

## Small can be spectacular See how two compact layouts pack in detail, operation p. 36, 44



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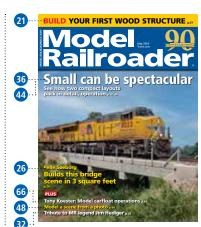
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Pelle Søeborg photo



#### **Next issue**

In June, Tony Koester animates a Tichy water tower, we visit the Sierra Railroad in Japan and a BN layout set in the northwest, share subway modeling tips, and more!

Model Railroader (USPS 529-810, ISSN 0026-7341) is published monthly by Kalmbach Media Co., 21027 Crossroads Circle, P.O. Box 1612, Waukesha, WI 53187-1612. Periodicals postage paid at Waukesha, Wis., and additional offices. POSTMASTER: Send address changes to Model Railroader, P.O. Box 850, Lincolnshire, IL 60069. Printed in USA. Canada Publication Mail Agreement # 40010760.

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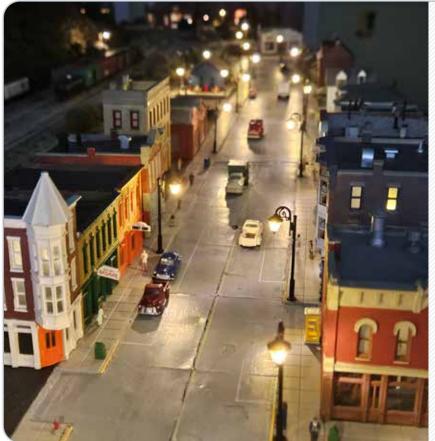


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#### **Spaces to Places V**

Gerry Leone's Spaces to Places rolls on! He's back to build out yet another section of his Bona Vista HO scale model rail-road. But first he shares quick insights on how he finished of a small portion of scenery just outside the city limits of Westcott. Then he's 'Back on Track' for laying down the rails and roads for a part of the layout that combines a dramatic highway underpass and and sweeping mainline curve! Be sure to follow along with Gerry's efforts in this and the next few videos to see how the site transforms from a simple space to an amazing places! Using a smartphone camera or tablet, scan the attached QR code to watch this episode and the rest of this new Spaces to Places series.



#### **Built by Others: Mike Tuminella's PRR Line**

The Georgia Southern layout originally appeared in the April 2001 issue of *Model Railroader*. Mike Tuminella converted the layout to N scale to better fit the space he had available and made adjustments according to his interests as a model railroader.

One of these adjustments was a space adjustment. While the original Georgia Southern was an 8 x 8-foot square with a center opening, Tuminella's layout would only be a 4 x 8. The theme would also change from Georgia Southern to the Pennsylvania RR from Emporium to Benezette, Pa., in the 1950s.

This freelanced section of the Pennsylvania RR offers plenty of operations. Interchange traffic, passenger trains, local switching, and through freights are all on the schedule. And for those days where he just wants to watch trains run, the layout can be run as a continuous loop. Follow along with this new Built by Others story, only on Trains.com.

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#### Remembering JDH

#### As most of you have heard

by now, longtime Model Railroader Senior Editor Jim Hediger passed away on February 9, 2024. He was a member of the staff for 43 vears, and his HO scale Ohio Southern was one of the first — if not the first — practical examples of a double-deck model railroad.

Readers shared their memories of Jim on our website and Facebook page in the days following his passing. It quickly became clear the impact Jim had on not only MR, but the model railroading hobby. The Jim that the public enjoyed was the same Jim we were fortunate enough to work with on a daily basis.

When I joined the MR staff in 2002, Jim was already a well-established name in the hobby, entering his 30th year with the magazine. Jim, or

JDH as we called him, took a wide-eved 22-year-old under his wing and helped me learn the ropes of the magazine and the hobby.

Since I was too young to rent a car in my early years with MR, I often accompanied veteran employees on road trips. One of my first was with Jim to visit John Underhill's HO scale River Bend & Eastern RR in Granger, Ind. There, Jim walked me through the steps of layout photography.

During conventions and trade shows, Jim introduced me to key figures in our hobby. Former MR Editor Linn Westcott had done the same for Jim 30 years earlier.

**Shortly after I shared** word of Jim's passing with former Kalmbach employees via e-mail, responses came pouring in. A common remembrance was Jim's kindness

and sincerity. I was fortunate to be on the receiving end of that several times.

I moved to Waukesha, Wis., about a month after I graduated from college. My closest family was 500 miles away. Jim would regularly invite me into his office to see how I was doing and talk for a few minutes. It was a simple act, but one that meant a lot.

I fondly remember our Tuesday night trips to the Mullet River & Southern Ry. hobby shop in Plymouth, Wis., about an hour north of MR's Waukesha offices. We'd usually stop at KFC for a quick bite to eat before we head downtown to see what was new at the store.

I'm sure many of Jim's friends, co-workers, and industry associates have similar stories. When Jim retired in 2015, we wrote in the Kalmbach Publishing Co.



newsletter, "It's unlikely that anyone will ever equal Jim's contributions to Model Railroader magazine. Our staff, past and present, and the tens of thousands of readers he has touched in one way or another during the past four decades, are fuller and richer hobbyists because of Jim." I'll second that opinion. Thank you, JDH!

Cooy Lines

## Model railroading is fun!

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We welcome contributions from readers, including articles, photographs, and drawings. For more information on submitting material, e-mail Editor Eric White at ewhite@kalmbach.com. Model Railroader assumes no responsibility for the safe return of unsolicited material. We assume unsolicited material is intended for publication by Kalmbach Media unless otherwise noted. We assume letters, questions, news releases, and club news items are contributed gratis.

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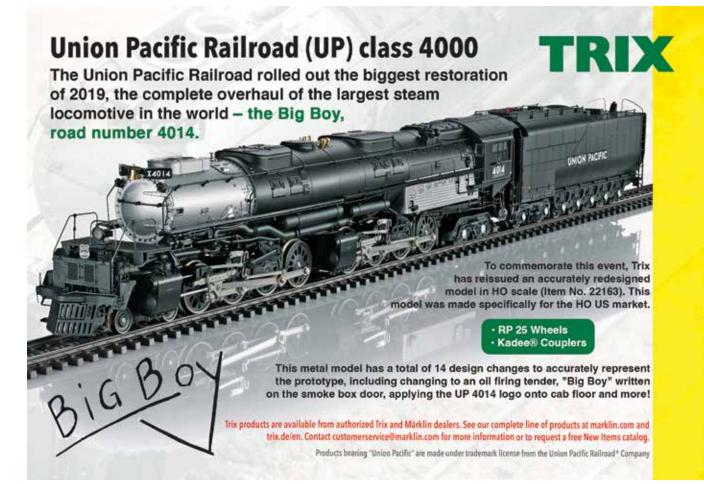


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Krauss-Maffei ML-4000 diesel locomotive. This distinct diesel-hydraulic locomotive is available from PIKO America decorated for Southern Pacific in three road numbers. The model features period-specific details, etched-metal fan grills, wire grab irons, and cab interior. Light-emitting diode

lighting functions include class lights, Gyralites, cab interior, and engine room. Direct-current models sell for \$279.99. Sound-equipped models with a PIKO SmartDecoder XP 5.1 retail for \$399.99. Add \$10 for the three-rail version. PIKO America, 619-280-2800, piko-america.com

#### A record year for Amherst

With 22,657 attendees on Saturday, Jan. 27 and an additional 3,500 new attendees on Sunday, it's safe to say that the Amherst Railway Society's Railroad Hobby Show was the place to be for model railroaders this winter. Saturday's numbers were a record for the show, held at the Eastern States Exposition fairgrounds in West Springfield, Mass.

A large draw for the show were the new releases announced by various manufacturers. This was my first time at the two-day show, and that was something I was looking forward to.

Once the large crowd around the combined ScaleTrains and Virtual Railfan booth subsided, we were able to see the newest announcement from its HO scale Rivet Counter line, the Electro-Motive GP40 diesel locomotive. The four-axle unit, scheduled for release in December 2024, is offered decorated for Chicago & North Western, Penn Central, and four other roads.

Another ScaleTrains announcement that's now available for pre-order were the HO scale Rivet Counter CSX General Electric ES44 locomotives painted in the road's new heritage paint schemes.

Broadway Limited announced a new Pennsylvania RR five-car passenger set in three variations as well as a new membership. The Conductor's Club offers members an exclusive HO and N scale locomotive offering, additional warranty



Bachmann's new HO scale SCV-42 Charger locomotive was one of many new models on display at the 2024 Railroad Hobby Show. More than 26,000 people attended the two-day show in West Springfield, Mass. Bryson Sleppy photo

coverage, member-only gatherings, VIP product suggestion panel, BLI outlet store discount, and more.

Tangent announced and sold its new Pullman-Standard 3,400-cubic-foot-capacity quad coal hopper. By the time I finally made it to the booth by midday Saturday, almost all of the hoppers were sold out.

Speaking of hoppers, ClassOne-ModelWorks announced its newest model available for preorder, the American Railcar Industries 5200 three-bay covered hopper. The model, with road-specific loading hatch configurations, is available in eight road names with up to six road numbers per scheme.

And of course, what's a large train show without an announcement from Rapido? The company unveiled four new products throughout the weekend, the Electro-Motive Division FL9 diesel locomotive, Pacific Car & Foundry 5241 "Berlin Mills" boxcar, Pennsylvania RR G22 gondola, and the relaunch of the Canadian National H-6d/g 4-6-0 steam locomotive. Rapido also had samples of some upcoming products, including the Metra gallery commuter cars.

My first year attending and covering the show was an outstanding experience, and I can't wait for next year. You can check out our full coverage of the show on Trains.com. — *Bryson Sleppy* 

#### **IHO scale locomotives**



• Electro-Motive Division FL9 diesel locomotive. Penn Central, Connecticut Department of Transportation, Conrail, and Metro-North Commuter RR. Multiple road numbers per scheme. Morrison-Knudsen or Chrome Crankshaft body details. HEP rebuild and steam generator version as appropriate. Direct-current model, \$239.95; with DCC and sound, \$349.95. Rapido Trains Inc., 905-474-3314, rapidotrains.com



• General Electric 44-ton diesel locomotive. Amtrak; Atchison, Topeka & Santa Fe; Baltimore & Ohio; Strasburg RR; and Union Pacific. One road number per scheme. Factory-applied grabirons, uncoupling levers, and windshield wipers. Digital Command Control and sound. \$399.99. Bachmann Trains, 215-533-1600, bachmanntrains.com



• Lima Class D 4-truck Shay geared steam locomotive. Greenbrier, Cheat & Elk; Carolina & Northwestern; Chesapeake & Ohio; Mower Lumber Co.; Norfolk & Western; Red River Lumber; Southern Ry.; and Western Maryland. Also available painted black but unlettered. Multiple road numbers available. Operating smoke unit. Direct-current model, \$499.99; with DCC and sound, \$599.99. Broadway Limited Imports, 386-673-8900, broadway-limited.com

#### **HO scale freight cars**



• Pullman-Standard 3,400-cubic-foot capacity quad coal hopper. Bessemer & Lake Erie. Multiple road numbers.



Trinity 7,883-cubic-foot capacity mechanical reefer. ScaleTrains recently released this contemporary 82-foot car decorated for Burlington Northern Santa Fe. The Rivet Counter line model is offered with Carrier and Thermo King (early and late) refrigerator units as appropriate, metal grab irons, and 100-ton trucks with rotating bearing caps. Non-sound models are priced at \$54.99. Sound-equipped models with an illuminated control panel, track powered capacitor unit, and adjustable volume are \$89.99. ScaleTrains, 844-987-2467, scaletrains.com

Also available undecorated. Railroadspecific details including Ajax brake wheel housing and flood-style coal load. Factory applied wire grab irons and uncoupling levers. Separate, flexible rubber air hoses. Detailed draft gear box and 100-ton Barber S-2 trucks with "Brenco-6" rotating bearing caps. \$59.95. Tangent Scale Models, 828-412-3886, tangentscalemodels.com

#### **HO** scale passenger equipment



• Pennsylvania RR heavyweight five-car passenger set. 1930s, late 1940s, and 1950s. One set of road numbers per era. Separately applied details including hand rails and antennae where applicable. Detailed, painted, and lighted interiors. Underbody detail. Sprung diaphragms. 18" minimum radius. \$449.99. Broadway Limited Imports, 386-673-8900, broadway-limited.com

#### N scale locomotives



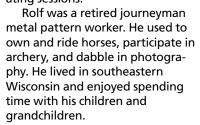
• Electro-Motive Division SD40-2 diesel locomotive. CSX; Atchison, Topeka & Santa Fe; Burlington Northern; Chessie System/Baltimore & Ohio; Chicago & North Western; Conrail;

#### In Memoriam

#### **Ralph Plachter**

Rolf Plachter died on February 19, 2024.

Rolf began building his Midwest Lines
HO scale layout in
1966. During the past
58 years he expanded it six times to a footprint of 33 x 52 feet. The model railroad, originally built to share with his sons, regularly hosts operating sessions.



You can learn more about the Midwest Lines in the December 2020 issue of MR. A video tour of Rolf's HO scale model railroad can be found in the Layout Visits section of Trains.com Video.

Electro-Motive Division Leasing; Milwaukee Road; Norfolk Southern; Norfolk & Western; Southern Ry.; and Union Pacific. Multiple road numbers per scheme. All-new model with road number-specific details, including cab, pilot, horn, anticlimbers, and trucks.

#### News & Reviews



Pullman-Standard 40-foot PS-1 boxcar. This custom-decorated boxcar is painted for the Milwaukee, Racine & Troy to celebrate *Model Railroader*'s 90th anniversary. The ready-to-run car is available in one road number and features an injection-molded plastic body with positionable doors, a factory-applied running board, and a freestanding brake wheel. Molded ladders, grab irons, and route and placard boards round out the body. The die-cast metal underframe features floor board and stringer details, while a plastic casing provides center sill, crossmember, and brake system details. The limited-edition boxcar sells for \$42.98. The model, produced by Micro-Trains Line Co., is available from the Kalmbach Hobby Store, KalmbachHobbyStore.com

Light-emitting diode headlights, ditch lights, and number boxes as appropriate. Detailed cab interior. Direct-current model, \$149.99; with DCC and sound, \$249.99. Rivet Counter line. ScaleTrains, 844-987-2467, scaletrains.com



• General Electric B40-8 diesel locomotive. Amtrak; Atchison, Topeka & Santa Fe; BNSF Ry.; Conrail; LMX; Pan Am; Providence & Worcester; RJ Corman; Southern Pacific; and Susquehanna. Multiple road numbers per scheme. Directional light-emitting diode lighting. Standard cab or gull wing cab as appropriate. Direct-current model, \$139.95; with DCC and sound, \$249.95. Add \$10 for models with ditch lights. Master Line. Atlas Model Railroad Co., 908-678-0880, shop.atlasrr.com

#### N scale freight cars



• National Steel Car 6400-cubic-foot gondola. Cardella, ABC Recycling, American Iron & Metal, Coastal Distribution, DEAX, Murphy Road Recycling, RESIDCO, Oak Ridge, Secure, and WINX. Multiple road numbers per scheme. Also available painted with data only. Prototype-specific ends and slotting. Separately applied ladders. Fully detailed underbody. Trucks with rotating Bremco or Timken bearing caps as appropriate. Single car, \$37.99; sixpack, \$219.99. Otter Valley Railroad, 877-885-7245, ovrtrains.com

#### N scale passenger equipment



• Viewliner II four-car set. Amtrak Phase 3. One set of road numbers. Set includes one baggage-dorm, one diner, and two sleepers. See-through windows with detailed interior. Separately applied details including air vents. Lighting kit available separately. Four-car set, \$160, with interior lights, \$220. Kato USA, 847-781-9500, katousa.com

#### O scale locomotives



• Electro-Motive Division SD70ACe diesel locomotive. Montana Rail Link, BNSF Ry., Canadian Pacific, Ferromex,

#### American Model Builders closes

American Model Builders, manufacturer of rolling stock, structures, detail parts, paint jigs, and other items under the Laser Kit banner, announced its closure in late February. The entire product line has been discontinued.

A statement on the AMB website, laserkit.com, reads: "The family of the late John Hitzeman, founder and owner, and the extended AMB family, would like to thank the model railroad community and our contract customers for over 40 years of patronage!"

Check back on our website, Trains.com, for more on this developing story.

Kansas City Southern, Norfolk Southern, and Union Pacific. Multiple road numbers per scheme. ABS plastic body. Diecast metal truck sides, pilot, fuel tank, and body side grills. Metal chassis, handrails, and horn. Rotating fans. Detachable snow plow. Rule 17 lighting. Remote controlled Proto-Couplers. Light-emitting diode headlight, cab light, ditch lights, and number boxes. Onboard DCC/DCS sound decoder. Available for two- or three-rail operation. Premier line. \$649.95. Atlas O, 908-678-0880, shop.atlasrr.com

#### **Electronics/controls**



• DCC Loudspeakers. Available in 18mm x 35mm, 22mm x 42mm, and 24mm x 55mm sizes. Features built-in passive radiator and high-performance rectangular speaker. Improves bass reproduction as well as highs and mids. Compatible with LokSound 5 decoders and most DCC sound decoders. Contact manufacturer for pricing. ESU, esu.eu.

# Rapido Trains HO RS18u diesel locomotive CP Rail 1826

Do you have a soft spot for railroad-rebuilt diesel locomotives? Then you'll want to check out the HO scale Canadian Pacific RS18u from Rapido Trains. The model, designed from field measurements and a 3-D scan of a full-size engine, is offered in a variety of paint schemes from 1980 to the present.

In 1980, CP started a program at its Angus Shops in Montreal to rebuild the railroad's aging fleet of Montreal Locomotive Works RS18 diesels. When the program concluded in 1989, a total of 69 units were rebuilt. The locomotives, assigned to the 1800 through 1868 series and designated RS18u, featured a low short hood, tri-color class lights, and mechanical upgrades.

Our sample is decorated as CP Rail 1826, one of eight units rebuilt in 1984. It was retired by CP in April 1998 and sold for scrap to Century Metals in Lachine, Quebec, Canada a month later.

The Rapido model features a plastic shell and die-cast metal chassis. The CP-style pilots are fitted with factory-applied m.u. and train line hoses and uncoupling levers. The front of our sample has deck-mounted ditch lights.

The cab has the signature flat-top number board, class light, and bell housing that protrudes above the curved roof line. And yes, the class lights work.

Not to be overlooked is the detailed cab interior, which is painted light gray with three seats painted black. The control stand has illuminated gauges. Long-hood features include etchedmetal screens, formed-wire handrails and lift rings, and a three-chime air horn. A rerail frog, painted white, hangs below the sill on both sides.

Our CP Rail sample is painted in the railroad's Action Red scheme with Multimark herald. The red paint is smooth and evenly applied, and the graphics are opaque. The Multimark herald was especially well-executed, with crisp color-separation lines through the radiator shutters. A prototype image I found online showed the 1826 in fresh paint, sans Multimark, in March 1990.

The herald and lettering placement follow a photo from February 1985. A few small labels were omitted from the sill and long hood. The DRS-18 stencil (Diesel Road Switcher - 1,800hp) below the road number on the model doesn't appear in the image.

Rapido Trains offers the RS18u as a direct-current model with a 21-pin connector and with a dual-mode ESU LokSound decoder; we received the latter. I tested the model in our workshop using an NCE PowerCab system. At speed step 1, the four-axle unit moved at less than 1 scale mph. The model achieved a top speed of 77 scale mph at step 28. The full-size engines had a top speed of 75 mph.

I then took the RS18u over to our Milwaukee, Racine & Troy layout for real-world testing. The unit ran without incident while powering a short freight

train. The locomotive pulled nine 50-foot freight cars up the 3% grade between Bay Junction and Skyridge.

It's nice to see manufacturers like Rapido think outside the box and offer railroad-rebuilt diesels. Though small in number compared to other CP diesels, the RS18u was a signature part of the railroad's locomotive fleet in the 1980s and 1990s. — *Cody Grivno, senior editor* 

#### Facts & features

Price: Direct current with 21-pin connector, \$225; with dual-mode ESU LokSound decoder, \$335

#### Manufacturer

Rapido Trains 500 Alden Rd., Unit 21 Markham, Ontario, Canada L3R 5H5

rapidotrains.com

Era: 1984 to early 1990 (as decorated)
Road names: CP Rail (with and without
Multimark in five road numbers each),
Bath & Hammondsport (one number),
Minnesota Commercial (two numbers),
New Brunswick East Coast (two numbers),
Ontario Southland (three numbers),
Ottawa Central (three numbers), and
Western New York & Pennsylvania (one
number). Also available undecorated.
Features

- Correctly gauged metal wheels
- Metal couplers, at correct height
- Weight: 12.8 ounces

#### Atlas N scale H24-66 Train Master



#### Atlas Model Railroad Co. recently

released a new run of its N scale Fairbanks-Morse H26-44 Train Master diesel locomotive. The six-axle road locomotive, part of the Atlas product lineup since 2000, is now offered with a factory-installed speaker (Silver Series) or a dual-mode ESU LokSound V5 sound decoder (Gold Series).

Fairbanks-Morse produced the H26-44 Train Master from April 1953 to June 1957. During that time, the Beloit (Wis.)based company produced 105 units for U.S. railroads and 22 for Canadian lines.

The sample we received is decorated as Erie-Lackawanna 1854. The prototype was built as Delaware, Lackawanna & Western 854. Following the October 1960 merger between the DL&W and Erie, the unit became EL 1854.

After the merger the diesel was repainted yellow and black. In the mid-1960s it was repainted in the scheme depicted on the Atlas model. The unit was retired in 1968.

The Atlas H26-44 has a multi-piece plastic shell consisting of the body, cab, and sill unit. The body is offered in Phase Ia, Ib, and II versions; the E-L

is a Phase Ia.

Most of the details on the shell are molded. Freestanding plastic details include the handbrake and two singlechime air horns. A pair of etched-metal grills cover the radiator fans near the front of the long hood. Molded fans are visible under the screens.

Probably the biggest change to the Train Master is the die-cast metal chassis. Unlike previous releases that used a split-frame chassis, the latest run features a solid chassis.

A trough milled down the center of the chassis houses the motor, two brass flywheels, drive shafts, and worm gears. A metal cap, attached with four screws, spans those parts.

The printed-circuit (PC) board is secured to the metal cap with two screws. The decoder is located above the rear truck. The rectangular speaker is above the front truck.

Wires run from wheel wipers to JST connectors that plug into sockets on the bottom of the PC board. Another pair of wires go from a JST connector/socket on top of the board to the motor contacts.

I compared the model to drawings published in the *Model Railroader* Cyclopedia: Vol. 2, Diesel Locomotives (Kalmbach, out of print). Most of the major dimensions follow published data. However, the length of the long hood is a scale 9" too short. The short hood is approximately a scale 8" too short.

The sample we received has an ESU

LokSound V5 sound decoder. I ran the model on our workshop test track using an NCE PowerCab. At step 2, the locomotive moved at 2 scale mph. At step 28, the unit topped out at 66 scale mph. The maximum speed of the prototype Train Master was 66 to 79 mph depending on the gear ratio.

#### If the upgraded N scale Train Master

is any indication, Atlas Model Railroad Co. isn't resting on its laurels as it celebrates its centennial. Even though the Fairbanks-Morse H26-44 has been in the manufacturer's Master Line for nearly a quarter century, the crew in Hillside, N.J., has found innovative ways to keep this popular prototype up to speed with the latest trends in the hobby. — Cody Grivno, senior editor

#### Facts & features

Price: Direct-current model with factory-installed speaker, \$139.95; with dual-mode ESU LokSound V5 sound decoder, \$249.95

#### Manufacturer

Atlas Model Railroad Co. 378 Florence Ave. Hillside, NJ 07205 shop.atlasrr.com Era: mid-1960s to June 1968 (as decorated)

Road names: Phase Ia — Erie-Lackawanna: Chihuahua Pacific: and Delaware. Lackawanna & Western. Phase Ib - Jersey Central Lines, Reading Co., and Southern Pacific. Phase II — Canadian Pacific and Pennsylvania RR. Two to three road numbers per scheme.

#### **Features**

- Blackened metal wheel stubs mounted on plastic axles, in gauge
- Body-mounted Accumate couplers, at correct height
- Minimum radius: 9.75"
- Weight: 3.7 ounces



#### **Tangent HO Southern Pacific boxcar**



A line of Pullman-Standard Southern Pacific Lines 40'-6" postwar boxcars is now available from Tangent Scale Models. Designed from PS blueprints and field measurements of full-size cars, the HO scale models include prototype-specific details, new American Steel Foundries 50-ton A-3 Ride Control trucks, and Kadee scale couplers.

Many railroads looked to improve their boxcar fleets at the end of World War II, and Southern Pacific along with subsidiaries St. Louis Southwestern (Cotton Belt) and Texas & New Orleans were no exception. Between the end of the war and 1953, SP added more than 19,000 40-foot boxcars to its roster.

The sample we received is decorated as SP 102230, part of the railroad's 102100 through 103599 series built by PS under purchase order P-3057 between September and December 1950. The full-size car was part of SP's B-50-28 class, the largest in its postwar boxcar fleet. Espee had 3,000 cars, and subsidiary T&NO rostered 1,500 cars.

The Tangent Scale Models HO postwar boxcar has a one-piece injection-molded plastic body with many separate, factory-applied parts. The B-50-28 model features a see-through Apex brake running board with wire corner grab irons.

Freestanding details on the sides and ends of the car include bracket-style grab irons, eight-rung ladders, stirrup steps, and placard and route boards. The B end of the car features an Apex brake step, Universal handbrake housing, and Miner handbrake.

The B-50-28 model is fitted with 7-foot Youngstown doors. Though the doors are individual pieces, they're not positionable.

The underbody is a separate plastic casting with molded floorboard and stringer detail. The draft-gear boxes, center sills, body bolsters, bolster blocks, crossties, and crossbearers are cast as a single unit. Other features include wire uncoupling levers and rubber air hoses.

The air reservoir, brake cylinder, and control valve are all separate parts. An assortment of formed metal and plastic pipes, rods, levers, and hangers round out the underbody details.

Our sample is decorated in SP's 1950+ as-delivered scheme with Roman-style lettering. The Boxcar Red paint is evenly applied, and the placement of the graphics follows prototype images that I found in books and online. The model's dimensions closely follow data published in the January 1959 Official Railway Equipment Register (Railway Equipment and Publication Co.).

The boxcar rides on American Steel Foundries 50-ton A-3 Ride Control trucks with 33" metal wheelsets. The trucks, which have separate brake beam detail, are molded to match the body color and have raised foundry data.

To see how the car performed in an operating environment, I put the car in a transfer run from Milwaukee to Jones Island on our Milwaukee, Racine & Troy staff layout. The boxcar comfortably navigated the layout's 24" radius curves and No. 6 turnouts.

The full-size Southern Pacific postwar 40'-6" boxcars could be found throughout North America, and Tangent Scale Models offers many versions to cover the service lives of these cars. If you model any time between 1950 and the 1970s, you'll want to get a few of these cars for your freight car fleet. — Cody Grivno, senior editor

#### **Facts & features**

Price: \$52.95 (undecorated kits, \$50.95)
Manufacturer

Tangent Scale Models P.O. Box 6514 Asheville, NC 28816

tangentscalemodels.com

Era: 1950 to 1970s (as decorated)
Road names: Southern Pacific (as-delivered 1950+ class B-50-28, as-delivered 1953+ class B-50-32 with Texas & New Orleans reporting marks, and 1960+ repaint) and St. Louis Southwestern (as-delivered 1951+). Six to 12 road numbers per scheme. Undecorated kits (1965+ and 1968+ rebuild bodies, both with 10-foot doors) and painted SP Boxcar Red but unlettered (Five- and seven-panel Superior door and Youngstown door) also available.

#### **Features**

- •33" metal wheelsets, in gauge
- Kadee scale couplers, at correct height
- Weight: 4.7 ounces (.9 ounce too heavy per National Model Railroad Association Recommended Practice 20.1)

By Steven Otte



Manufacturers often mark an F on the front of a diesel, like the one on the sill of this Norfolk Southern EMD SD40. This Southern Railway heritage unit is marked to show it's configured for long-hood-forward operation. Kyle Yunker photo

#### Why is there an F on the front of diesels?

I am wondering about the little F mark on a diesel. I know it stands for "Front." However, isn't it obvious in most cases where the front is? And in the case of a center cab switcher, where it isn't at all obvious, why does it matter? What is the practical purpose of being able to tell at a distance which end of the locomotive is the front?

Mark Faust

While it may be obvious on an old covered wagon or a modern cowl unit which end is the front, that's not the case for all diesels. Most first-generation hood units were configured long-hood forward. Though most railroads switched to running their Electro-Motive Division Geeps and SDs short-hood forward when low-short-hood units came out, others such as the Southern Railway and Norfolk Southern — continued running theirs long hood forward. (The most common explanation for this practice is that it was a safety issue, putting more metal in front of the crew in case of a head-on collision with something on the tracks.) And almost all Alco road switchers were set up to run long hood forward.

So why does it matter to a person on the ground which end of a locomotive is the front? Again, the answer is safety. When a locomotive is ready to move, regulations say that the engineer is supposed to signal with his horn or whistle to warn those working nearby. Three short blasts of the whistle means the locomotive is about to start backing up. When a trainman hears that signal, he's going to want to be able to look at the engine and know which direction it's about to go.

There are also practical reasons, such as being able to tell if an engine is facing the right way to pick up its train or whether it has to be turned on the turntable first. But safety is the primary reason.

What is the rule of thumb for the transition from a grade back to level when laying track?

Carl Angdahl

A Gradual transitions between track grades, called vertical track easements, can help prevent problems on your

model railroad. If a train suddenly goes from a steep grade to flat track or viceversa, couplers can shift above or below each other, especially if the cars are of different lengths. The train could simply split apart at that point, or worse, the couplers could get hung up on each other and cause a derailment. Another possible : Steven Otte at AskTrains@Trains.com.

problem is that long cars could bottom out on a vertical curve, getting its underbody caught on the point where the track starts the downgrade.

The solution is to make the curve more gradual — in other words, a vertical track easement. Try to make the distance over which the grade changes at least 1½ times the length of your longest car or locomotive. That way, you can never have two pieces of adjacent rolling stock on both slopes at the same time one of them will always be in transition.

If you use thick plywood — 1/2" or 3/4" for your subroadbed, you shouldn't have much of a problem with vertical kinks. The plywood's resistance to bending will ensure your vertical transitions are gentle. However, there are situations where you still have to be careful about introducing vertical kinks.

The first is subroadbed joints. Avoid situating joints between pieces of subroadbed plywood where the track changes grades. Move those joints 2 or 3 feet to one side so they fall where the track is flat. If you must situate a joint at a grade transition, splice another piece of plywood at least 2 feet long under the joint to give it rigidity.

Likewise, avoid placing track joints at grade transitions. Even if your subroadbed has a nice gentle transition, roadbed and track can pull up from the subroadbed over time, introducing a vertical kink. Position rail joints on even grades if at all possible.

Problems can also occur if you're using pre-cut foam subroadbed risers for your grades. Use a wood plane, rasp, or foam cutter to knock the sharp corners off of the tops of slopes and add slivers of foam or cork to the bottom of the grade to make the transition more gradual.

Finally, track can change grades suddenly where a spur or siding transitions from mainline elevation to ground level. Use a rasp or sanding block to gradually shave your cork roadbed down to ground level over a distance at least as long as your longest car.

My N scale train layout uses Kato Unitrack and is controlled by two identical direct current (DC) power packs. One runs the main line while the other operates the yard. When I attempt to move a train from the main

Send questions to Senior Associate Editor

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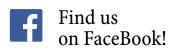
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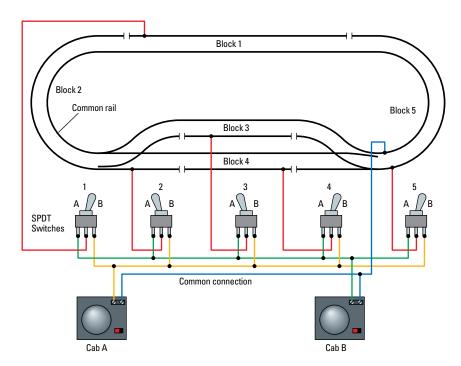


to the yard or vice versa, the train stops at the junction between blocks. Both power packs are aligned so that trains should be going in the same direction at the same speed, yet the train stops. The main and yards are separated by double insulated rail joiners, so there should be no electricity leaking from one power pack into the other's jurisdiction. What am I doing wrong?

Irv Soden, Vestal, N.Y.

A You might think that isolating the main from the yards with insulated rail joiners would keep the two wiring blocks separate, but when a locomotive crosses from one block to the other, it bridges that gap. Since electrical pickups from both trucks feed to the locomotive's motor, the engine creates a short between the two power packs. Your power packs must be sensing the short and shutting down when that happens, protecting the locomotive.

What you need to do is guarantee that an engine never bridges a gap between



This diagram shows how to wire a simple loop for dual cab control under DC. Using this wiring scheme, each block can be operated by either power pack.

MR staff illustration





blocks controlled by two different power packs. You can accomplish this by installing a few double-pole doublethrow (DPDT) switches between your power packs and your wiring blocks. You need to wire them so that either power pack can control either track block. When you want to send a train into or out of the yard, flip the switches so both blocks are controlled by the same power pack. Drive the train so all the locomotive's wheels are completely in the other block, then — and only then flip the switch to give control over to the other power pack.

If you want to be able to control both parts of your layout simultaneously and hand off locomotives from one to the other on the fly, you need to create a third, separate track block between the two. This transition block needs to also be wired with a DPDT switch so it can be controlled by either power pack. Flip the switch so the transition block is controlled by the same power pack as the block where the train is. Drive the locomotive forward into the transition block, then switch the block to control of the other power pack.

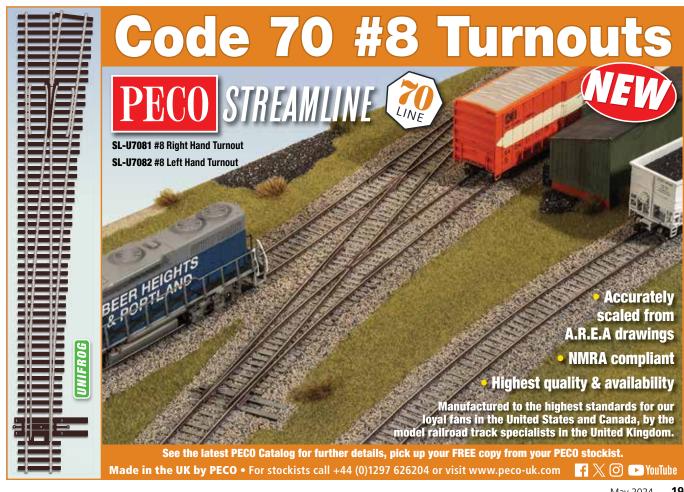
Look up the article "How to wire a layout for two-train operation" in our July 2011 issue for more about wiring your railroad for DC block control. You'll find even more information in Larry Puckett's book Wiring Your Model Railroad, available in the Kalmbach Hobby Store (kalmbachhobbystore.com/ product/book/12491).

 I recently received my copy of Gerry Leone's Model Railroader's Handbook [also available in the Kalmbach Hobby Store -Ed.]. In the "Railroad Regulatory Timeline" on page 111, most of the regulations banned older, unsafe technology (archbar trucks, truss-rod car construction, etc.) as newer equipment was developed. That made sense to me. But I noticed that in 1937. billboard reefers were banned. I can't imagine what the motivation for banning such cars could have been. Can you shed any light on this?

A Billboard reefer cars were only kind of banned. What was banned was the practice that made them profitable. The issue was complex, so I asked Kalmbach Books author and railroad historian Jeff Wilson for clarification.

A billboard car is one usually belonging to a leasing company, not a railroad, that's emblazoned with often large and splashy advertisements touting the products it carried. Sometimes, the billboard advertised a product unrelated to the car or the business it served. Usually it was a refrigerator car, but there were a few billboard boxcars, and oil tank cars fell under the same rules.

When a railcar is on the rails of a railroad different from the car's owner. the railroad must pay a daily fee, called a per diem, to the car's owner. In addition, if the car's owner is not another railroad. but for instance a car leasing company, the railroad also pays the car's owner a mileage charge based on how far the car moves. Obviously, the railroads would rather not have to pay this fee. But since *Chris Santy*: shippers could request what car they











#### Ask MR



After the Interstate Commerce Commission banned billboard cars in 1937, per-diem reefers like this Swift Refrigerator Line car could display only the company they were consigned to. David P. Morgan Memorial Library collection

wanted to carry their goods, railroads had little choice but to use leased cars.

Back in the 1920s, leasing companies found what they thought was a swell way to increase business. They would pay a portion of the mileage charge they got from the railroads back to the shippers as a rebate for requesting their cars. Lessors started painting their cars with big, showy advertisements for the shippers' products, like Rath Hams, Land O'Lakes Butter, and Budweiser Beer. The shippers liked this, because it meant extra money for them, plus advertising. The leasing companies liked it, because their cars got more mileage.

Who didn't like it? The railroads, who were the ones paying the rebate by being forced to use mileage-rate cars instead of their own. Plus, since a lot of refrigerator car lines were associated with or even outright owned by the shippers, the shippers were essentially double-dipping at the railroads' expense. Not to mention, shippers such as Hormel Meats didn't appreciate it when a reefer bearing a third-party advertisement like Old Dutch Cleanser showed up at their loading docks.

So the railroads took their case to the Interstate Commerce Commission, which in 1934 banned the rebate scheme and banned cars with billboard advertisements from interchange service starting in 1937. Cars could still bear the names and logos of the shipper leasing the car — such as Anheuser-Busch

— but not specific products like Budweiser. Third-party ads were also banned. With the rebate gone, the incentive for elaborate paint schemes also disappeared. Since wood-sided refrigerator cars required frequent repainting, billboard reefers were gone from the rails within a few years of the ICC's ruling.

#### **①** Do you know of a cement/glue that works with polypropylene plastic?

Curtis Elkin

A The Loctite Plastics Bonding System is compatible with various plastics that are difficult to bond, including polypropylene, polyethylene, and Polytetrafluoroethylene.

The two-part Loctite Plastics Bonding System contains an activator/primer and glue. Before using the products, make sure the parts that need to be glued are clean and dry.

Then, working in a well-ventilated area and wearing eye and hand protection, apply the activator/primer to both gluing surfaces and wait 60 seconds. Next, apply the glue to one gluing surface and press the parts together. Hold the joint for 30 seconds.

I've had good luck using the Loctite Plastics Bonding System to repair broken handrails on diesel locomotives. You can find the two-part system at most big-box retailers, hardware stores, and home-improvement centers for less than \$10.

— Cody Grivno, senior editor MR



Stern & Childers Plumbing Supply is the only rail-served factory on *Model Railroader*'s 2024 project layout, the HO scale Freemont Mills. Read on to see how Senior Associate Editor Steven Otte assembled, decorated, and detailed this laser-cut wood kit. Photo by Connor Bruesewitz/Saturn Lounge; all others by Trains.com Video staff

#### Build a laser-cut wood structure kit

For the single rail-served factory on *Model Railroader*'s 2024 project layout, the HO scale Free-Mo module Freemont Mills, I selected American Model Builders' A.C. Brown Mfg. Co., a lasercut wood kit.

I enjoy building wood structure kits, though I'll admit that I usually pick much smaller ones with many fewer windows. That step meant that building the structure that would become Stern & Childers Plumbing Supply took longer than I might have liked, but the tech-



wood structure kit.

niques I used are useful no matter what size your structure.

Follow along as I go through this build and see if you pick up any tips to help you on your next laser-cut wood structure kit.

#### **STEP 1** INVENTORY AND LABEL PARTS



**The first step** in any kit is to familiarize yourself with the kit's contents. Make sure all parts listed in the instructions are present and undamaged.

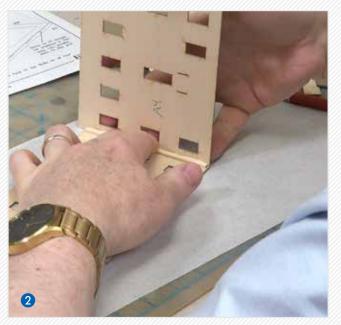
This kit's instructions are pretty thorough and include helpful diagrams identifying each part by number. Even so, it would be easy to lose track of which part was which after they were removed from their carrier sheets. So I took a moment to write the part numbers on the back of the major parts with a pen. This would help me not mix them up later.

#### **STEP 2** BASIC WALL ASSEMBLY



The first thing I did after taking the parts out of the box was to spray-paint everything. Wood parts, especially large, thin sheets like the walls of this kit, can warp under the influence of water-based paints and stains. Spraypaint, though, is solvent-based. It dries quickly and doesn't soak into wood as readily. As such, it doesn't cause as much warping. What little does happen can be corrected by adding stripwood braces to the interior. And painting the parts before assembly means no worries about sloppy brushwork on trim. I chose an earth-tone paint for the walls 1 and white for the peel-and-stick doors, windows, and trim. Bare-wood parts like the deck and stairs I would stain later.

To assemble the kit, I used yellow carpenter's glue (aliphatic resin). White glue would work, but I prefer wood glue because it's thicker, grabs quicker, and forms a waterproof bond (which can be important if you plan to use water-based paint or alcohol-based stain). I reinforced the joints with strips of 1/8" square basswood 2 and, after the basic box was complete, added more strips lengthwise across the walls to correct any warping 3. You may need to supply your own bracing material. After assembling the foundation, I glued the walls to it.





#### **STEP 3** CORNICE AND WALL CAP TRIM

The Victorian-looking cornice on the loading-dock side of the building is made of several wood strips and dozens of tiny laser-cut corbels. Since it was impossible to paint all visible surfaces of these parts while they were still in the carrier sheet, I assembled this trim piece unpainted. I used tweezers so I could see what I was doing while I positioned the corbels. Once the glue was dry, I spraypainted the assembled cornice white and glued it to the top of the wall along with two pieces of cap trim for the end walls.



#### STEP 4

#### PEEL-AND-STICK WINDOWS AND DOORS







The doors, windows, and trim are laser-cut from a brown pressed fiberboard similar to tempered hardboard. It's quite thin, though, so it's still fragile; use care when separating the parts from their carrier sheet or peeling the paper off the self-stick backing. It's easy to accidentally peel the adhesive off with the paper or even separate the layers of the fiberboard itself 1. If this happens, press the layers back together and try again at a different corner.

Build the windows in two sub-assemblies. Stick the window sash to the clear acrylic glazing, and adhere the narrow windowsills to the bottom of the frames. Remember that the wider part of the window sash and frame is the

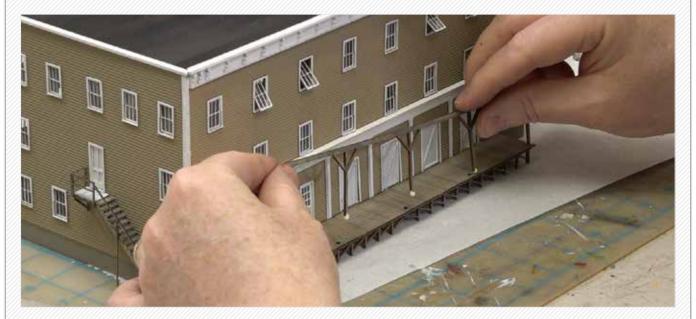
bottom. The frames will self-stick to the walls, but the sashes must be glued in place. The doors are the same.

The windows are designed to be installed either closed or open, so they fit a little loosely in the wall openings. If you're modeling them closed, apply a good amount of glue to the edges of the opening before inserting the window 2. Don't get any glue on your fingers or the glazing.

If you want to install a window in the open position, stick the window frame on the wall first. Then apply a bit of glue on either side of the sash at the center, which is the pivot point. Insert the window into the opening sideways, then rotate it into position 3.

#### STEP 5

#### TRIM, STAIRS, AND LOADING DOCK



The loading dock doors are surrounded by frames of selfstick trim. I applied these to the wall first, then followed with the rest of the pre-painted corner trim.

There are three sets of stairs, one long one to the second floor office door and two short ones for the loading dock. The kit comes with a laser-cut jig to hold the stair

risers in alignment while applying the self-stick treads. I reinforced the stairs by applying glue under the treads.

The loading dock was straightforward. The hardest part was straightening the legs of the roof support, which was warped by the stain. I moistened it with alcohol to make it flexible before gluing it into the sockets in the decking.

#### **STEP 6** ROOFING AND ROOF DETAILS



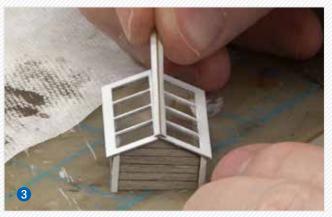
The roof is a single sheet of basswood, scribed with guidelines for adding the self-stick rolled roofing material. The roofing is white, so you have to paint it (I used a dark gray). Apply the strips of material from the bottom up.

The roof has a lot of good-looking details that add interest to the model. In addition to three cast-metal smokejacks and two cast-metal chimneys, there are also two skylights, a roof access stair, and a water tank that all need assembly. I stained the wood pieces before building the details 1.

I had some difficulty with the water tank 2. The scribed microplywood siding that wraps around the framework isn't as flexible as I expected, and when I tried to bend it around the frame, it snapped at several of the scribes between boards. I recommend that while the siding is still flexible from the stain, wrap it around a paint bottle or other similarly sized cylinder and secure it with rubber bands to dry. That way, it will dry with a curve and won't break when you apply it to the tank frame.

The skylights were a little tricky to assemble because the microplywood sides are thin and have a small gluing surface. I added some 1/8" square stripwood blocks to brace

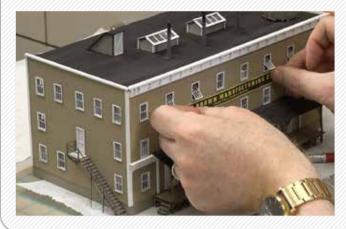




the inside corners. Be sure you pay attention to which side of the skylight is taller than the other, since it will be glued to a sloped roof. I also added a ridge cap cut from a scrap of leftover self-stick material to the skylight frames to hide the joint 3.

There are laser-cut openings in the roof for the chimneys, but not for the smokejacks. So you're free to place those where you like. I glued a piece of scrap carrier sheet to the bottom of the roof before drilling holes for the smokejacks. This would give them a more secure gluing surface. I glued stripwood under either side of the chimney sockets for the same reason.

#### STEP 7 SIGNS



The kit comes with a small sheet of full-color paper signs that you can cut out and apply to the building. Though I planned to change the name of the building when I came up with one I liked, at construction time I used the provided signs. I cut them from the sheet with a sharp No. 11 hobby blade and a metal straightedge, then applied them to the building with white glue. I didn't want any curling or peeling, so I used my finger to smear the glue along the back of the paper signs so it would be spread thinly but evenly.

Later, I measured the two signs with the building name, created replacements of the same sizes using a graphics program on my computer, then glued those printouts over the originals. MR



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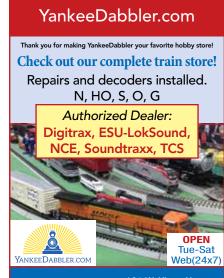
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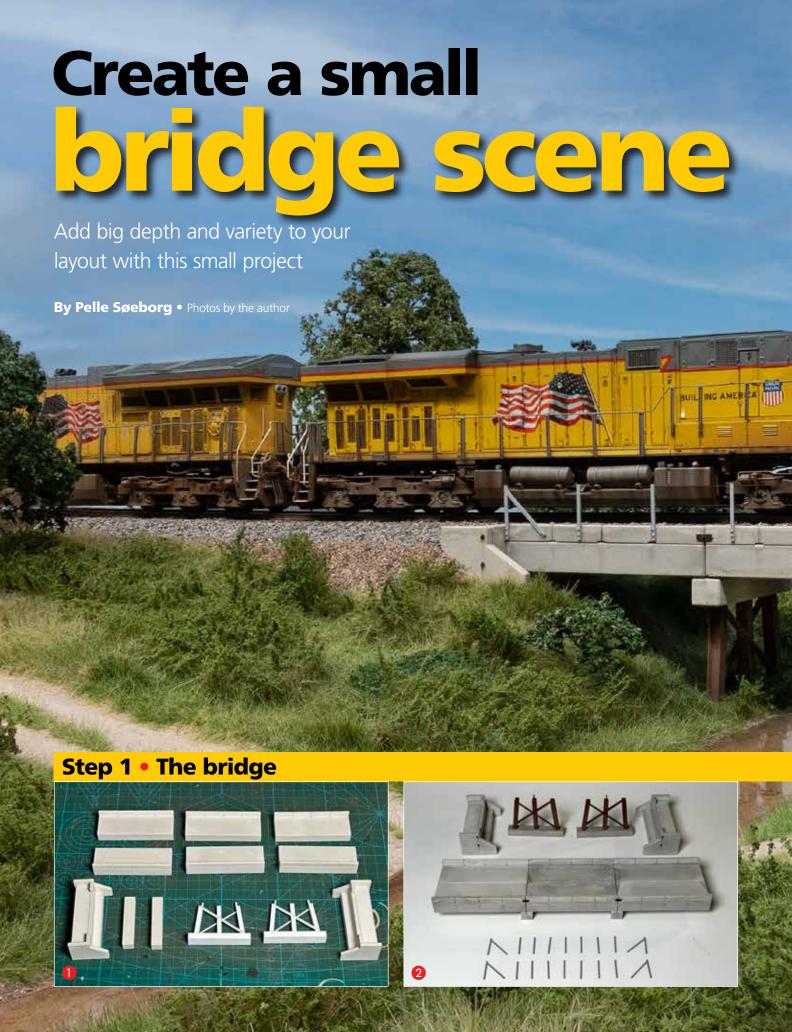
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One of the good things about moving is that sometimes you find things that you'd forgotten you had. During the move to a new apartment in the winter of 2023, I went through my stash of model railroad stuff and came across a little bridge kit from Scale Segmental Bridge Co. Unfortunately the manufacturer went out of business years ago, but you can use any bridge kit for a scene like this.

The kit represents a modern segmental concrete railroad bridge, and it fit

nicely on my next module project. A scene like this doesn't take up much space, which makes it perfect for not only modules, but will also be easy to implement on a permanent layout.

My model railroad space is restricted to 8 feet, which is just enough space for two and a half FREMO-US (the European version of Free-mo) modules. I dedicated the half module to the bridge scene. This gave me a space of 1.97 feet (60 centimeters) by 1.64 feet (50 centimeters) to work with.

A bridge, no matter how small it is, will always make an eye-catching scene. Contributing editor Pelle Søeborg built this HO scale bridge scene on a FREMO-US module.





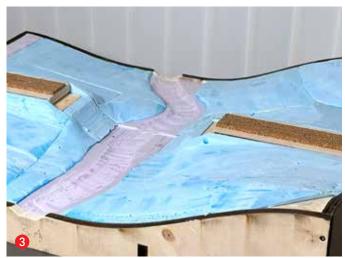
What makes kits from Scale Segmental Bridge Co. special is that the span sections, piling caps, and end walls are plaster castings, which gives a concrete-like feel that is difficult to achieve with styrene 1.

Before assembly, I gave the plaster castings a couple of dark gray washes 2. I airbrushed the pilings with dark brown. The stanchions for the wire handrails are made from styrene strips with nut-bolt-washer castings glued to them. I airbrushed them light gray. I glued the span sections together using cyanoacrylate adhesive (CA). Finally, I attached the handrail stanchions to the span sections with CA. I used elastic string to simulate the wire handrail 3.

#### **Step 2 • Terrain**







**Next I installed the bridge** on the module section. I glued a block of wood to the roadbed riser at each end of the bridge for the bridge end walls to rest on. I then glued a piece of foam insulation board to the transverse plywood sheets for the risers to rest on.

While the glue was still wet, I adjusted the parts until the top of the roadbed on the bridge was level with the adjacent roadbed. I didn't glue the bridge at this point 1.

After removing the bridge, I created the subterrain. Portable modules need to be as light as possible, so I used extruded-foam insulation board for the subterrain. I began by shaping the creek 2.

I continued applying foam pieces to the area. Using a hot wire cutter and a sharp knife, I roughly cut them to the desired shapes. Finally I sanded the surface smooth. The different colors of foam insulation board have no particular meaning; I just used what I had available 3.

#### **Step 3 • Bridge installation**



**The next step** was to install the bridge. I glued the end walls to the wood blocks with white glue.

I also used white glue to glue the piling sections to the foam insulation board. I didn't glue the bridge span to the



piling or end walls yet. It's easier to apply the scenery under the bridge without the span section in place 1. I then filled all the gaps with lightweight filler that I sanded smooth after it had dried 2.

#### Step 4 • Texture

I brush-painted the terrain with a layer of earth brown acrylic ①. Even though the painted area will be covered with scenery, this step is still needed. An earth-colored surface is much more forgiving than unpainted foam insulation board if there are spots where scenery doesn't cover completely.

Once the paint had dried, I covered the creek bed with Arizona Rock & Mineral Light Tan Dirt (1020) and Industrial Dirt (1000), and sprinkled the area with various small rocks that I've collected from the walking paths in my local park.

I drizzled the dirt and rocks with wet water. Then I applied thinned white glue 2.

I poured clear, solvent-free epoxy resin in the creek bed. I dyed the resin a bit by adding a few drops of Vallejo Sand Yellow (71.028) to it, but no more than that so it was still





transparent. It took two coats of resin because some of the first pour was absorbed by the creek bed. I poured the second coat after the first coat had fully cured.

I did things in a slightly different order than I usually do when I make rivers and streams. I used to apply all scenery materials along the creek before applying the resin, but I learned from experience that the resin would creep up the banks. So this time I applied the resin first. That way I can cover the glossy areas on the banks with a layer of dirt before I apply grass and weeds.

I let the resin harden for a couple of days before touching up the glossy areas on the banks where the resin crept up.

I also covered the dirt road with extra fine-grain dirt. I first applied a thin layer of white glue and then sprinkled the area with a mix of 3 different shades of dirt: Industrial Dirt, Low Desert Soil (1103), and Light Tan Dirt 3.



#### Step 5 • Ground cover and track





I applied grass and weeds to the first quarter of my module using scenery products from MiniNatur (mininatur.de/en/), Lars op't Hof Scenery (larsopthofscenery.nl/en\_GB/), and Polák (polakmodel.com) 1.

I first applied scenery glue to an area and then placed weeds and bushes randomly in the wet glue 2. Next, I applied static grass in various shades and lengths to the bare areas around the weeds and bushes using a Noch applicator.

I continued applying ground cover to the area under the bridge and along the other side of the track before I installed the bridge span.

Finally, I applied a section of track to the module using Central Valley Model Works tie strips and Micro Engineering code 83 rail 3. Before installing the track I masked the top of the rail with tape and airbrushed the section with a coat of light gray. I receive many questions about why I use track with wood ties on my modules and not concrete ties, since I



model the present era. The explanation is simple: The European FREMO-US module specifications stipulate that wood ties must be used because it must be possible to run different eras at the FREMO events.

#### **Step 6 • Weathering and ballast**



I needed to give the ties and rail some color ①. The ties received three washes. There first two washes were Vallejo Game Brown (72.745) diluted with Vallejo thinner and water added to the color in a 3:2:2 ratio. The third was a Vallejo Black Wash (76.517) and water in a 1:1 ratio. I wanted an old, sun-bleached look for the ties.

The rail and tie plates were painted with Vallejo Game Earth (72.062) mixed with Vallejo Model Air Rust (71.080) in a 1:1 ratio. Finally, I airbrushed the track with Vallejo Matte Varnish to seal the washes and kill any shine.

It doesn't matter exactly which shades of color you use. Most gray-brown shades will do the job. I've used other colors for tracks on other modules and layouts, but these were what I happened to have on the shelf.

I ballast the track in several steps. I'd already applied a



base layer of ballast when I applied the ground cover. For that I mixed some brown and gray ballast together. The mainline ballast is the Arizona Rock & Mineral Union Pacific blend (1352). I applied the ballast as evenly as possible and used a soft, wide brush to spread it out. I then tapped the top of the rails with the brush handle to knock any remaining ballast grains off the ties.

To break the surface tension of the ballast, I applied wet water (water with a few drops of dish detergent added). Once the ballast was soaked, I applied white glue thinned 1:1 with water 2.

Finally, I added grass and weeds to the area that hadn't been covered before I laid the track. There's no deeper reason why I didn't cover the entire module section with grass and weeds before laying and ballasting the track.

#### Step 7 • Trees



The final task was to make trees and bushes for the scene. I used a natural product from Heki — a dried seaweed of some kind — which is similar to SuperTrees from Scenic Express. I made each tree from several pieces glued together using hot glue 1.

The color of the product isn't very tree-like, so I airbrushed the armatures with a warm gray color 2. Then I dipped the trees in white glue thinned with water and sprinkled them with leaves from Noch 3.

With the trees in place, the module is almost complete. I might change the location of a tree or two and plant an extra bush somewhere if it looks better in close-up photos. I'll also apply a dark gray fascia to the module when all three modules have been finished.







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Jim Hediger's first HO layout, the NJ&E Railroad, was built in his parents' home while he was in junior high school. The diagram board to Jim's right had lights to indicate turnout position. Norm Hediger photo

# A tribute to Jim He was a member of the Model Railroader staff for 43 years

**By Cody Grivno** • Photos from the Jim Hediger collection



**Jim Hediger,** a member of the *Model Railroader* staff from 1972 to 2015, passed away on Feb. 9, 2024.

Here is a look back at Jim's early years in the hobby and some of the many highlights of his 43-year career at Kalmbach Publishing Co. (now Kalmbach Media).

#### Early years

Jim was born in Chicago to Norm and Elenore Hediger. While in the Windy City, his father worked for the Grand Trunk Western. When Jim was 13, his family moved to Dearborn, Mich. There, his parents worked in the Detroit, Toledo & Ironton's general offices.

In junior high school, Jim built his first HO scale layout — the 5 x 9-foot NJ&E RR (Norm, Jim & Elenore Railroad).

The model railroad was inspired by "Layout in a fortnight," an article published in the December 1951 issue of

Model Railroader. Jim and his father modified the plan to use Atlas Snap-Switches and flextrack. They also added a compact yard along the front edge of the layout.

"Corralling my youthful enthusiasm and teaching me to be patient and build things correctly from the beginning had to be a real trial for my dad as I always tried to rush everything," Jim wrote in the December 2000 MR. "Even so, he patiently helped me add the grade and upper level and lay track. Dad installed the wiring, including the track diagram board that showed turnout positions. Building the trains, scenery, and structures was my job."

After enjoying the NJ&E for several years, Jim began work on the HO scale Detroit Western RR. The new model railroad had 36" minimum radius curves, No. 6 turnouts, and an operating pit. "The DW layout was significant for

Jim stands next to his HO scale Ohio Southern layout, one of the first practical examples of a double-deck layout. The longtime member of the *Model Railroader* staff passed away on Feb. 9, 2024.

several reasons," Jim wrote in the July 1978 MR.

"First, it was my initial point-to-point layout. (It did have a double-track loop in it to represent other railroads.) Second, the DW included my first attempts at using interchange as a means of receiving and dispatching traffic from off-line points. Third, it was my first real attempt to model a portion of a real railroad. The result was a layout that was patterned after the prototype Detroit, Toledo & Ironton Railroad and its operation in the Detroit area."

The short trains on the layout were powered by Electro-Motive Division GP7 and GP9 diesel locomotives.



Jim replaced the NJ&E RR with the HO scale Detroit Western RR. This April 1965 view shows the Flat Rock Yard engine terminal.



One of Jim's first major projects for MR was modeling the original Auto-Train in HO scale. This photo was taken during a cover shoot for the December 1974 issue.

During Jim's years in Dearborn, he spent a decade working part-time at the hobby shop in his back yard. "Emery Gulash owned Star Hobbies and Bill Maguire was its manager," Jim wrote in the November 2015 MR. "Both were excellent modelers who encouraged my HO scale modeling. They also introduced me to realistic layout operations as a Junior Member of the O scale Detroit Model Railroad Club." Jim also worked as a telegraph operator for the Wabash Railroad for one summer.

Following high school, Jim attended Wayne State University, graduating with a bachelor's degree in industrial education. Jim then taught high school graphic arts (printing), machine shop, and wood shop in the Dearborn School District. He later earned a master's degree in industrial

education from Eastern Michigan University in Ypsilanti.

#### **Reaching out**

While Jim was reading a 1972 issue of MR, he noted that only a small group of employees at Kalmbach's 1027 N. 7th St. headquarters was producing the rapidly growing monthly publication. "I picked up that things were going on behind the scenes to get the magazine out," Jim wrote in the January 2019 MR.

"I wrote to Linn (Westcott) in the middle of May 1972 to inquire if he needed help. About three days later I got a telephone call wanting to know how fast I could get to Milwaukee to visit the Kalmbach offices. This happened right at the end of the school year. I completed my

teaching contract with the Dearborn School District before I moved to the Milwaukee area in the summer of 1972."

Jim joined the MR staff as an associate editor, becoming Kalmbach Publishing employee No. 62. "My work with Linn Westcott began with an unforgettable comment that I followed throughout my career: 'Never be afraid to try a new idea; even if something doesn't work, you've still learned something valuable from it," Jim wrote in the November 2015 issue of MR.

In the Fall 2015 *Proof*, Kalmbach's employee newsletter, Jim recalled attending his first National Model Railroad Association convention with Westcott. "Linn introduced me to nearly everyone in sight, including manufacturers, his friends, and the hobby's best-known authors. The rest of the week was a whirlwind of home layout visits, tours, and clinics where expert modelers shared their latest ideas. Everyone introduced himself and shook hands warmly, as if we'd known each other for years. Amazingly, this friendly attitude and sharing of model railroad information has never changed during my many years on the Model Railroader staff."

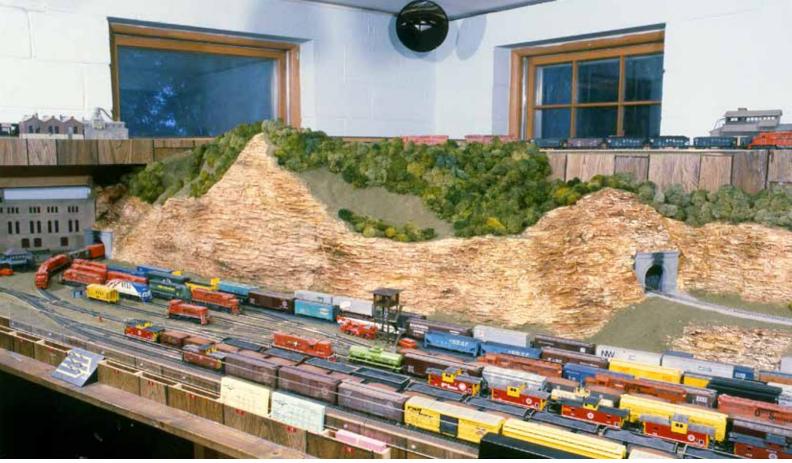
During his 43-year career, Jim, or JDH as he was known to colleagues, traveled throughout the world. He represented MR at industry events such as the Nuremberg (Germany) Toy Fair and iHobby Expo; toured the factories of several major hobby manufacturers; and presented clinics at NMRA events. Jim was the keynote speaker at the NMRA's 75th anniversary banquet, held in Milwaukee in July 2010.

#### The Ohio Southern

Jim became well-known for his HO scale Ohio Southern model railroad. Not only did Jim share the layout with readers during periodic layout visit articles, but he also used the OS as a teaching tool in many how-to stories and Workshop and Paint Shop columns.

The cover of the July 1978 issue featured "Jim Hediger's colorful Ohio Southern RR." In the eight-page feature, he introduced readers to his freelanced 16 x 22-foot railroad, inspired by the Detroit, Toledo & Ironton. The point-to-point model railroad was designed for prototype operations. The single-track railroad featured passing sidings and several interchange locations.

"The new layout is named for the real Ohio Southern RR, which became part of the prototype DT&I around 1900," he





The first version of the HO scale Ohio Southern, a 16 x 22-foot single-deck layout, was featured in the July 1978 MR. Here, Jim is at the layout's master control panel.

wrote in the 1978 article. "In fact, the portion of the railroad that my layout represents was the major main line of the original Ohio Southern. I used the name and updated the lettering and paint scheme so it would appear to be a subsidiary of the 'parent' DT&I."

Not long after that story was published, Jim and his family moved from Menomonee Falls, Wis., to nearby Sussex, both northern suburbs of Milwaukee. On Sept. 26, 1979, Jim began work on his pioneering double-deck version of the OS. In

his February 1983 article "The Ohio Southern's bi-level benchwork," Jim credited Linn Westcott for encouraging him to try the double-deck concept John Armstrong wrote about in his Kalmbach book *Track Planning for Realistic Operation*. "The proof that it works was summed up very well during a recent visit master track planner John Armstrong made to the Ohio Southern," Jim wrote. "His comment? 'By golly, it works!"

In 1990, a city sewer project forced Jim to tear down approximately 80% of Jim started work on the double-deck version of the Ohio Southern in 1979 when his family moved to Sussex, Wis. The towering cliffs and clumps of lichen concealed the helix that connected the two decks. The convex mirror gave operators a view inside the helix.

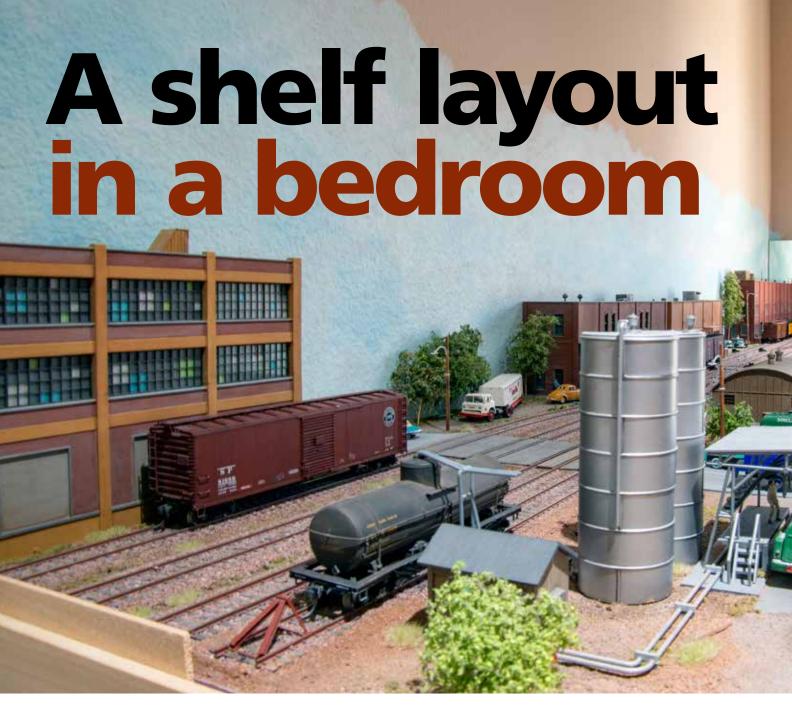
the OS. All that remained was the Jackson yard and 10 feet of peninsula. Though this was a major setback, it gave Jim a chance to revise his double-deck model railroad.

"I was happy with the old layout's point-to-point schematic, so my revisions are essentially enhancements of the original plan," Jim wrote in the February 1998 MR. "It still represents the Detroit, Toledo & Ironton RR operations in southern Ohio, but I've added more on-line customers, a working interchange with Allen McClelland's Virginian & Ohio, and revised staging yards."

On July 28, 2018, demolition began on the 22 x 28-foot Ohio Southern. What took 38 years to build was dismantled in a little more than two days.

#### An unmatched legacy

When Jim retired in August 2015, he had written more than 750 stories, columns, and product reviews for MR. His vast knowledge of model and prototype trains, along with his friendly demeanor, made him one of the magazine's most popular staff members.



The HO scale Santa Fe 4th Street Spur measures 1'-6" x 8'-0"

By Dean Deis • Photos by the author

ometimes model railroading is about making the right connections. Through my membership in the Santa Susana Railroad Historical Society in Simi Valley, Calif., I've been able to learn about many aspects of model railroading from longtime hobbyists. I discovered early in my time with the group that I enjoyed operations. I also learned what I wanted my home model railroad to be and the fundamental challenges (namely,

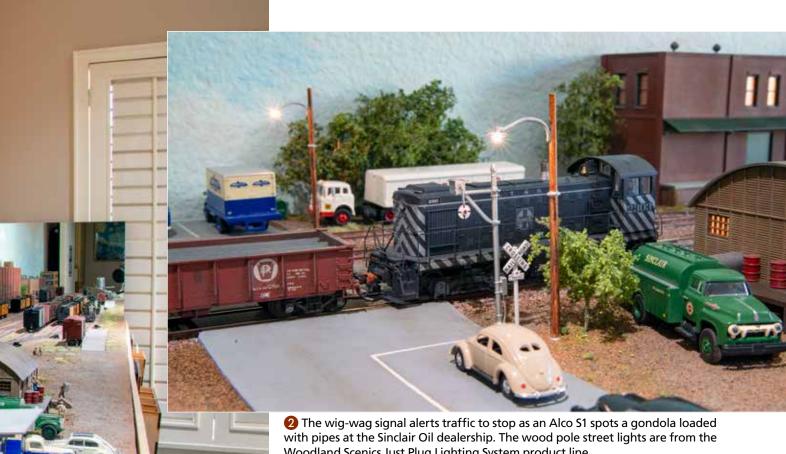
space) that would come with it. Thanks to numerous modelers and resources, I was able to take my HO scale Santa Fe 4th Street Spur from dream to reality.

The members of the operations committee at the Santa Susana Railroad Historical Society proved to be excellent mentors both inside and outside the club. Sensing my youthful enthusiasm, they quickly took me under their wing.

In addition, Gary Siegel and members of his operating crew provided valuable

insights on operation and helped me make many social connections. Gary's HO scale Ashlan Subdivision of the Louisville & Nashville's Eastern Kentucky Division was featured in the April 1996 issue of *Model Railroader*.

I met even more like-minded modelers at various operating events in Southern California. I soon found myself with a council of experienced, top-notch model railroading minds to bounce ideas off of.



1 The HO scale Atchison, Topeka & Santa Fe 4th Street Spur fits neatly in the corner of Dean Deis' bedroom. The high school student based his 1 x 8-foot shelf layout on downtown Los Angeles in the early 1950s.

#### Switching on a shelf

Based on my experiences in the operations department at Santa Susana, I knew I wanted an operations-based layout. I spent many hours searching the internet for inspiration.

Through the Wayback Machine internet archive I found the late Stein Rypern's website. His page had dozens of small track plans, any of which would have made excellent switching layouts.

Woodland Scenics Just Plug Lighting System product line.

After weeks of deliberation, I settled on my own western railroading-themed version of Stein's Federal Overpass plan. I was drawn to the plan because it had an interchange yard that could be against the wall and a mirror that would reflect the full width of the layout.

#### **Lavout construction**

Construction started on the Santa Fe 4th Street Spur in the summer of 2020. My dad and I attached heavy-duty shelf brackets to the wall in my bedroom with screws. The brackets support a 1/2" plywood base topped with 1"-thick extruded-foam insulation board. I brushed the foam with a flat, earthtoned latex paint.

Many photos from "The Patch," Santa Fe's nickname for the maze of rail-served industries in downtown Los Angeles, show a poorly maintained right of way with track often laid near ground level instead of on a ballasted roadbed. To replicate that look, the owner of my local hobby shop recommended using 3/32" basswood for roadbed. The basswood not only proved excellent for simulating the ground-hugging track, but to some degree it helped dampen the vibration from moving equipment.

I used Atlas code 83 No. 4 turnouts throughout the layout. Unfortunately,

my new turnouts all had a slight bend in the stock rail for the non-diverging route. Cars rolled through the turnouts without issue, and for the most part the bend wasn't noticeable.

However, the bend was more pronounced when I built the yard ladder, as the through routes didn't line up properly. On left-hand switches, each turnout in the ladder forced the next to curve slightly to the right, not exactly satisfying from a geometric standpoint.

Internet research revealed this was a fairly common issue with Atlas turnouts, particularly the No. 4. I spliced pieces of flextrack between each turnout in the ladder to minimize the problem.

A fellow club member introduced me to the Caboose Industries line of ground throws. I used the N scale version, attaching them to the turnout's switch rod with a small eyeglass screw.

#### Track, structures, and scenery

My father and I hand-painted the rails rust brown after the track had been spiked down — not the best foresight on our part. It turned out to be time well spent, though, as the painted rail is the first thing many people comment on when they see the layout. We used Arizona Rock & Mineral Santa Fe Mauve to ballast the track.



3 Atchison, Topeka & Santa Fe Alco S1 No. 2303 eases a flatcar away from the platform at Gus & Son Manufacturing. The shadow box, awning, and illuminated interior enhance the low-relief building constructed from Design Preservation Models wall panels.

Next, I turned my attention to buildings. I didn't want the layout to consist of the same dozen or so Walthers Cornerstone structures one can find on other layouts. My exception to this rule was the Interstate Fuel & Oil kit, which I used for Sinclair Oil.

A fellow modeler suggested I try the Design Preservation Models (DPM) modular wall system to build the low-relief buildings on my layout. The kits allowed for large, customizable structures without the need for scratchbuilding. I further personalized the structures by adding awnings, docks, rooftop details, and shadow boxes.

The LA Desk Co., a wholesale furniture dealer, is the City Classics Smallman Street Warehouse. I cut the building in half to fit the available space.

Prototype images of similar downtown industrial warehouses show window panes that had been broken and replaced with new panes in different colors. To replicate that look, I glued tissue paper behind the clear acetate. Then I lightly sprayed the clear acetate with Testor's Dullcote. This lets light pass through, but prevents operators from seeing that the interior is unfinished.



4 This view of the right side of the shelf layout shows the Los Angeles Packing Association building and the yard. A mirror at the end of the layout makes the compact model railroad seem much larger.

The need for ground cover on my urban switching layout was minimal. I used a homemade mixture of dirt, ground up leaves, and various colors of Woodland Scenics fine turf.

After I'd applied the base layer of scenery, I added scale rocks, static grass tufts, shrubs, flowers, gravel, and other items. Final scenery touches included signs, figures, track bumpers, vehicles, and a small batch of Scenic Express SuperTrees. The wall behind the layout was painted sky blue with a few other colors added in to simulate clouds.

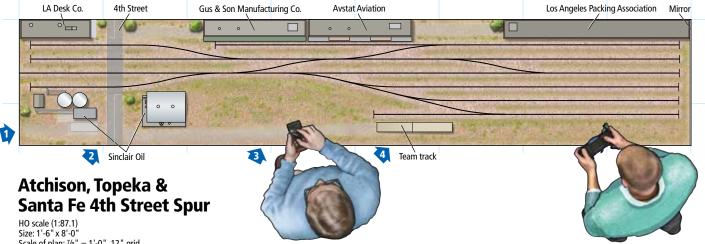
To make the compact layout feel larger, I purchased a mirror from a local

glass company. I attached it to a piece of ½"-thick tempered hardboard using RTV silicone. I used small clamps to secure the hardboard to the fascia. This allows the mirror to be removed for cleaning and layout maintenance.

#### **Running trains**

The focus of the Santa Fe 4th Street Spur is operation. An operating session on my layout provides for a two-person crew — a conductor and engineer.

A stool is provided for the engineer, who sits at the far end of the layout next to the Digitrax Zephyr DSC52 Digital



HO scale (1:87.1) Size: 1'-6" x 8'-0" Scale of plan: 7/8" = 1'-0", 12" grid Numbered arrows indicate photo locations Illustration by Kellie Jaeger

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Command Control system. The Zephyr also connects to a standard UP5 for traditional wired throttles via a LocoNet cable graciously provided by the Santa Susana club's DCC chair.

The conductor remains standing, with paperwork and an uncoupling pick in hand. Extra points are awarded to conductors who use hand signals.

I selected a variety of industries, many of which were inspired by prototypes in and around downtown Los Angeles. These include a packing house, commercial aircraft parts distributor, manufacturing company, furniture wholesaler, and an oil dealer. I also have a team track, which can receive virtually any type of car.

The six customers total around 12 car spots during an operating session. A standard session features a mix of rolling stock carrying a wide variety of commodities. With the exception of the packing house, loads are brought in and empties are shipped out.

I spent many hours deliberating what would be the most prototypically accurate, yet easily understandable, operating paperwork to use. Following research and testing various options, I settled on a car forwarding system similar to one Tony Thompson uses.

Each car has a laminated waybill to direct movements. White is for most freight shipments, pink is for perishable shipments, and yellow is for empty car movements. Some waybills are further customized with stamps, usually denoting a hazardous load, weight inspection, or customs border crossing.

Additional paperwork can be found in the form of handwritten agent's messages. These are typed instructions dictating the exact destination of certain

#### The layout at a glance

Name: Atchison, Topeka & Santa Fe 4th

Street Spur Scale: HO (1:87.1) Size: 1'-6" x 8'-0"

**Prototype:** Atchison, Topeka & Santa Fe Locale: downtown Los Angeles

Era: 1950-1953 Style: shelf Mainline run: 8 feet Minimum turnout: No. 4 Maximum grade: none

Benchwork: 1/2" plywood secured to wall

with shelf brackets Height: 48"

Roadbed: 3/32" basswood Track: Atlas code 83

Scenery: extruded-foam insulation board and homemade ground cover mixture Backdrop: wall painted sky blue

**Control:** Digitrax Digital Command Control

cars whose waybills may only be addressed to the local agent, not a specific industry. Other paperwork may include special requests from the packing house foreman for cars to be spotted at certain doors. Finally, a blank switchlist is provided should the crew prefer to fill that out rather than continually consulting the waybills.

#### A learning tool

Though the Santa Fe 4th Street Spur is small, I'm still finding ways to enhance the model railroad. Lately I've become interested in building car kits. My primary focus is rolling stock from Western roads, with some Midwest and Eastern prototypes thrown in to enhance the traffic base for my shelf layout.

One media I enjoy working in is resin. The time, effort, and craftsmanship that goes into assembling the kits results in a rewarding experience and outstanding, finely detailed models. As of this writing, I've built more than a dozen car kits.

My pride and joy are a set of six Southern Pacific Harriman head-end cars, built from resin kits produced by Southern Car & Foundry. These six cars, plus a heavily modified Ken Kidder brass rider coach, make up the core consist of

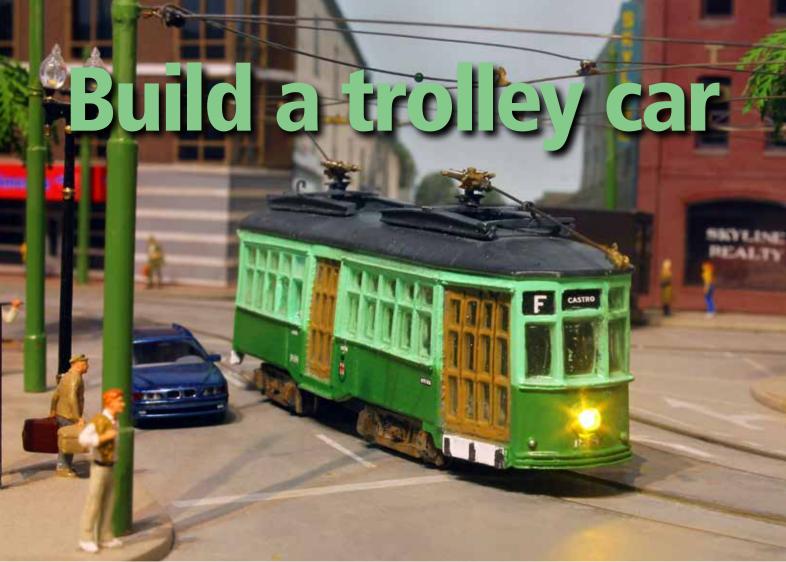
my rendition of SP's "Coast Mail" circa 1950-53. A video of the train can be found on YouTube. Search for "Dean Deis Coast Mail.'

I'd like to thank all of those who have helped me in my early journey in model railroading. There are many great people in this hobby who are willing to pass their knowledge on to the next generation. Keep your eyes and ears open. MR



#### **Meet Dean Deis**

Dean Deis is a high school student from Granada Hills, Calif. He enjoys modeling the Atchison, Topeka & Santa Fe and Southern Pacific in the early 1950s. Dean regularly organizes and participates in model railroad operating events in Southern California.



F-line car No. 1818 hurries through rush hour traffic. Harvey Simon built the HO scale trolley car based on a prototype by combining parts from several suppliers.

#### San Francisco MUNI No. 1818 shines under wire in HO scale

By Harvey Simon • Photos by the author

here's often a letdown after building a model railroad to completion. I spent seven years building San Francisco's Municipal (MUNI) F-line in HO scale — my third, fully scenicked layout. It was a great experience and I accomplished my goals, but then it was time for a breather. The breather lasted two years until I attended the National Train Show in 2022.

Like a kid in a candy shop, I bought a SoundTraxx Tsunami 2 decoder, a TCS KeepAlive capacitor pack, and speaker for the Peter Witt trolley car I'd wanted to build after finishing the layout. In the early 1900s, more than 500 Peter Witt trolley cars were built in Italy. Of these, 200 were used in Milan, and when the F-line began service in 1995, 11 were

brought back for restoration and put into service. There are three Peter Witt color schemes on the F-line — yellow and white, orange, and green and light green. I'd previously built the orange and white/yellow cars during layout construction, and luckily was able to find the necessary parts to build car No. 1818 in the green/light green livery.

Building a trolley car isn't a beginner's project, but you don't need to be a scratchbuilding expert, either. Patience is a must, but that's true of anything in our hobby, and if you take it one step at a time, you'll get results to be proud of. I used the parts in 1 to build the car. These included the Bowser floor, motor, gearbox tower, and trailing truck supplied by CustomTraxx. Other parts are listed in the materials list on page 46.

#### Preparing the floor and shell

One of the cool characteristics of traction modeling in HO scale is that you can turn a car on 6" radius curves. It combines the heft of HO on an N scale footprint. However, the car floor must be modified so that the trucks can swivel enough to navigate such tight turns. This meant widening the openings in the floor for the trucks by filing away unwanted material. The only caution is not to file so much that the floor separates. Additionally, there needed to be a way to attach the floor to the shell. I used a 1.4mm drill and tap set, which accommodated the 1.4mm panhead metric screws to secure the floor **2**.

I next drilled the necessary holes for the headlight, taillights, and the rooftop trolley pole housings 3. The size of bulbs you use will dictate the size of the holes. I use a bit one size down and then, using a round file, gently increase the size of the opening to ensure a tight fit.

#### **Motor and trucks**

After the shell and floor were ready, I attached the flywheel to the powered truck, then mounted the motor, power truck, and trailing truck to the floor. This was my first experience building a car using a Bowser drive, and I made a rookie mistake — I mounted the motor/flywheel mechanism backward.

As the short end of the motor shaft was long enough to install the link that drives the gears in the tower above the front truck, I didn't notice the goof until after I had wired the car.

Luckily, it ran smoothly during testing, so I left it as is. I'll be sure to read the instructions next time.

The floor has openings for the tabs on the trucks. It's also factory-drilled and tapped for mounting the trucks, making assembly much easier. I took the car to the layout and pushed it through the tight turns to ensure it could navigate the sharp curves. So far, so good 4.

The next step was to wire the trucks. On my layout, power comes from the overhead wire, through the trolley pole to the motor, and then through the trucks to the rails. All eight wheels can be grounded together, as both rails are the same polarity.

To do this with the Bowser trucks, I soldered a jumper wire between the two



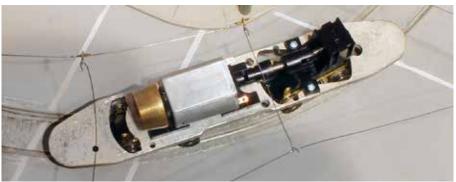
**1) Project overview.** These are the parts Harvey used to build the streetcar. From left to right: Bowser power truck, trailing truck, and motor; A-Line flywheel; Bowser floor; Miniatures by Eric shell, rooftop parts, and trolley poles; and Rail Graphics decals. Harvey bought many of these parts from CustomTraxx.



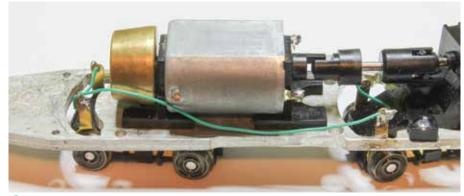
**2** Making modifications. Here are the changes that Harvey made to the floor. Note the holes drilled in the floor that mate with the four small chunks of resin that were glued to the shell.



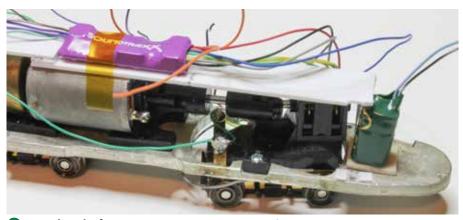
**3 Time for lights.** To make the holes for the headlight and taillights, Harvey started with a smaller bit and filed the size of the opening for a tight fit. The headlight casting came with the shell.



4 Will it work? After the trucks were installed, Harvey tested the trolley car to confirm it would operate on his layout's tight-radius curves. In HO scale a car can be turned on a 6" radius curve.



**5** Wiring for overhead operation. Because the layout runs off of a live overhead wire, all eight wheels were grounded together. A wire was soldered between each side of the trucks and between the trucks themselves.



**6 Decoder platform.** Harvey built a styrene platform to support the decoder and keep the wiring away from moving parts in the trolley car.

tabs on each truck, as well as a wire connecting the trucks **5**.

#### **Painting the shell**

Painting the shell comes next. I used a basic single-action airbrush and blue painter's tape for masking. For this car, the masking is easy, as there aren't curved lines that add to the complexity.

I first sprayed the car with gray primer and let it dry thoroughly. I began with the windows using a mix of Vallejo 70.951 White and 70.942 Light Green. I started with a White base, and then added Light Green drop by drop until it matched the color of the prototype. I let the windows dry for a couple days, and then airbrushed the lower half of the body with Vallejo 70.891 Intermediate Green, which was a direct match, no mixing needed.

For the roof I used Badger 16-05 Weathered Black and then airbrushed a light overspray of diluted white for a faded look. I hand-painted the doors with a couple coats of Vallejo 71.028 Sand Yellow that I had on hand. I then added a diluted black wash to simulate the grain in the old-look wooden doors of the prototype. I sprayed the roof with Testor's 1260 Dullcote.

I didn't weather the sides of the car, as the F-line fleet is generally kept very clean. I finished the painting by masking the roof and over-spraying the car sides with Testor's 1261 Glosscote.

I applied the Rail Graphics decal set, and after the decals were thoroughly dry, gave the car another application of Glosscote to seal the decals.

Two tips for decaling — apply decals on a glossy surface and use distilled water to separate the decal from the backing material.

The prototype has a red stripe just below the windows where the two colors meet. However, I had difficulty getting the striping straight, so I left it off.

#### **Adding electronics**

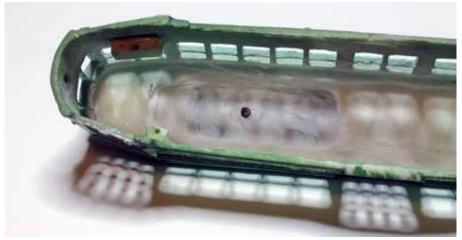
The decoder, KeepAlive, lights, and speaker came next **3**. I built a styrene platform to support the decoder and keep the wiring away from the moving parts. I use a KeepAlive with all my cars, as there's only one contact point with the overhead wire to complete the circuit. The KeepAlive helps the car move through spots where the overhead is dirty, or there isn't a clean connection.

With the decoder mounted on the styrene platform, I wanted to see if the speaker could fit without further cutting the shell. Although the speaker is thin, I couldn't quite secure the car to the floor. Using a motor tool, I created a cavity in the roof to accommodate the speaker 7.

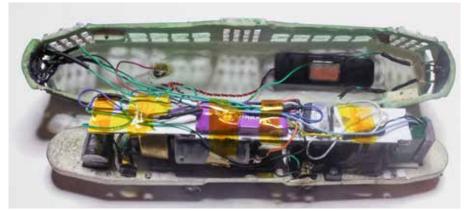
I know the completed wiring looks like a bowl of spaghetti, but it's not as complicated as it looks 8.

I began by soldering the orange and gray wires to the two motor leads. The Bowser motor has a small orange dot to mark the spot for the orange lead, and a corresponding gray dot for the gray lead. I then soldered the black wire to the metal tab on the front truck, and the red wire to the rear trolley pole mount. I only run my cars from the rear pole, but you could split the red wire with another lead to the front pole mount. The white wire goes to the headlight, and the green wire coming from the rear of the decoder (FX3) powers the two taillights.

The lights I used came with the appropriate resistor, and the only thing to make sure of is to solder the resistor to the cathode lead of the light. The green and yellow striped wire goes to the black and white striped wire of the



**Making room.** To accommodate the speaker, Harvey cut a cavity in the roof of the shell with a motor tool. This is necessary for the shell to seat properly.



**8** Making the connections. While the wiring looks like a lot, it's actually simpler than you may think. Wire management, use of heat-shrink tubing, and Kapton tape are all integral in the electrical operation of this trolley car.



**Quick and easy windows.**Microscale Industries' Micro Kristal Klear works perfectly for creating window glazing. It's a simple technique and all you need is a toothpick.

KeepAlive, and the two purple wires connect to the two speaker leads. The blue common wire is then connected with the remaining leads of the three lights and KeepAlive.

I snipped wires that I didn't use, the yellow wire and the brown FX4 wire. Be sure to use heat-shrink tubing on all wire connections. I used 3/64" tubing on

the single wire connections and ½6" tubing on the blue common connection. After completing the wiring, I used Kapton tape to secure it to the styrene platform.

I then cemented the lights in place using a tiny amount of Microscale Micro Kristal Klear. It's OK if a bit of cement gets on the bulb, as it dries clear.

After the lights were in place, I carefully painted the area around the lights black to prevent light leakage coming from inside the shell. Finally, I added the small weights to help the car track better on the layout.

#### Window glazing

The last step is window glazing. Here I used more Micro Kristal Klear. It dries clear and gives a nice depth to the appearance of the windows. I dipped a toothpick in the material and moved it around the window opening ②. The thicker viscosity enables the material to be stretched over the entire opening, as the windows on this car are small enough to enable that.

#### Materials list

## Acrylicos Vallejo paints (Model Color unless noted)

70.891 Intermediate Green 70.942 Light Green 70.951 White 71.028 Sand Yellow (Model Air)

#### A-Line

20040 flywheel retrofit kit for Bowser 1999 trolleys

#### **Badger Modelflex paint**

16-05 Weathered Black

#### **Bowser**

1-125100 Mechanism with 6'-4" wheelbase trucks and 26" wheels 125161 pewter floor for Bowser mechanism

#### Microscale Industries Inc.

MI-9 Micro Kristal Klear

#### **Miniatures by Eric**

Peter Witt Milano shell and rooftop parts HT-P4 trolley poles

#### **Rail Graphics decals**

CN-1807 San Francisco Municipal Ry. "Milano" Peter Witt Cars

#### **RailMaster Hobbies**

DS1240-box speaker

#### SoundTraxx

TSU-1100 Tsunami2 decoder for electrics

#### **Testor Corp.**

1260 Dullcote 1261 Glosscote

#### **Train Control Systems**

KA-2 KeepAlive

3.2 Volt 20 mA headlight with resistor included

As the window glazing was drying, I brush-painted the truck sideframes with a mix of dark gray and tan, and then a bit of rust for weathering. After the window glazing was dry, I installed the side frames, inserted the trolley poles into their housings, and put car No. 1818 into service on the F-Line.

Harvey and his wife, Lisa, live in Boone, N.C. He retired in 2015 and now teaches part time at Appalachian State University. This is Harvey's 14th article in Model Railroader.



• Georgia & Florida No. 801, an Electro-Motive Division F7, and Southern Railway EMD F3 No. 4142 haul pulpwood to the paper mill in Vidalia, Ga., on Charles Trevey's HO scale G&F layout. The compact around-the-walls layout packs a lot of operation in a 12 x 13-foot spare room.

# SERVING THE SOUTH in a spare room

Pulpwood and a paper mill keep this compact HO scale railroad busy

#### **By Charles Trevey**

Photos by the author

y journey in model rail-roading began many years ago with a kind Christmas gift of a train set from my grandma.
When I returned to model railroading about 20 years ago, I was surprised at the increased level of quality in the hobby.

I wanted to model a Southeastern carrier, preferably one that was small and interesting. I decided on the Georgia & Florida Railroad, which could also host locomotives from the Southern Railway and rolling stock from other Southeastern railroads.

Since basements are not commonplace in Florida, I was limited to a spare room. I remembered reading an article by Paul Dolkos, called "Tight Yankee or Compact Dixie," in the February 1996 issue of *Model Railroader*. That track plan and operating scheme looked like it would work well for what I had in mind, and it forms the basis of my G&F.

Some of the main features of that track plan that were attractive to me were uncluttered scenery, a secondary main line, a large paper mill serving a wide variety of cars, and a lift-out viaduct across the entry.

#### **Construction begins**

I began by constructing wall brackets of 1 x 3 and 2 x 2 dimensional lumber. These are spaced 4 feet apart and support sections of open-grid framing. The opengrid sections support risers for the subroadbed. The fascia is also attached to these sections. The wall brackets have a



2 Having finished switching at Vidalia, Ga., the local picks up its caboose for the return home. The brick freight house represents a prototype that still stands. The caboose is by Wright Track Models.

long vertical leg to hold up the backdrop and the track lighting.

The backdrop is  $\sqrt[1]{k}$ " tempered hardboard. When I needed a smaller radius than the hardboard would bend, I used fiberglass-reinforced plastic.

Cork roadbed is attached with white glue to the ½" plywood subroadbed. Power is carried by a 14 gauge bus with feeders each 3 feet.

#### Late summer scenery

The basic terrain is supported on a web of cardboard strips attached to the subroadbed and fascia. In cities and yards, sheet cork is glued to a flat plywood base. The cardboard forms are covered with plaster gauze strips and finished with Sculptamold. Various textures of ground foam, along with real Piedmont soil, finish the ground cover.

Trees are from Woodland Scenics and Scenic Express SuperTrees. Cobb Creek and the Alapaha River are modeled with Woodland Scenics Deep Pour water.

The backdrop has coved corners to create an uninterrupted surface without hard edges. To this was attached to a custom continuous photographic backdrop made by Backdrop Junction. Several of the backdrop photographs splice together seamlessly to produce a continuous scene.

#### **Prototype-inspired structures**

The structures and buildings that appear on my layout reflect similar features seen during my trips through



3 Charles installed under his benchwork a pull-out drawer intended to hold a computer keyboard and repurposed it as a locomotive wheel-cleaning station.

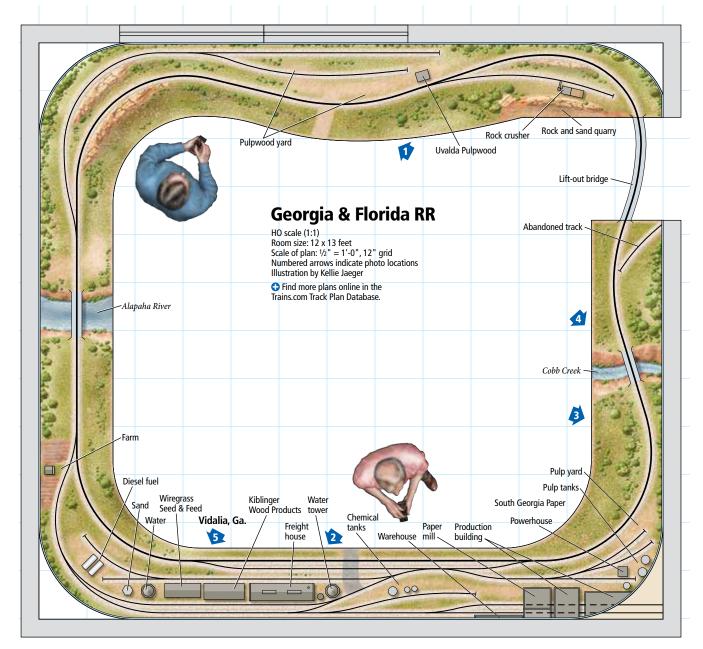
## Locomotive wheel cleaning station

I wanted a track that was dedicated to wheel cleaning. I purchased a pull-out tray for computer keyboards complete with mounting hardware. I attached it to the underside of the open-grid framing with 1 x 2s so it pulls out from below the fascia and locks in place. Inside the drawer I installed a length of track on top of sheet cork and ½" subroadbed. The track has feeders from the bus wire for power. Shallow storage compartments hold cloth wipes and other small wheel- and track-cleaning supplies. — Charles Trevey

Georgia. A brick warehouse building in Vidalia and the Cobb Creek trestle bridge still stand, replicas of which are featured on my layout.

My layout features kitbashed, scratchbuilt, and kit-built models manufactured by CC Crow, Frenchie Gratts, Wm. K. Walthers, Campbell Scale Models, BTS, Micro Engineering, PM, Rix Products, City Classics, and Auhagen.

The many brick buildings are painted various red and brown colors, and then Roberts Brick Mortar is applied to highlight the masonry detail. I pre-tint the



#### The layout at a glance

Name: Georgia & Florida RR Scale: HO (1:87.1)

Size: 12 x 13 feet Prototype: Georgia &

Florida

Locale: Central and South

Georgia

Era: late summer, 1966-

1972

Style: around the walls

Mainline run: 55 feet Minimum radius: 24" Minimum turnout: No. 4 Minimum grade: none Benchwork: open grid Height: 40" Roadbed: cork

Track: Atlas code 83 flextrack

**Scenery:** cardboard strips

covered with plaster gauze and Sculptamold Backdrop: 1/8" tempered hardboard and fiberglassreinforced plastic Control: MRC Control Master 20 with walkaround throttles (direct current)



#### **Meet Charles Trevey**

Charles is retired from the construction industry as an estimator and from the city of Jacksonville, Fla., as a building plans examiner. He lives in Jacksonville and is a member of the NMRA. He enjoys sportscar racing and computer flight simulators.



4 A pair of G&F GP7s cross Cobb Creek with pulpwood loads from Uvalda Pulpwood. With the railroad's major industry being the South Georgia Paper plant, pulpwood traffic is very important to the G&F.

mortar mix with a few drops of black or tan acrylic paint in order to tone down the mortar's unrealistically bright white color. All structures are weathered to some degree and are built from various materials such as plastic, plaster, or wood. They all have unique attributes, and I enjoyed building them.

#### **Locomotives and rolling stock**

I wanted to re-create some of the motive power that the prototype Georgia & Florida owned, so painting, decaling, detailing, and other alterations to stock locomotives were required.

The Electro-Motive Division GP7s and F7 are made by Athearn Genesis. The SW1 is a modified WalthersProto model. I also decorated the Bachmann GE 70-ton locomotive that serves the paper plant for South Georgia Railroad.

The 50-foot Pullman-Standard boxcars are from Kadee, the bay-window caboose is from Wright Track Models, and one G&F pulpwood car is scratchbuilt. Other Southeastern locomotives and rolling stock appear on the layout at various times.



**5** An empty boxcar is spotted for loading at Kiblinger Wood Products in Vidalia. Georgia & Florida No. 70, an EMD SW1, is a customized WalthersProto model.

Paints and other coatings are from Scalecoat-2 and Testors clear finishes. The decals are from Microscale and Highball Graphics. Details West and Detail Associates provided most of the custom parts.

#### Operation and goals achieved

The paper mill in Vidalia serves as the centerpiece of operations. The layout also has a pulpwood yard, sand and aggregate quarry, and an interchange track that serves various industries.

During a typical operating session, a through freight would drop and pick up cars from the interchange. While the paper mill switcher shifts cars destined for the interchange, the through freight would pick up and set out cars for the paper plant. A local freight originating from Vidalia switches the other non-paper mill industries.

This room-sized railroad with a paper mill centerpiece has proven to be very satisfying to build and operate. 

III

## C&NW's Waseca, Minn., yard in the 1970s



The prototype photo seen at right was taken by Tom Flemming in July 1971 at the Chicago & North Western engine facility at Waseca, Minn. Engine 167, an Alco RS3 built in 1953, is parked next to the fueling stand. At the far right of the photo are the sand tower and sand

drying house. I used this photo and several others by Tom to model and detail my HO scale Waseca engine facility. The model photo was taken on my prototype-based model railroad.

The layout is based on the C&NW's Winona Subdivision, which ran from

Winona, Minn., to Waseca, in 1976.

The model of engine 167 was built using a Stewart RS3 phase II shell kit 1. The drive from an Atlas RS3 was used to power the model. A scratchbuilt chassis made from brass shapes was designed to fit the Stewart

shell and Atlas drive components. The handrails were made from bronze wire, brass bar, and KV Models side handrail stanchions 2. The fuel tank and air reservoirs were scratchbuilt from styrene 3. The RS3 was painted using Model Master acrylic paint and weathered using an



#### Send us your scenes

Have you modeled a scene based on a prototype photo? E-mail both the prototype and model photos, along with a description of the scene and the modeling techniques shown, to Senior Associate Editor Steven Otte at sotte@kalmbach.com. Be sure to put "Prototype to Model" in the subject line.

airbrush. A small amount of chalk powder was also used for weathering.

The utility pole next to the fueling stand was made using parts from a Rix kit 4. The fueling stand was scratchbuilt from brass and styrene shapes 5. The sand tower and sand house in the background were scratchbuilt from styrene 6.

The track is handlaid using Micro Engineering code 70 rail and Mt. Albert Scale Lumber Co. wood ties 7. The track was weathered with Polly Scale Oily Black acrylic paint using an airbrush.

To model the oil spills around the fueling stand, several coats of Pledge with Future Shine acrylic floor wax was applied between the rails and around the fuel station ③. The sand piles around the rails were made using very fine wood sanding dust ④. Silflor 6mm Late Summer static grass and fine ground foam was used to make the weeds ①. IMP

Dennis Eggert is a charter member of the Chicago & North Western Historical Society who lives in eastcentral Wisconsin.

His HO scale C&NW Alco Lines East layout appeared in Model Railroad Planning 2023.







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Malcolm Furlow built the 8 x 10-foot HOn3 San Juan Central as a project layout for *Model Railroader* magazine. Today the narrow gauge layout is on display at the California State Railroad Museum in Sacramento. Malcolm Furlow photo

## MODELRAIDER HALLOF FAME

These three authors and builders influenced many model railroaders

## **NOMINEES**

#### **By Cody Grivno**

elcome to our next installment in the Model Railroader Hall of Fame series. For those of you joining us for the first time, we're creating a hall of fame as part of our 90th anniversary year. The rules for nomination are simple. The inductee must have made a significant contribution to the hobby and they must be deceased.

Each month, a member of the MR editorial staff will nominate a slate of three candidates. Nominees from the

previous months can be seen in the box at right.

For your convenience, we've included a QR code so you can vote online. Voting is cumulative, not one nominee per month. The inaugural class of the Model Railroader Hall of Fame will be announced in the December 2024 issue.

Is there a model railroader that you feel we've overlooked? Send a letter or e-mail to the addresses listed in the front of the magazine. All suggestions will be considered, but that does not guarantee they will be nominated.

## Model Railroader Hall of Fame nominees

January: Albert C. Kalmbach, Linn Westcott, and W. Allen McClelland February: John Allen, John Armstrong, and Gordon Odegard

March: Art Curren, Andy Sperandeo, and Jack Work

**April:** Gilbert A. Freitag, Iain Rice, and Frank Ellison

May: Malcolm Furlow, Dick Elwell, and John Pryke

#### **Malcolm Furlow (1946-2023)**

If you were to create a list of influential *Model Railroader* authors of the 1980s, you'd probably find Malcolm Furlow's name near the top. In addition to sharing updates on his 10 x 10 foot



Malcolm Furlow

HOn3 Denver & Rio Chama Western, Malcolm also built the 8 x 10-foot HOn3 San Juan Central and 8 x 8-foot HO scale Carbondale Central.

Malcolm pursued an art degree and spent nearly 20 years as a professional musician. After that, he constructed movie sets and models for Walt Disney Studios. A 1977 John Olsen article rekindled Malcolm's interest in the hobby.

Most of Malcolm's early articles were about his Denver & Rio Chama Western. Within five years of his first MR byline, Malcolm had become one of the hobby's most popular figures.

Malcolm is perhaps best known for building the San Juan Central, subject of a multi-part series that appeared in MR in 1983 and 1984. The model railroad was noteworthy for being our first narrow gauge project layout.

Following a successful run in the hobby, Malcolm went back to his art roots and became an internationally known painter. He returned to MR in September 2003 to share his 1:20.3 *Ferrocarril de Rio Montañas* layout.

Malcolm died in March 2023 from complications of long COVID.

#### Dick Elwell (1935-2022)

Though I never met Dick Elwell, I felt like I knew him thanks to MR. Through the various features on his HO scale Hoosac Valley (HV) layout, I could see he was an accomplished modeler. Based on the number of



Dick Elwell

times his name appeared in other articles for helping or inspiring fellow modelers, it became apparent his impact was far reaching.

Dick began work on the first Hoosac Valley in 1961. The layout was featured in the October 1990 MR and *Great Model Railroads* 1996.

Dick moved to a new house in 2002. He saved about 90% of the original HV and expanded the layout. The updated version of the layout was featured in GMR 2008 and the August 2017 MR.

"Dick was without a doubt the most thoughtful, warm, caring person I ever met, always smiling and with never a negative thing to say about anyone," said MR Contributing Editor Lou Sassi. "Not

only was he willing to open his layout to people, but he didn't hesitate to travel to other modelers' homes, giving advice when asked to do so, and helping them with the building of their own railroads."

Dick died on October 21, 2022 after a 14-year battle with cancer.

#### John Pryke (1940-2013)

For more than 45 years, John Pryke shared his modeling techniques with MR readers. During that time he covered a variety of topics, such as modeling superelevated curves, making photo backdrops, and



John Pryke

weathering steam locomotives.

John made his debut in the February 1965 MR when images of his New York, New Haven & Hartford 0-8-0 steam locomotive were printed. In August 1965, photos of his scratchbuilt model of New Haven class R-3 4-8-2 No. 3561 were published.

For a quarter century, John worked on a 25 x 35-foot HO scale model railroad depicting the New Haven between New York and Boston in September 1948. The layout, and projects related to it, were featured in MR and GMR.

Among John's most popular work was his four-part series on Union Freight, an HO scale urban switching layout. The articles appeared in the September

through December 2000 issues of MR.

In 2005, John and his wife moved to Cape Cod, Mass. There he stared work on a 12 x 20-foot HO scale layout re-creating the New Haven on Cape Cod.

John passed away on December 22, 2013 in Chatham, Mass. MR





Boston & Albany 2-8-4 Berkshire No. 1434 leads a southbound freight through Essex Junction on Dick Elwell's HO scale Hoosac Valley RR. The 32 x 62-foot layout was featured many times in the hobby press. Lou Sassi photo



This scene shows the Boston roundhouse on John Pryke's HO scale New York, New Haven & Hartford Cape Cod branch. He kitbashed the four-stall structure from a pair of Walthers kits. John Pryke photo





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## Extra 1027 West on the move

In last month's column, you were making yourself comfortable in the caboose when the conductor rattled you by asking what gave the Spud authority to depart from Kennebec. You're operating on a timetable-and-trainorder layout, and you overlooked the train order needed to occupy the main track because the Spud is an extra train, not a regular train with a schedule.

"Call me Smitty," the conductor smiles, warming up to your sincere interest in learning the ropes. "Here's what we got, Sonny." He hands over a train order to conductor and engineer (C&E) Engine No. 1027 reading ENG 1027 RUN EXTRA KENNEBEC TO IDAHO. Stapled atop the train order is a clearance addressed to C&E Extra 1027 West.

Here's an important distinction. That order makes the Spud a train going west between Kennebec and Idaho, powered by engine No. 1027. The train becomes Extra 1027 West the moment the dispatcher completes the order. The order and the clearance have different addresses because the clearance issues after the order does. Railroaders may call it "The Spud" (some chuckle "Hot Potatoes," since it's a hotshot)

but officially, it's Extra 1027 West, just like nicknames compare with full names.

The order doesn't relieve the Spud of respecting other trains, however. Their schedules have No. 11 and No. 202 running between Kennebec and Idaho while the Spud does. Both

are regular trains, superior to extras, so the Spud must work around them.

Smitty asks, "No. 11 is the first we'll see. How?" You're ready for the answer because you studied this: "We'll let him pass at Fries." Smitty had already arranged this with the engineer, so he nods and motions you to the platform to wave a highball. The Spud starts rolling, departing Kennebec at 6:50 a.m.

**Immediately Smitty asks** you about Rule 99 flag protection. "Will you drop off the rear end when we're nearly stopped and go back?" You smile and shake your head. "No, I'll drop a fusee about a mile away, when we begin to slow for the head end to get the switch." Indeed, Rule 99 begins with the phrase "When a train is moving under circumstances in which it may be overtaken by another train, the flagman must drop lighted fusees at proper intervals."

Fusees burn for 10 minutes, long enough to protect a short stop for the head brakeman to open the switch. Sure enough, the brakes squeeze soon after you drop a fusee. (Forgive me for stepping from layout operation into prototype practice briefly, but fusees and layouts don't play

well together.)

The Spud pulls in the siding. It's 7:15, clearing No. 11 by five minutes according to rule. Whether or not No. 11 reaches Fries on schedule, there's not enough time to run for Baked to meet No. 202, so you'll have to cool your wheels here for at least 40 minutes.

TRAIN ORDERS

**GIVE RIGHT.** 

WHICH IS

**SUPERIOR TO** 

**CLASS AND** 

**DIRECTION.** 

-JERRY



Jack Delano, an Office of War Information photographer, captured this January 1943 image of an Indiana Harbor Belt flagman carrying out Rule 99. Using cardstock flagmen on our layouts is a practical way to observe the rule. Photo courtesy of the Library of Congress

	WESTWARD			EASTWARD
	FIRST CLASS	STARCH DIVISION		SECOND CLASS
	NO. 11			NO. 202
L	7:05 a.m.	Kennebec	Α	8:15 a.m.
	7:20	Fries		7:55
	7:35	Baked		7:35
Α	8:15 a.m.	Idaho	L	6:50 a.m.

But here comes Smitty, with a train order he just picked up at the depot:
EXTRA 1027 WEST HAS RIGHT OVER NO. 202 FRIES TO
BAKED. Right, class and direction make one train superior to another. Train orders give right, which is superior to class and direction. This one requires No. 202 to wait for the Spud at Baked. The order tells of a dispatcher who's on his toes, expediting the Spud.

Just now, No. 11 rushes by at 7:20, starting the 10-minute countdown that spaces trains. A 10-minute fusee fits with the 10-minute spacing, you realize.

The Spud whistles off at 7:30. Smitty tests you again: "Do we head in at Baked or stay on the main?" You

answer: "The siding, because our superiority ends there and makes us inferior to No. 202." You're on solid ground. The order's wording has a specific meaning. The Spud must clear up at Baked because No. 202's superiority resumes there, entitling it to the main track.

Smitty continues: "How could we stay on the main?" "The order would state 'has right over No. 202 Fried to Baked *and at Baked*."

"You'll make a good conductor, kiddo."

Indeed, 202's waiting for the Spud at Baked. Its head brakeman lined the siding switch so the Spud heads in without delay. He'll throw the switch back when your caboose rolls by so 202 can depart promptly. The meet completed, Extra 1027 West rushed its spuds to Idaho.





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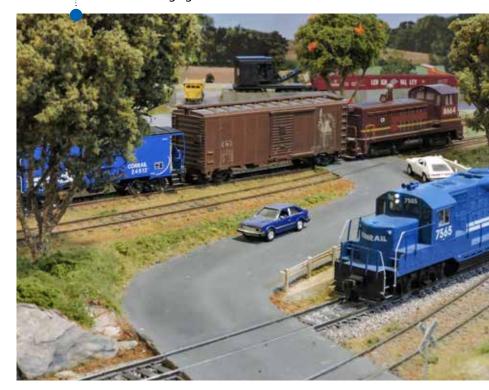
CSX Train No. S862 has just arrived at RG Tower in Philadelphia's Eastside Yard, where the outbound crew waits on the ground for the inbound crew to exit the cab. The scene is on Bruce Friedman's HO scale CSX Philly Sub, which was featured in the October 2019 *Model Railroader*. The locomotives are by ScaleTrains, with weathering by Rob Arsenault. The crew figures are from ModelU.

## Send us your photos

Trackside Photos is a showcase for the work of *Model Railroader* readers. Send your photos (digital images 5 megapixels or larger) to: *Model Railroader*, Trackside Photos, P.O. Box 1612, Waukesha, WI 53187-1612; or upload them to fileupload.kalmbach.com/contribute. For our photo submission guidelines, contact Senior Associate Editor Steven Otte at sotte@kalmbach.com.



It's Oct. 1, 1976, and six months after Conrail's creation, its new paint scheme is beginning to appear on cabooses and locomotives. The scene is part of Mark Rabenold's freelanced HO scale layout, set in Northeast Pennsylvania. Mark paved the road with Woodland Scenics Smooth-It and painted it with gray and off-white paint to give it an aged appearance. The trees were made from boxwood stems with Woodland Scenics' Fine Leaf Foliage glued to the branches.



The year is 1965 at New York, New Haven & Hartford's Cedar Hill engine pit in North Haven, Conn., where a pair of motors purchased by the NH in 1963 are being inspected in preparation for their next run to New York City. Rick Abramson of Trumbull, Conn., photographed the scene on his HO scale New Haven layout. The electric motor is by Overland Models and the Alco diesel in the foreground is from Atlas.





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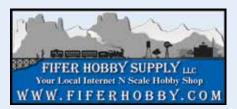
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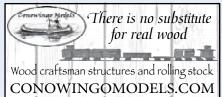
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#### Schedule of Events

AZ, GLENDALE: ARHS Model Train Swap Meet. Glendale Christian Church, 9661 North 59th Ave., Glendale, AZ 85302. Saturday, May 11, 2024, 9:00am-1:00pm. Everything Trains – Food – Fun. Admission \$5.00. Tables \$25.00 - to sign up send check or money order to: ARHS, PO Box 5816, Glendale, AZ 85312-5816. Contact: Craig Faris, 623-340-3529

CA, LONG BEACH: Join us by the Pacific Ocean in Long Beach, California for the SurfLiner 2024 NMRA National Convention, August 4 - 11, 2024! Clinics, Layouts, Prototype Tours, General Interest Tours, and more. Bring the family to beautiful Southern California! Register today! www.SurfLiner2024.org

CA, OCEANSIDE: North County Model Railroad Society Model Train Swap Meet and Club Layout Tour. Saturday, May 11, 2024, 8:00am-1:00pm, at Oceanside Heritage Park, 220 Peyri Dr., Oceanside, CA 92058. Door prizes for kids and Grand Prize Raffle. Food/Drinks available. Admission is free. Vendor space \$10. Vendor registration, contact John Burrow at swapinfo@ncmrs.org

FL, BROOKSVILLE: Regal Railways presents Toy Trains & Hobby Show. Hernando Fairgrounds, 6436 Broad St., Brooksville, FL 34601. Saturday, May 18, 2024. 9:00am-2:00pm. Admission: \$6.00 adults, children under 12 free. Vendors and operating layout. Lunch available. Contact: Joe at 727-244-1341 or visit: www.regalrailways.com for more information.

IL, COLLINSVILLE: 17th Annual St. Louis Railroad II., COLLINSVILLE: 1/th Annual St. Louis Hailroad Prototype Modelers Meet. Gateway Convention Center, 1 Gateway Dr., Collinsville, IL 62234. July 19-20, 2024, Friday 9:00am-9:00pm and Saturday 9:00am-9:00pm and Saturday 9:00am-9:00pm and Saturday 9:00am-9:00pm or Contact: 10 contact of the Lonnie Bathurst at bathurst@litchfieldil.com or 217-556-0314

IN, SOUTH BEND: Around The Bend Midwest Regional Convention hosted by the Michiana Division NMRA. May 2-4, 2024. The Century Center, 120 Dr. Martin Luther King Jr. Blvd., South Bend, IN. Open to the public. A great event for both veterans and beginners in the hobby. Clinics, layout tours, operating sessions, and more! Further information, visit: 2024AroundTheBend.com KS, HERINGTON: Herington Railroad Days, April 27-28, 2024. Saturday, 9am-5pm, Sunday 10am-4pm. Herington Community Building, 810 S. Broadway, Herington, KS 67449. Admission by donation. Buy/Sell/Trade model railroad equipment and railroad memorabilia, clinics, workshops, operating layouts. Concessions and free parking. Visit the Historical Museum and Railroad Annex. Visit: heringtonrailroaddays.com or email: heringtonrailroaddays@mail.com email: heringtonrailroaddays@gmail.com

WOODBURY: Newport Model BB Club Train MIN, WOODBORT: Newport Model HI Club Irain Flea Market. Woodbury High School, 2665 Woodlane Drive, Woodbury, MN 55125. Saturday, May 4, 2024, 9:00am-2:00pm. Admission \$5.00. Club Address: Newport Train Club, PO Box 0061, St. Paul Park, MN 55071. Contact: Don, 763-257-5443

NC, RALEIGH: Neuse River Valley Model Railroad Club 6th Annual SPRING Into TRAINS Show. Agri Supply Exposition Center, NC State Fairgrounds, 4825 Trinity Road. May 4-5, 9am-5pm. Admission: \$10 covers both days, children 12 and under admitted free with adult. 300 tables of model railroading and railroadiana. Contact George Lasley, 919-757-4503, email: gwlasley52@gmail.com, visit www.nrvclub.net Lasley, 919-757-www.nrvclub.net

NE, PAPILLION: NE-IA Railroaders 2024 Train and Toy Show. April 6-7, 2024. Saturday 9am-4pm, Sunday 9am-2pm. Admission: \$8.00, 12 and under FREE. Papillion Landing, 1022 W. Lincoln St., Papillion, NE. 72,000 sq.ft. of train and toy items for sale, plus vendors, layouts and much more! Information: Rick Jones, 402-990-1274, or visit: www NehraskalowaRailroaders com

NJ, BRICK: ECTP and Collectibles LLC presents The Brick Train Show. Elks Lodge, 2491 Hooper Avenue, Brick, NJ 08723. Sunday, May 19, 2024, 9:00am-2:00pm. Admission: \$7.00; under 12 free with adult. John LaLima 732-845-5966. Go to www.eastcoasttrainparts.com and click on The Brick Show.

PA, MONACA: Beaver County Model RR Spring Train Show & Sale. Monaca Turners, 1700 Old Brodhead Road. Saturday, April 6, 2024, 10:00am-3:00pm. Adults \$5.00, under 12 free wadult. All scales, 50/50 raffle, food, fun for the whole family! Sponsored by Beaver County Model RR & Historical Society. Contact: Walt Steiner, 724-843-3783 or

TN, JOHNSON CITY: BIG TRAIN SHOW, May 31-June 1, 2024. Host: George L. Carter Railroad Museum. 330+ tables, 64,000 sq.ft. All scales, operating layouts, vendors, memorabilia, books, food. ETSU "Mini-Dome" Noon-6pm Friday, 10am-4pm Saturday. Admission: \$8 per day, under 12 Free. Free covered parking. Contact Roger Teinert 423-791-4937 or www.etsu.edu/railroad

WA, KELSO: LK&R MRR Club Spring 2024 Model Train and Toy Show & Swap Meet. Saturday & Sunday, May 4-5, 2024, 10am-4pm. Admission: \$5.00. Three Rivers Mall, Kelso, WA. Interstate 5, Exit 39, southwest corner. Over 150 tables. For more information, visit: http://lkrtrains.yolasite.com or contact Howard at 360-751-7276, email: flickh@yahoo.com

WV, CHARLESTON: KVRA MODEL RAILROAD SHOW. Charleston Convention Center. 200 Civic Center Dr., Charleston, WV 25301. May 4 - 5, 2024. Saturday, 10am-4pm & Sunday, 10am-4pm. Admission \$6.00, children under 12 free. Tables \$40.00. Clinics, layouts, new and used equipment for sale. Website: www.kvrailroad.org. Contact Joe: 304-539-6721 or kvrailroad@gmail.com

WY, CHEYENNE: Sherman Hill Annual Train Show. Event Center at Archer. (I-80 East, exit 370) 3801 Archer Pkwy, Cheyenne, WY 82009. June 29 & 30, 2024. Saturday 9am-5pm; Sunday 10am-3pm. Admission: Adults \$10.00. Childrenunder12free.AllScales, modeltrainvendors, operating layouts, door prizes. For info call: Rick Caldwell, 307-321-3644 or email: shmrrcts@gmail.com

All listed events were confirmed as active. at the time of press. Please contact event sponsor for current status of the event.

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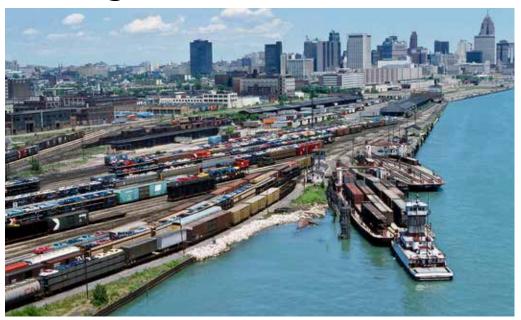
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## Floating cars across the Detroit River



When he got stuck in holiday traffic on the Ambassador Bridge between the U.S. and Canada, Bruce Ernatt hopped out of his car to photograph the Norfolk & Western (ex-Wabash) Boat Yard in Detroit, Mich., in July 1977. Bruce Ernatt photo

**Every so often,** a photo comes to my attention that shows a scene tailor-made for modeling. So it is with this photo by Bruce Ernatt.

Bruce was crossing the Ambassador Bridge between Windsor, Ontario, and Detroit and got stuck in holiday traffic back on July 7, 1977. Like any good railfan, Bruce had his camera with him and seized the opportunity to shoot the Norfolk & Western (formerly Wabash) Boat Yard along the Detroit River. The yard was also served by the Chesapeake & Ohio's river ferries.

I can remember several occasions when having a camera tucked under the seat of my car enabled me to get photos that I prize today. It has become much easier to do this with the advent of high-quality cameras built into cell phones, of course, so hardly anything of import passes unrecorded in the digital age. But luck is still most often a case where preparedness meets opportunity.

#### The Wabash main line

between Kansas City, Mo., and Buffalo, N.Y., actually passed through Canada, so it faced the problem of getting cars across the Detroit River. (The Grand Trunk Western, Michigan Central, and Pere Marquette had similar challenges.) The tug in the photo ushered car floats back and forth across the river.

Over the years, this was done with car ferries until the three remaining ferries had their engines removed and were converted into car floats with four tracks instead of three. Thereafter, they were moved by tugs.

Fritz Milhaupt tells me that Norfolk & Western and successor Norfolk Southern continued this until April 30, 1994. By then, one tube of the Michigan Central Detroit River Tunnel had been enlarged sufficiently to allow for tall cars such as tri-level auto racks to pass through.

It's hard to imagine that these car floats were actually segments of the former Wabash main line. But as a Nickel Plate Road fan, I can tell you that competitor Wabash gave a very good account of itself between Kansas City, St. Louis, and Buffalo.

This suggests a great modeling opportunity for those with restricted space. A small riverside yard, perhaps fed by

hidden staging, could in turn feed a car float or two that sails on specific schedules — this is a "mainline" operation, after all!

"Sailing" could involve cycling waybills to convert outbound to inbound cars, or the car floats could be physically moved to allow the consists to be changed. If the floats are stationary, adjacent storage shelves or

drawers could allow swapping cars for variety very much like a fiddle yard.

In fact, Marshall Stull has done this as Free-mo modules (see smallmr.com/wordpress/ the-boat-yard/). He has done a lot of homework, and you can see how the Boat Yard appeared over the years, as well as how he plans to model it in HO scale as it appeared in the 1980s. He's building a series of modules that measure 26" x 50", except for the one with the arrival track, which is 43" wide. Altogether, they add up to a length of 25'. In N scale, that would be around 15', the length of a spare-room wall.

Marshall also discusses his operating plans, including the all-important practice of loading the car float so as to keep the weight evenly distributed to avoid capsizing the float. This makes switching a car float much more challenging, hence interesting, than switching cars in a land-based yard of an equivalent number of tracks.

There are few aspects of railroading more interesting than the rail-marine inter-

face, be it a river crossing, one of the Great Lakes ports, or a saltwater harbor. A yard and a car slip can be a complete Layout Design Element — that is, a visually and operationally recognizable model of an actual location, like Marshall's modules. And having a chance to model a car ferry, car float, barge, and/or tugboat offers welcome variety. MR



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The Venture series is the latest generation of medium-distance passenger railcars for North America. Constructed by Siemens Mobility in California, the cars currently see use on Amtrak' state-supported services in certain regions, while VIA Rail Canada™ operates the series on corridor services in eastern Canada. The Bachmann Venture Cars have been developed in collaboration with Siemens, using original design documentation to ensure prototypical accuracy for each variation and maximize realistic operation.

#### Features include:

- · All-new tooling
- Authentically furnished and lighted interior
- · Road-specific exterior configuration
- User-controlled marker lights
- · Magnetically operated E-Z Mate® Mark II couplers
- · Optional close-couplers for enhanced realism
- Blackened machined metal wheels with RP25 contours

AMTRAK MIDWEST COACH #4001

Item No. 74501

AMTRAK MIDWEST COACH #4004 Item No. 74502

AMTRAK MIDWEST COACH #4008 Item No. 74503

AMTRAK MIDWEST " COACH #4015 Item No. 74504



User-controlled LED marker lights

Available Now in HO Scale coming soon in N Scale













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