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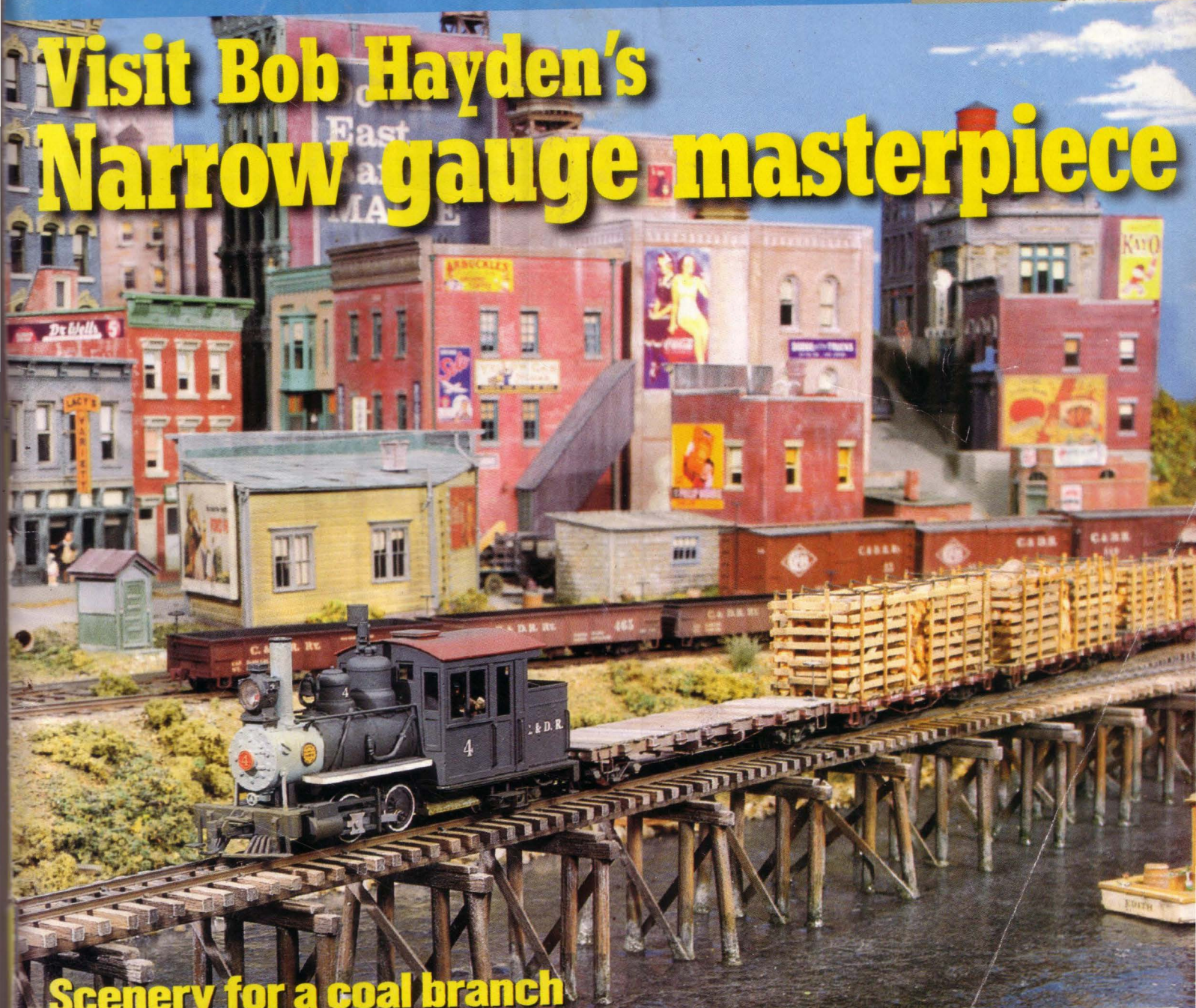
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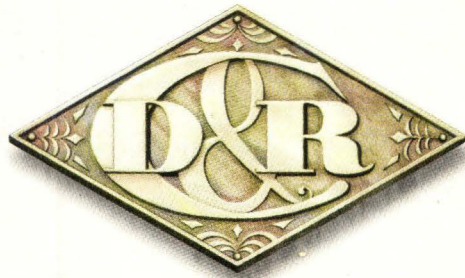
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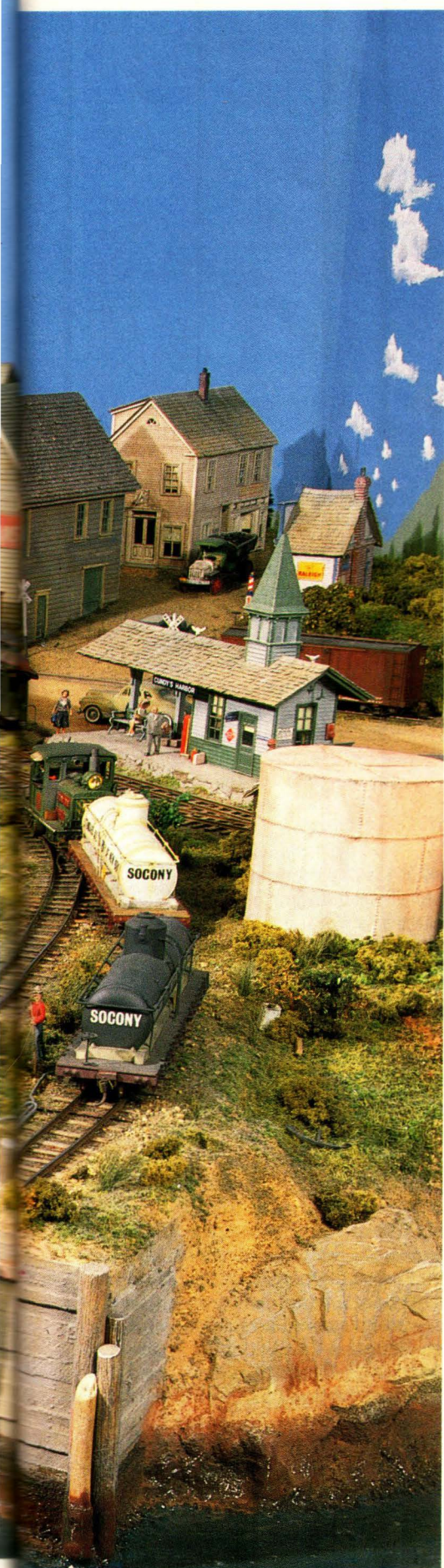
1. Cundy's Harbor is the terminus of a short, dead-end branch out of Lower Kennebecport. All of the Carrabasset & Dead River's diesel fuel comes ashore here, and the town's seafood industries account for a few carloads in and out.



The Carrabasset & Dead River finally makes it to tidewater

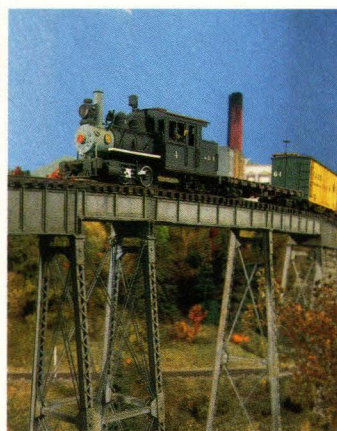
25 years of modeling Maine two-footers in HO_n2¹/₂

By Bob Hayden
Photos by Dave Frary



The most gruesome wreck my railroad ever had happened in, of all places, the Atlantic Ocean. The event was possible because the port town of Lower Kennebecport includes a stretch of track where two lines cross on a long pile trestle in the harbor. Back in 1906, decades before I became superintendent, a passenger train parked on this trestle was cut in two by a switching run. Six passengers drowned, and to this day, in fall 1941, the Carrabasset & Dead River Ry. employee timetable declares in no uncertain terms that no train can pause on the Lower K crossing for more than one minute.

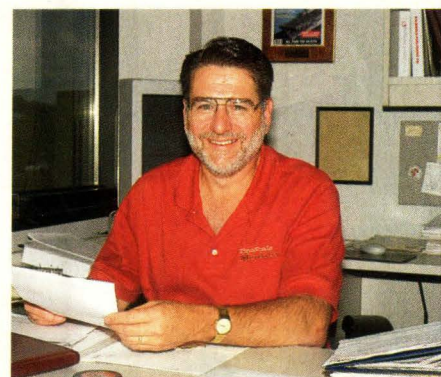
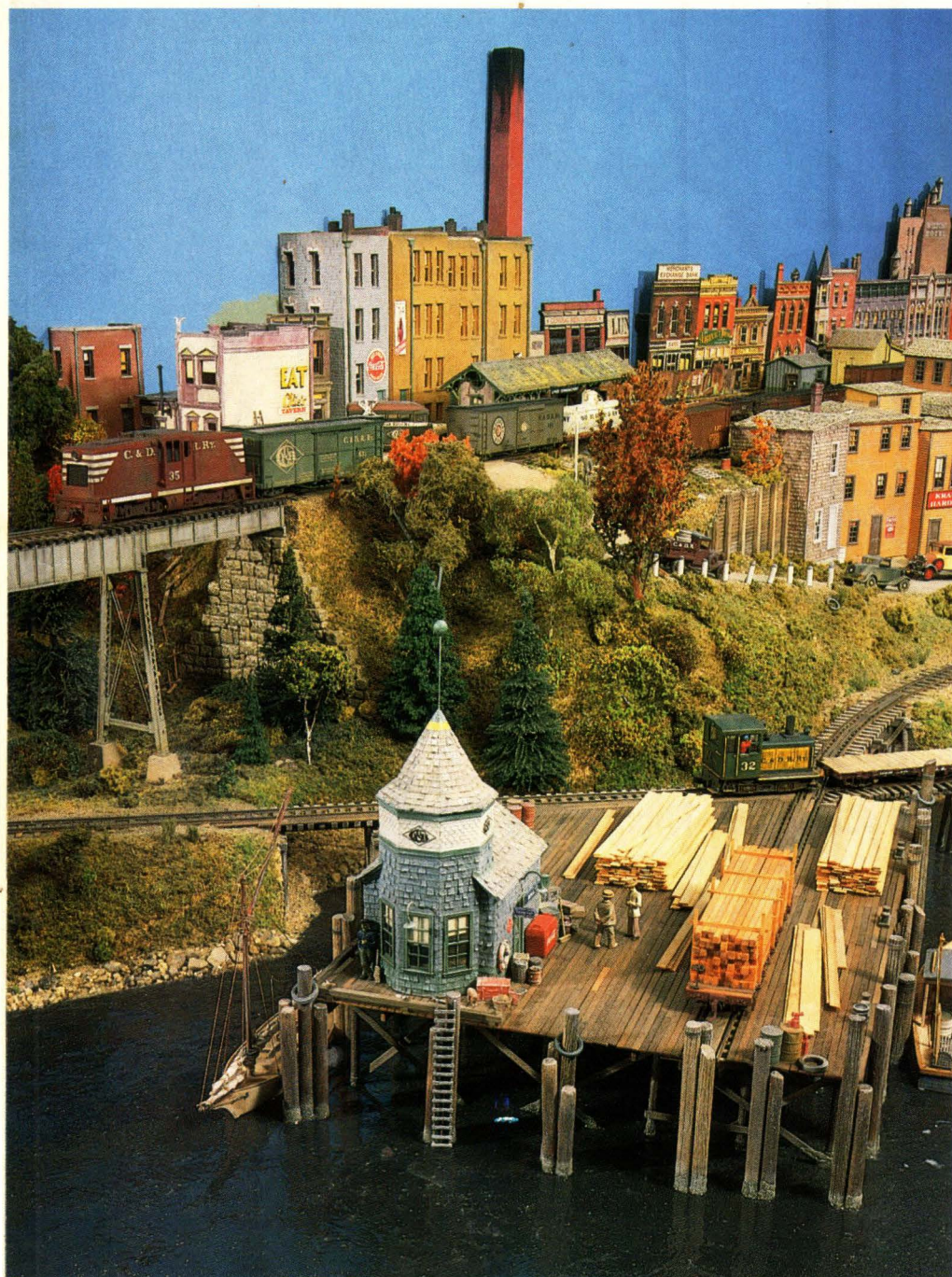
How both the main line and spur tracks came to be on expensive trestlework has everything to do with follow-



2. The high curved steel viaduct that connects Upper Kennebecport to North Freeman is the road's longest bridge. Here Forney no. 4 starts a mixed train out of Upper K.

ing the lead of one of the HO_n2¹/₂ C&D&R's prototypes, the two-foot gauge Wiscasset, Waterville & Farmington. That road's predecessor, the Wiscasset & Quebec, began building north from the harbor at Wiscasset, Maine, in 1894, many years after the standard gauge Knox & Lincoln had come up the coast, gobbling all of the valuable harbor acreage. The W&Q had no choice but to build more than a mile of its line out over the tidal flats, establishing some of the most photogenic waterfront railroading anywhere.

Actually, my C&D&R developed exactly opposite from the W&Q, which began on the Atlantic and headed inland. The C&D&R began as a timber-hauler in the mountainous interior of the state, then headed for the ocean to



Meet Bob Hayden

Bob has been a model railroader for 40 of his 51 years and a narrow gauge fan for 35. He's written model railroading articles since 1964, often in collaboration with Dave Frary. Bob joined Kalmbach Publishing Co. in 1977 after an eight-year stint as an officer in submarine service with the Navy. Bob was the founding editor of *FineScale Modeler Magazine* and has served as editor since 1982.

Along with trains, Bob's other interests include golf, watching ice hockey, traveling, reading, and driving his 25-year-old Triumph TR6 – but only with the top down.

◀ 3. The C&DR's lumber wharf at Lower Kennebecport features a freight office based on a Wiscasset, Waterville & Farmington structure at Wiscasset. Because dust tends to collect on the shiny gloss medium water surface, the planked deck of the wharf, including the building, is removable for cleaning. The Upper Kennebecport depot is a transplant from the first C&DR layout in Dave Frary's basement. It's been moved close to a thousand miles from its original foundation!

re-create the W&Q scene. From concept to completion, that notion took me almost 25 years to realize.

A model railroad with its own history

This layout is the second to carry the C&DR name. I began with the concept of modeling all the Maine two-footers on one layout way back in 1972, and started the first layout in a rented garage in San Francisco. Never finished, that railroad was taken apart, loaded into (and on top of) a Dodge van in 1973, and driven across the continent to a Boston suburb where Dave Frary and I reassembled what was left of it in his basement.

Many photos of the first C&DR have appeared in Dave's books on scenery and detailing, and the layout was featured in a two-part article in the November 1979 and February 1980 issues of *MODEL RAILROADER*. Although that railroad has since been dismantled, it explains why both namesake towns of Carrabasset and Dead River on this C&DR are off-layout destinations: When I started this layout in 1979, Dave's C&DR was still up and running, and both towns were modeled on it.

The layout is HO_N2½ – HO scale, but with N gauge track (see the sidebar on page 62) and fills the basement of my home – more than fills it, to tell the

truth. The design is around the walls with walkaround control, and to make the most of the space the main line passes through most scenes twice, usually on a high track and a low track. There are a couple of tunnels (the prototype had none) and a couple of high steel trestles that I adapted from three-foot-gauge prototypes because I like their spidery look.

Traffic on the C&DR

So what does this C&DR do? Like the largest of its prototypes, the Sandy River & Rangeley Lakes, the railroad hauls wood – both as raw material and finished goods. There's pulpwood



The Carrabasset & Dead River Ry.

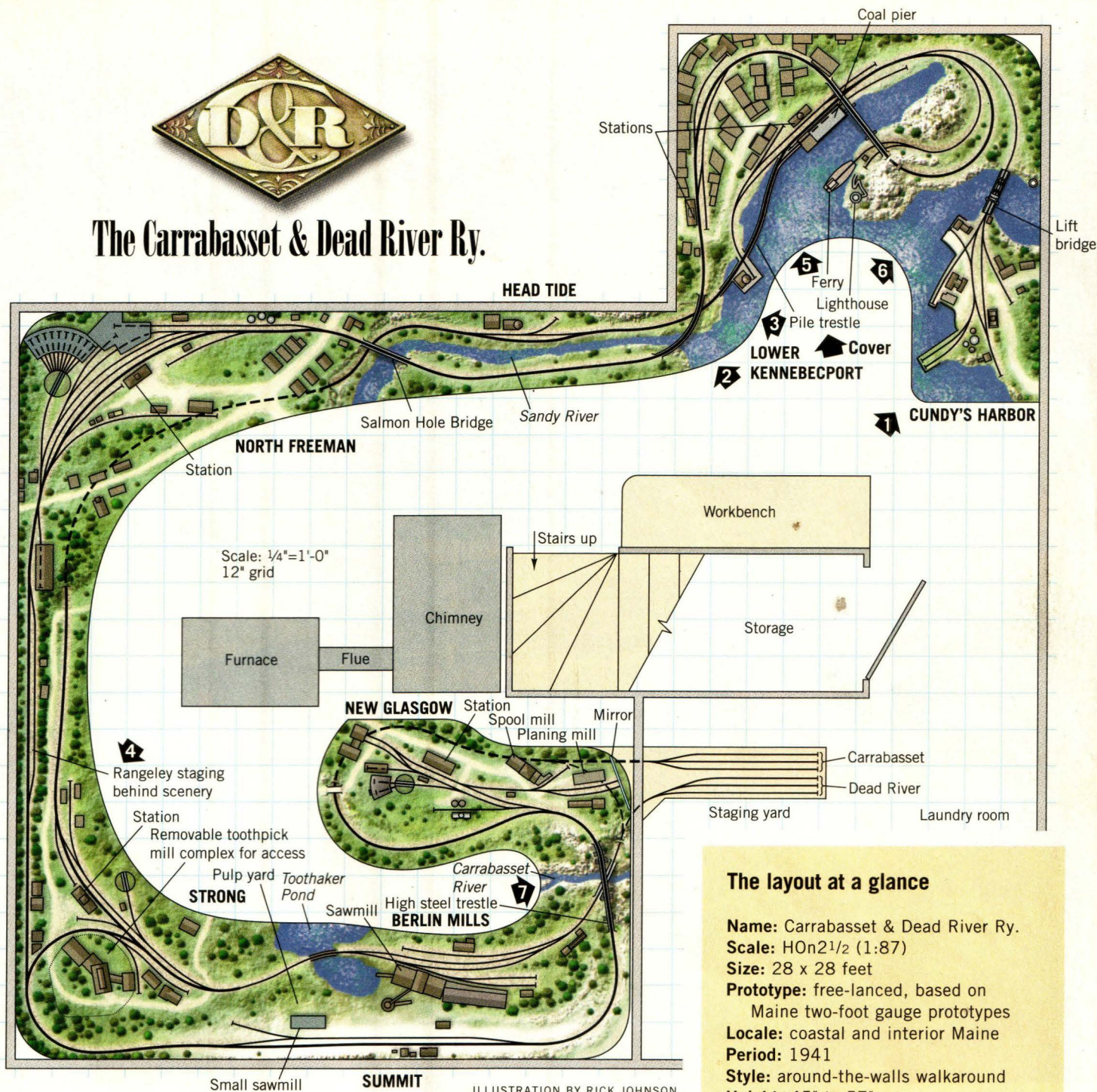


ILLUSTRATION BY RICK JOHNSON

headed for paper mills down south and long lumber moving to on-line mills. The big bandsaw mill at Berlin Mills on the Dead River branch turns out hundreds of thousands of board feet of lumber each year, much of which heads to tidewater for transshipment. Two turning mills at New Glasgow generate box-car loads of spools, broomsticks, bobbins, and ax handles, and the toothpick mill at Strong is a big customer.

Coal moves six days a week on the C&DR, heading out of the waterfront bunker at Lower Kennebecport in both directions. In addition to fueling the road's steam locomotives, it's delivered to on-line customers, including the ply-

wood mill at Carrabasset. Kerosene, diesel oil, and gasoline come ashore from coastal tankers at Cundy's Harbor, and the C&DR's tank car fleet moves the fuel inland.

Passengers are still big business. Unlike its five prototypes, which declined in the 1920s and 30s as a result of automotive competition and the Great Depression, the C&DR is still a going concern, with plenty of passengers riding the crack *Rangeley Express*, other regularly scheduled passenger trains, mixed service, and railbuses. This may not be historically accurate for 1941, but after all, I'm the one making this up.

The layout at a glance

Name: Carrabasset & Dead River Ry.

Scale: HO_n2 1/2 (1:87)

Size: 28 x 28 feet

Prototype: free-lanced, based on Maine two-foot gauge prototypes

Locale: coastal and interior Maine

Period: 1941

Style: around-the-walls walkaround

Height: 45" to 57"

Benchwork: L girder

Roadbed: 1/2" Homasote on 3/4" plywood subroadbed

Track: handlaid where visible, flextrack in tunnels and staging (codes 55, 60, and 70)

Turnout minimum: no. 5

Minimum radius: 18"

Maximum grade: 3 percent

Scenery construction: cardboard web with plaster hardshell or plaster cloth base and Hydrocal plaster and Sculptamold top layer

Backdrop: Upson Easy Curve on plywood formers

Control: walkaround cab control



The route around the basement

The main line runs from Carrabasset, a hidden three-track staging yard, through New Glasgow, Summit, and Strong, where all over-the-road trains must execute an end-swap and reverse direction. The run then continues through Head Tide, Lower and Upper Kennebecport, and the big yard at North Freeman before tying up in the staging area at Rangeley.

There are two short branches. One splits off the main just to the right of Lower Kennebecport and runs to Cundy's Harbor. The run out to Cundy's is only about 10 feet, but it gives me the chance to model a second waterfront

scene. (For some strange reason the tide is low at Cundy's Harbor, but high at Lower Kennebecport, which is only four feet away!)

The second branch leaves the main to the left of Strong and serves Berlin Mills, the road's biggest sawmill operation. Continuing to the left over the Carrabasset River, the branch dives into a short tunnel and emerges at Dead River, another three-track staging yard. Two cutoff tracks, one to the left of Rangeley and another that bypasses the staging at Carrabasset and Dead River, allow the railroad to be run as a 165-foot display loop, which, in fact, is the way it operates most of the time.

Rolling stock and some tricks

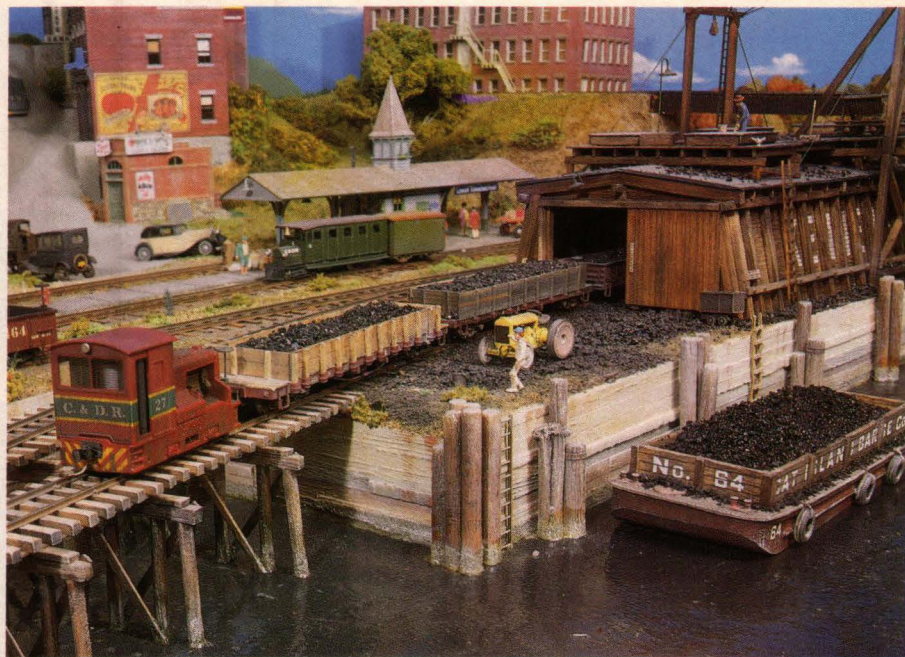
The C&DR rosters about a dozen locomotives and around 115 cars. While HO $\frac{1}{2}$ equipment and kit releases are far from commonplace, over the past 30 years I've built most of what has been offered, and the roster is only about half scratchbuilt or kitbashed. I particularly enjoy building passenger and freight cars, so much so that in recent years I've had to remove older cars from the layout as I added new, better ones. Some of them, less trucks and couplers, become lineside sheds, just as on the prototype two-foot roads.

Some C&DR rolling stock has no counterpart on the prototype roads. The



▲ 4. Strong is the C&DR's major junction, where the main line to Carrabasset and the branch to Dead River diverge. The *Rangeley Express* has just come down from Summit on the line that runs from right to left across the front of the toothpick mill in the upper left of the photo.

diesels are based on the supposition that a road as successful as the C&DR could have adopted them by 1941, and the fleet of steel gondolas that carries most of the coal is based on a similar myth. Ten boxcars share dimensions with a class of B&SR cars, but they're sheathed in plywood, not matched boards, and painted green, not red.

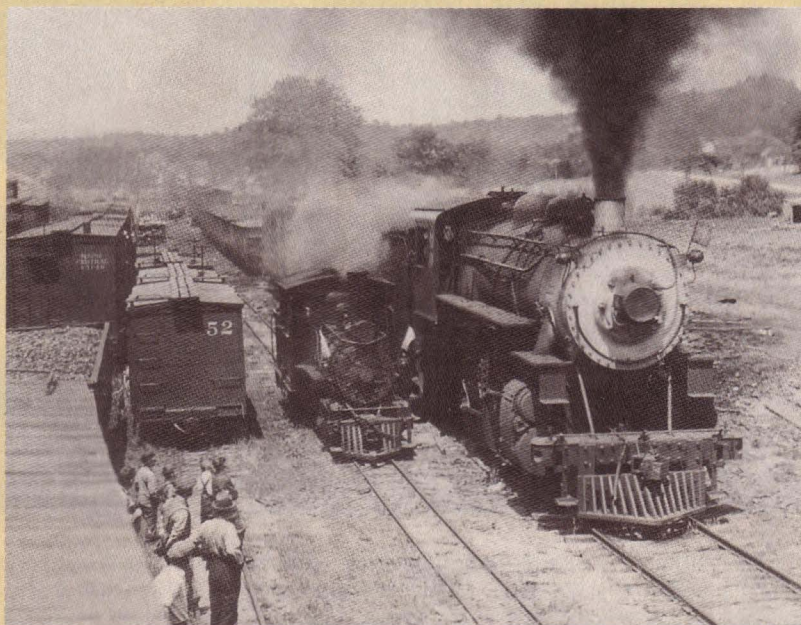


▲ 5. Tiny switcher no. 27 works the Kennebec Coal Co. transfer bunker on the Kennebecport waterfront. Railbus no. 4, parked at the Lower K station, provides the only passenger service to and from Cundy's Harbor, a twice-daily run to Strong and return. The coal bunker is based on structures at Randolph, Maine, where oceangoing ships unloaded coal into cars of the Kennebec Central RR. The KC served a large soldier's home at Togus, Maine.

▼ 6. Diesel no. 34 rolls a North Freeman-bound freight up the 3 percent grade between Lower and Upper "K." When the train has rumbled through the short Great Head tunnel and across the harbor bridge, the lobsterman can get back to making a living from the sea.



HON2¹/₂: MODELING THE MAINE TWO-FOOTERS WITH N GAUGE TRACK



Maine's two-foot-gauge railroads juxtaposed little trains with big people. Here, at Bridgton Junction, Maine, sometime in the 1920s, Bridgton & Saco River no. 5 looks like a puppy up against Maine Central 2-8-0 no. 510 – a small standard gauge engine! And look at the difference in track gauge: 24" versus 56¹/₂".

The 24"-gauge lines of northern New England comprised, at best, an obscure footnote to the sweeping transcontinental history of North American railroading. But these little railroads were just as interesting as they were obscure.

The era of common-carrier two-foot-gauge railroading in Maine lasted from 1879 until 1943, and although lines were renamed and consolidated, there were five operations in all. The shortest, the five-mile Kennebec Central, hauled supplies and visitors to a National Soldiers' Home; the longest, the Sandy River & Rangeley Lakes, funneled lumber, pulpwood, and manufactured wood products over more than 100 miles of main line and branches.

The other three fell somewhere in between. The 44-mile Wiscasset, Waterville & Farmington began life as the Wiscasset & Quebec, with a grand scheme to link a year-round Maine seaport with the Canadian province. The Bridgton & Saco River came in just short of 21 miles long, and from 1883 to 1941 shuttled freight and passengers back and forth from a junction with the Maine Central. The northernmost of the lines, the Monson RR, served even longer – 60 years – moving slate eight miles from quarries and finishing plants to the Bangor & Aroostook's Greenville branch. When it ceased operation in 1943 it still had 30-pound rail, stub switches, hand brakes, and link-and-pin couplers.

The Carrabasset & Dead River mixes HO scale and N gauge to model the two-foot-gauge railroads of Maine. That makes the rails a scale 30" apart – 2¹/₂ feet. This scale and gauge combination was invented in Europe in the early 1960s, shortly after N scale appeared. The first product lines available in the states were Egger-Bahn, Lilliput, Jouef, and Associated Hobby Manufacturers' Minitrains. When Minitrains came out I was trying to model in HOn2, which meant scratch-building everything. An extra 6" between the rails seemed like a reasonable compromise to be able to buy locomotives and cars off the shelf.

Since those early days several companies have offered kits and parts for HOn2¹/₂ models, and there have even been a handful of brass engines imported from Japan and Korea.

Basic information on HOn2¹/₂ modeling and products, plus links to related sites and a mailing list, is available on the Internet (home.powertech.no/jr/HOn30.html). – Bob Hayden



▲ 7. Modeled after Lobato Trestle on the Cumbres & Toltec Scenic Ry., this bridge is one of the C&DR's scenic highlights. Here Forney no. 4 rolls a Carrabasset-bound passenger train across the Carrabasset River.

With the railroad's heavy grades – 3 percent – most of the trains are pulled by the diesels, which, just like their standard-gauge counterparts in every model railroad scale, are powerful and sure-footed. However, adding a half dozen steam locomotives to the roster is my current major project; the first of them, no. 4, shows up in several of Dave Frary's photos.



The tiny Forney locomotives that most typified the prototype two-foot roads present a real problem for pulling even medium-length trains on HO_n2½. An 0-4-4 tank engine like no. 4 has a boiler about the diameter of a felt-tip pen, which doesn't leave much room for weight. And, the wheel arrangement combines four powered drivers with an unpowered trailing truck on the same frame, which is roughly the equivalent of running an N scale diesel with one truck disconnected.

Because the Forneys won't pull much of anything, I've begun to build powered cars to provide the muscle for

long trains. Although I'm sure more serious modelers cringe at the thought, when little no. 4 rolls a 14-car train across the trestlework at Lower K, I'm inclined to enjoy the action, even if it is an illusion.

The C&DR approach

This somewhat cavalier (okay, let's call it "relaxed") attitude toward strict prototype accuracy is a big part of what keeps the C&DR enjoyable for me. While researching the prototype roads has been part of my modeling since 1963, I like to think of it almost as a separate hobby. I maintain extensive

files of photos, plans, and books, and those files find their way down to my basement workbench only when it's time to start a new model.

So the second Carrabasset & Dead River echoes and evokes the scenes, equipment, and operations of all the Maine two-footers. But instead of modeling just one of them, I can draw on the character of all five and seek to establish a character for the C&DR that's uniquely its own. As for that dangerous trackage over the Atlantic at Lower K, well, the C&DR learned its lesson back in 'ought-six, and the road has had smooth sailing ever since. ☐