Next Pollard set about assembling the baluster and railing section. Starting from his previously determined center point, he laid out marks for the balusters on the bottom rail at a 3¾-inch edge-to-edge spacing, as required by code (the space between balusters cannot exceed 4 inches). Then he predrilled pilot holes for screws, set a 3-inch #9 stainless steel screw in each hole, and screwed the balusters onto the bottom rail from the underside of the railing **(12)**.

A purist, Pollard notes, might argue that the baluster spacing should be adjusted so that the space between the last baluster and the shingled column base was equal in width to the space between the balusters themselves—or, perhaps, to half the baluster spacing. Pollard was content with an end spacing of about 2 inches between the end baluster and the column.

Next, Pollard fastened the top end of each baluster to the sub-top railing, attaching the rail to the end of the balusters with three pneumatically driven 15-gauge stainless steel nails **(13)**.

Now Pollard could set the entire baluster system with the bottom railing and the sub-top rail into place under the already-positioned top railing. He shimmed the whole assembly up tightly against the upper railing **(14)**, then fastened up through the sub-top rail into the top railing using 1½-inch #7 stainless steel nails **(15)**.

Finally, Pollard attached the bottom rail to the posts with 3-inch #8 stainless steel screws **(16)**, and the job was done.

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