

October 2016  
Free Edition

# Trackside Model Railroading™

**Southwestern Pacific in HO Scale  
Construct a Concrete Culvert  
For Your Layout  
Pacific Northwestern Railroad  
in HO Scale**



Trackside  
**Model Railroading™**  
Digital Magazine  
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Free  
Edition

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# From the Publishers

October 2016

Thank you for reading the October 2016 Free Edition of *Trackside Model Railroading*. This month we tour Mike McGinley's Southwestern Pacific and the late Tom Enloe's Pacific Northwestern, both HO scale layouts. Mike's Southwestern Pacific runs the BNSF, Santa Fe, Union Pacific, Southern Pacific, and occasionally the freelanced Southwestern Pacific and operates in various different eras. Our tour of the layout is based in 2006 after the Union Pacific merger and features Union Pacific power and patched Southern Pacific locomotives. The layout is based in the beautiful American Southwest and includes an article, photographs, and video.

Tom Enloe's layout is the Pacific Northwestern, a freelanced joint venture between the Southern Pacific and the Great Northern which crosses the Cascade Mountains in Oregon to reach the Oregon Coast. Tom modeled the layout with a group of friends but passed away last year.

The PNW is currently being dismantled. We include an article, photographs, and video of Tom's layout in the feature.

Our project this month shows you how to construct a concrete culvert on a layout or diorama using styrene plastic. We explain the process as well as showing specific steps with a photograph to illustrate each one. The project is not difficult and should be suitable for newer modelers.

The desktop images for this month are shown to the right. Thanks for reading!  
-TS

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# In Case You Missed It:

## Recent Railroading Events in the News

By Jennifer Waters

### North America

#### September 2, 2016

Railroad traffic in all of North America has continued to show a decrease from last year. In the United States, overall carloads moved the last week of August were down 7.3% from the same week last year. The transport of grain, motor vehicles and parts, and other farm products increased. However, petroleum and petroleum products, coal, and metallic ores and metals decreased. Canada showed an overall decrease of rail traffic of 5.3% and Mexican railroads showed an overall decrease of 10.8%. U.S. total traffic volume for the first 34 weeks of 2016 is down 7.2% from the same period in 2015.

### Calgary, Alberta, Canada

#### September 6, 2016

In Alberta, Canada, the expenditure of 136 million Canadian dollars on new light rail vehicles and work on transit stations has been approved. The project also includes the expansion of the Southeast Bus Rapid Transitway. The government plans to purchase the new "Mask" C-Train cars for

the transit system. Each train can carry about 800 passengers.

### Pacific Northwest, USA

#### September 12, 2016

The BNSF began offering faster intermodal transport between the Pacific Northwest and Texas on September 12, 2016. Freight moving from Portland, Oregon or Seattle to the Dallas/Fort Worth area via Denver will now be transported about two days faster than it has been moved in the past. This includes agricultural freight and will speed up the movement of apples and other produce harvested in the PNW that are destined for the south.

### Seoul, South Korea

### Watford, England

#### September 16, 2016

Parts of the UK received heavy rain on Friday, September 16th, causing a landslide over the railroad tracks in Watford, England. A southbound train hit the landslide and then that train was lightly hit by a second train. It was reported that the driver of the

train sustained a back injury, and two passengers were treated for minor injuries. The Oxfordshire, Berkshire, Didcot Parkway, and Newbury stations also experienced some flooding from the rain and more delays and service disruptions were caused by that flooding.

### Seoul, South Korea

#### September 20, 2016

U.S. shippers report that the bankruptcy of Hanjin Shipping Company, based in South Korea, is causing major disruptions in freight movement. Shippers report ongoing confusion about the location of freight. Also, Hanjin's creditors have seized a number of shipments when they docked. Companies have been forced to look for other shipping options at higher rates and with higher charges at pickup. The National Retail Federation (NRF) has written numerous letters to the U.S. Commerce Secretary Penny Pritzker urging her to work with the government of South Korea to help resolve the issue.

### Ferryville, Wisconsin, USA

#### September 22, 2016

Two locomotives and five cars on a BNSF train derailed after the tracks washed out in mudslides in Wisconsin on Thursday, September 22nd. The area received heavy

rains for two consecutive nights, leading to the mudslides. A few of the rail cars were empty, one held ethanol but did not leak, and two held drywall. One of the locomotives spilled about 1,000 gallons of diesel fuel, mostly right by the tracks. The derailment occurred near the Upper Mississippi River National Wildlife and Fish Refuge, and cleanup crews placed an absorbent boom to soak up any diesel and attempt to keep it from draining toward the river.

### Eugene, Oregon, USA

#### September 26, 2016

Thirteen rail cars on a Union Pacific train derailed in Eugene, Oregon on Sunday, September 26<sup>th</sup>. One of the cars contained hazardous materials, but did not leak. The derailment was not on the mainline, but it caused a delay of Amtrak's No. 11 Coast Starlight passenger train, which runs daily from Seattle to San Diego.

### Honolulu, Hawaii, USA

#### September 26, 2016

The Honolulu Authority for Rapid Transportation (HART) held a public viewing of one of its new driverless trains. The trains are the first of their kind in the United States. Construction of the light rail system is in progress, and the first section is scheduled to begin operations in 2020. The route will be 20 miles long and will connect the airport, the stadium, and downtown Honolulu.-TS

# Southwestern Pacific Circa 2006

Story by Jennifer Waters

Photos by Ross and Jennifer Waters

Mike McGinley models the Southwestern Pacific (SWP), a freelanced HO scale model railroad based in the southwestern United States. Both Santa Fe and Southern Pacific have trackage rights on the layout, plus Mike occasionally runs his own freelanced SWP equipment. He runs the layout in various eras, but we shot it as a 2006 railroad with SP units patched and running under Union Pacific ownership. Mike sometimes steps the model railroad back to 2001, 1996, 1991, 1986, 1971, 1966, or 1951. This way, he can run BNSF, Santa Fe, Union Pacific, Southern

Pacific, and Amtrak on the layout.

2006 is the year that Mike retired after 20 years working with the SP, 14 years with the Metrolink commuter line in Los Angeles, and 12 years as a consulting engineer with the railroad.

Mike has been a railfan since his childhood, and in addition to working for the railroad he has built a few tabletop layouts and visited many layouts and clubs. He started planning the Southwestern Pacific in the early 1990s, using John Armstrong's *Track Planning for Realistic Operation* as a guide.

At the time, Mike and his wife Laura lived in California and he constructed the layout in their basement starting in 1995. In 2011, they moved to the Washougal area in southwestern

An intermodal train crosses the Little Hernandez Viaduct.



Washington State, and moved the layout with them.

One of the first things a visitor to the SWP notices is the amazing backdrop Mike painted in the layout's new home in their 3-car detached garage. The backdrop is eight feet high on some of the walls and 10 feet high on others (2.44 and 3.05 meters high). Mike even painted the garage doors. The effect is that from almost anywhere you

stand, the scene before you is spectacular. The railroad is 18x22 feet (5.49x6.71 meters) and is based in California, New Mexico, Arizona, and Colorado with scenic rivers flowing through wooded scenes and canyons of red rocks.

Patched Union Pacific No. 1480 is on point of this train heading eastbound out of town.





**Above Left:** Traffic waits for a UP intermodal as it heads through McDonald.

**Below Left:** The foreman at Hawkins Markets Central Warehouse watches as the SP switcher spots a car at the facility.



The canyons on the layout are reminiscent of Lamy, New Mexico, one of the areas where Mike and Laura have enjoyed vacationing over the years. The forested areas are similar to the Rocky Mountains or the Cascades, and the arid red rocks are familiar to any Arizona traveler.

The largest town on the layout, where the railroad meets the coast, is a non-specific West Coast port somewhat similar to Portland, Oregon or Oakland, California.

From there, the railroad operates Patrick Yard, an intermodal yard that ships freight from various industries in and out of the port and eastward (off the layout) to Kansas City.

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No. 5788 passes through Marathon on the high line.





Mike painted the Cascade River after rivers he observed in Colorado.

From Patrick Yard, the mainline travels along the Cascade River into a tunnel. After the tunnel, trains emerge 200 miles to the east and then arrive in Paseo (a former division point and helper station at the base of a climb to the high deserts) before travelling over the duckunder bridge at Carbon Junction.

Mike will be removing the bridge soon and replacing it with a lift-out segment instead. After Carbon Junction, trains travel on the

high line toward Marathon and loop around the outside of the layout over the Little and Big Hernandez viaducts over the Rio Hernandez. Traffic then arrives at LM Junction and can either travel through the town of McDonald or bypass town and go to Ancho. McDonald was Laura's maiden name, and the town is central to the layout.

McDonald includes a large removable section in the center in case Mike needs access to the lights above the layout or if he needs to perform other maintenance. Trains can travel through McDonald in a loop before heading to Carbon Canyon and back

over the bridge at Carbon Junction. As well as alternating the locomotives and rolling stock by era, Mike changes out a few of the structures to match the year in which he is operating. The stations are removable, as he built them on Gatorfoam® board. Many of the structures for the various industries are also interchangeable, like the metal grain bins that change into a wood grain elevator. The LPG distributor becomes a petroleum products company when Mike steps back in time, and the Modern Metals dealer becomes a brick cannery when the layout is set back to the 1960s or 1970s. The automobiles change out too, but there is always some "Detroit Iron" out on the

highways.

When Mike and his wife moved, he wanted to keep his layout and reconstruct it at their new home. With the help of several friends, he broke down the layout and drove it from California to Washington. He used a small saw to cut out 3 inch sections of track, also cutting the insulation foam scenery.

He built the original benchwork with the option to deconstruct the layout, using 1x4" frames about 30x60" long (.76x1.52 meters).

UP No. 5788, an AC44CWCTE, approaches the duckunder bridge at Carbon Junction.



**Stats:**

Layout Owner: Mike McGinley  
Prototype: Freelanced, with Strong Southern Pacific and Santa Fe Influence  
Scale: HO (1:87)  
Layout Size: 18x22 Feet (5.49x6.71 Meters)  
Era: 1951-2006 with Era-Specific Structures and Rolling Stock  
Track Height: 46" to 54" (1.17 to 1.37 Meters)  
Mainline Length: 110 Feet (1.81 Miles)  
Style: Linear Walkaround Originating from Urban Intermodal Terminal on Single Mainline  
Benchwork: Modular 1x4 Frames for Portability  
Roadbed: 1/4" Plywood, Mixed Cork, Homasote®, and Wood Ballast Board  
Track: Precision Scale Super Elevated Flex Code 83 on Curves, Mixed Code 83 Elsewhere  
Turnouts: Various, Gradually Converting to Peco  
Minimum Radius: 36" on Mainline with Santa Fe Prototype Spirals  
Ruling Grade: 2.2%  
Backdrop: Hand Painted on 4x8 Foot Celotex Panels and Moved with the Layout, Extended to All Visible Walls.  
Scenery: Mostly Carved Polystyrene Foam with Some Plaster Rock and Some Foamboard  
Control: NCE DCC with Automatic Block Signals



Click on the image above to go to the video page and watch the videos of Mike McGinley's Southwestern Pacific.

**Upper Right:** An intermodal train heads toward Marathon.

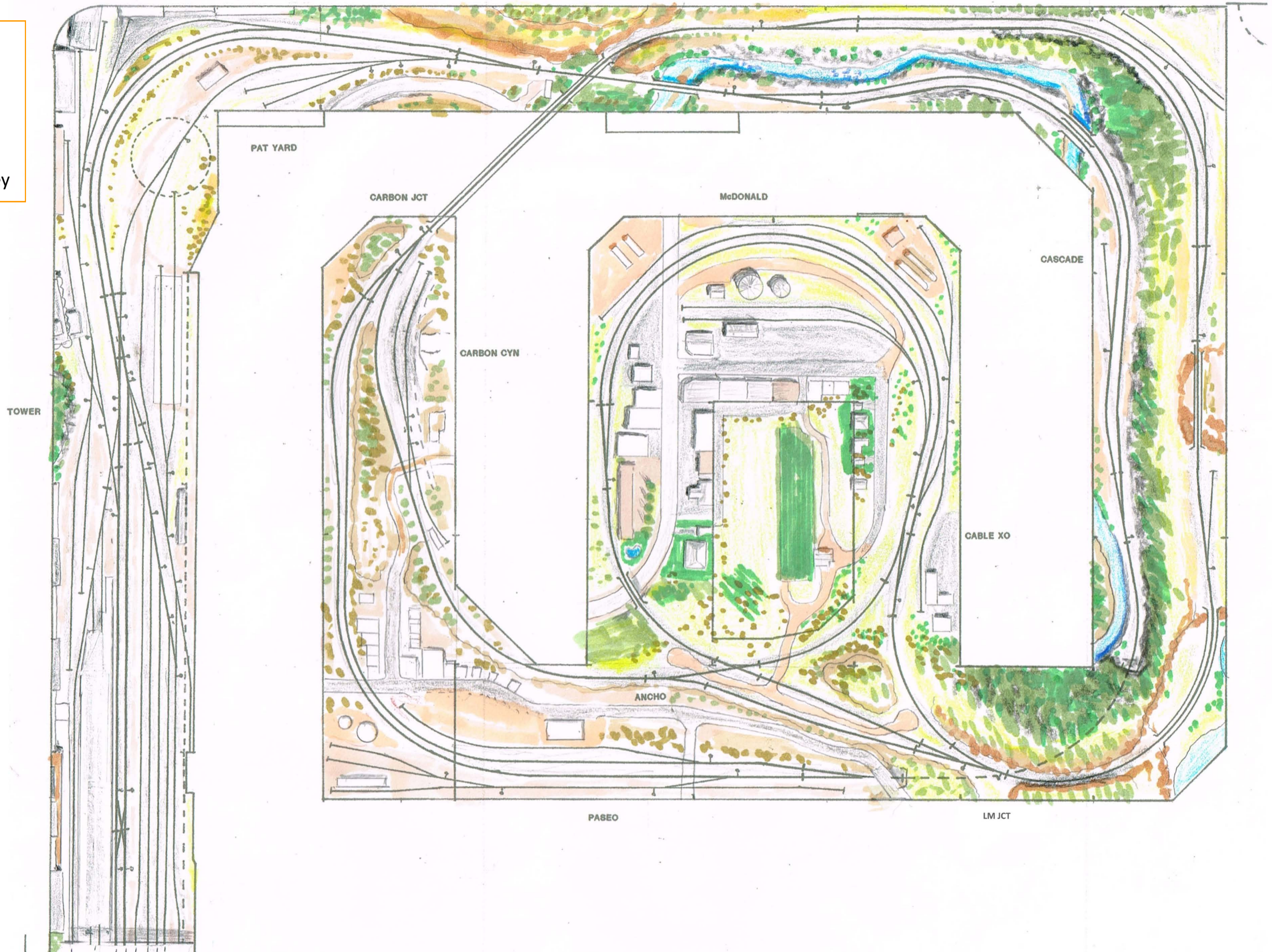
**Lower Right:** The crew has just built this train in Patrick Yard and is awaiting permission to proceed onto the mainline.

Using insulation foam kept the layout light enough for transport when the time came to move. After settling in their new home, Mike reconstructed the layout and painted the new backdrop on all the walls in the garage. He also repainted the Cascade River after some of the rivers he had observed in Colorado and he added more trees to the pike.





Mike McGinley  
Southwestern Pacific  
HO Scale  
18x22 Feet  
(5.49x6.71 Meters)  
Drawn by Mike McGinley



Mike's experience of working with the prototype influenced some of his modeling choices for the Southwestern Pacific. One of things that was important to him was to create the realistic look of super elevated curves on the layout. He made a template of the Santa Fe engineering standard spiral in HO scale, as it was the easiest to calculate, and then plotted the 18" long spiral onto clear plastic and cut it out. That spiral is very close to the prototypical standard for curves and accommodates the super elevation

No. 3975, an SD70M, travels through Paseo and will go through the tunnel westbound toward Cascade.

transition necessary to avoid derailments.

As he was a civil engineer, Mike enjoyed the challenge of incorporating his work into his modeling.

Another thing Mike wanted to include on the SWP was working signals. Starting with Integrated Signal Systems components in 1996, he installed automatic block signals with "OS" detectors on every switch so that signals drop to red as soon as the engine passes, perfectly mimicking prototype action. In 2014, he transitioned from DC to DCC.

In a few of the signal blocks the old "Twin T" diode pair detectors would not work, so the DCC transformer "tombstone" detectors

were installed and proved to be compatible with the rest of the system. Mike has not yet run any official operating sessions, though now that he has DCC installed he could do so fairly easily. He now uses NCE control with wireless radio cabs.

Mike has plans to change a few things on the layout. He wants to add a new section along the far wall in the garage. The new area will be further east than the rest of the layout. He also plans to add a new yard on the opposite side of Patrick Yard, at the west end of the layout in the workroom. He originally had a holding yard under the layout where he stored trains that were not correct for the timeframe he was currently running on the layout. He found that he did not enjoy operating or maintaining the yard, so he got rid of it and now stores extra locomotives and rolling stock in boxes until he is ready to change the time period to run them again. The new yard will allow more room for staging trains without having to store as many in boxes. After some test track experiments, Mike plans to use a 30" radius for the curve into the new yard as it is not one of the more scenic areas. (Currently, all curves on the layout use a 36" radius.)



An eastbound UP train arrives in Paseo. The second locomotive on this train is SP No. 4837, an EMD GP38-2, which will later be repainted as UP No. 603.

Mike participates in some of the local model railroad tours when they are in the area if you are interested in seeing the layout in person. In the meantime, be sure to view the videos of the layout from the link on page 14.  
-TS



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# Construct a Concrete Culvert on Your Layout

By Ross and Jennifer Waters

This month we will show you how to create a concrete culvert with a corrugated metal drainage pipe to install under a road or under the railroad tracks in an area that might feasibly flood during certain times of the year. We will be using a piece of styrene plastic and drilling a hole to install the pipe in the center.

We made our culverts 9 ½ scale feet wide and 3 scale feet tall. We removed the corners at the top (2 scale feet in) and notched and bent a 2 foot section inward on each side.

First, you will want to measure the area you plan to install concrete culverts to determine the size you will need. After the measurements are taken, outline your styrene and mark and score it with a razor knife. We made two culverts (one for each side of the road) so that water can drain from one side of the road to the other without flooding the area. Once you have marked the overall size and before making any cuts, mark the center and drill out the hole for the pipe in both culverts. (We used a 3/16" bolt to form the pipe, a 3/16" dowel, and a ¼" drill bit. The drill bit needs to be slightly larger than your finished pipe so that you can slide the pipe into the drilled out hole.) You will want to mark the center of the

## What You Will Need:

1/16" Thick Styrene Plastic  
Razor Knife  
Drill with Bit (We Used a ¼" Bit)  
Aluminum Foil  
Scissors  
White Glue  
White Glue Watered Down by 50%  
Small Wooden Dowel (We Used a 3/16")  
Bolt (We Used a 3/16" Bolt)  
Pencil  
Scale Ruler  
Acrylic Paint (We Used Polly Scale "Concrete" with a Little "Reefer White" to Lighten it)  
Wet Water in a Spritz Bottle (Water with a Drop of Soap)

hole for the pipe and then rotate the razor knife over the center while applying a little pressure. This way, when you begin to drill with the drill bit it will not "walk" and drill in the wrong place. You can begin to drill a little on the table, but obviously you will want to be cautious and will need to

remove the styrene from the table before drilling very far so you will not damage your work table.

Once the holes for the pipe are complete, you can begin cutting out the culverts. We cut along the outside dimensions about 1/8 of the way through the styrene and then pressed the plastic against a straight edge to break it. After cutting the overall size, we cut off the two upper corners on each side by scoring them first and then pressing them against the straight edge of the styrene to break them off completely. Then we scored each side at 2 feet in and bent the edges in without breaking them completely. You will want to be careful when doing this, as it is easy to break them on accident. We found that three pieces of 1/16" thick styrene beneath the culvert piece was the right thickness to help keep us from pushing too hard and breaking the plastic clear through.

Now that your culverts are cut out, you are ready to make the corrugated pipes. We used a US standard machine bolt and wrapped a piece of aluminum foil around it three layers thick. If you press your thumb lightly into the groove of the bolt and turn it, you can make the corrugation more obvious. Just be careful not to press too hard, or you will tear the foil. Carefully remove the aluminum foil from the bolt and place it tightly over the dowel. Then apply a drop of white glue and spread it over

the whole aluminum foil pipe, being careful not to get any on the dowel.

The pipe will need some time to dry, and then you can glue it into the culvert. To do so, place it so that it is sticking out of the culvert in the front however far you like, then turn it upside down and draw a bead of white glue around the pipe. This will need to dry for a while. Once dry, you are ready to paint the culvert to look like concrete. We used Polly Scale Concrete color and a little Reefer White to lighten it. Allow the paint a little time to dry.

If you are installing your culvert in an area that is already scenicked, you may need to remove a little ground cover or dig a notch in the plaster hardshell to help fit the culvert into place. Try to make sure that the culvert fits in low enough that it could realistically function as a drain.

Install the culverts in place and then repair the scenery around them. This may mean ballast, sand, groundcover, or whatever will blend them into the area. Our culverts are installed under a road, so we added our dirt/ballast mixture that we used for the edges of the road to match the scenery that was already there.

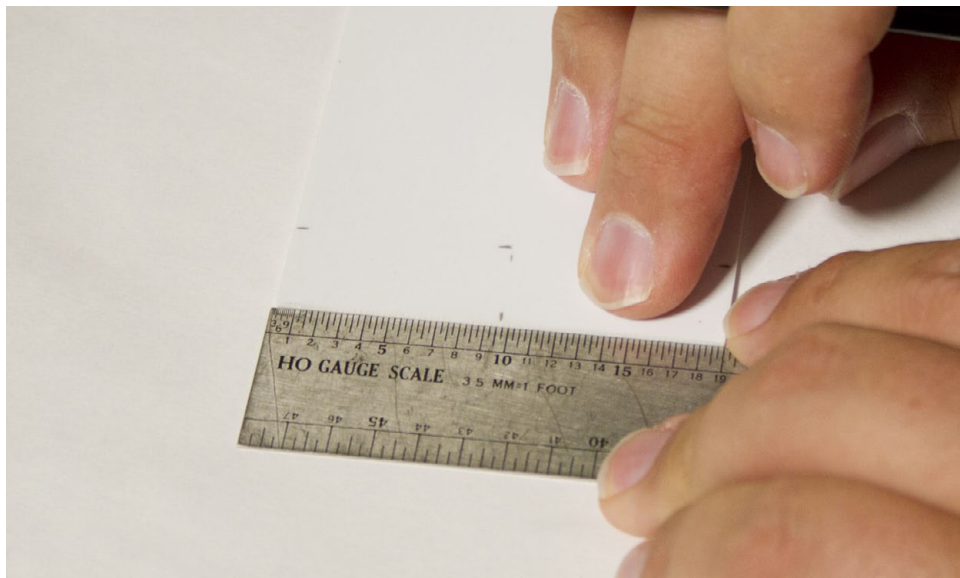
Follow the steps in the following pages. Each one is illustrated with a photograph to help with clarity. This project should be simple enough for newer modelers to complete.-TS

**1** Determine the size you need to make your culverts and then use a scale ruler to measure them and mark them with a pencil. We made ours 9.5x3 scale feet (in HO scale).



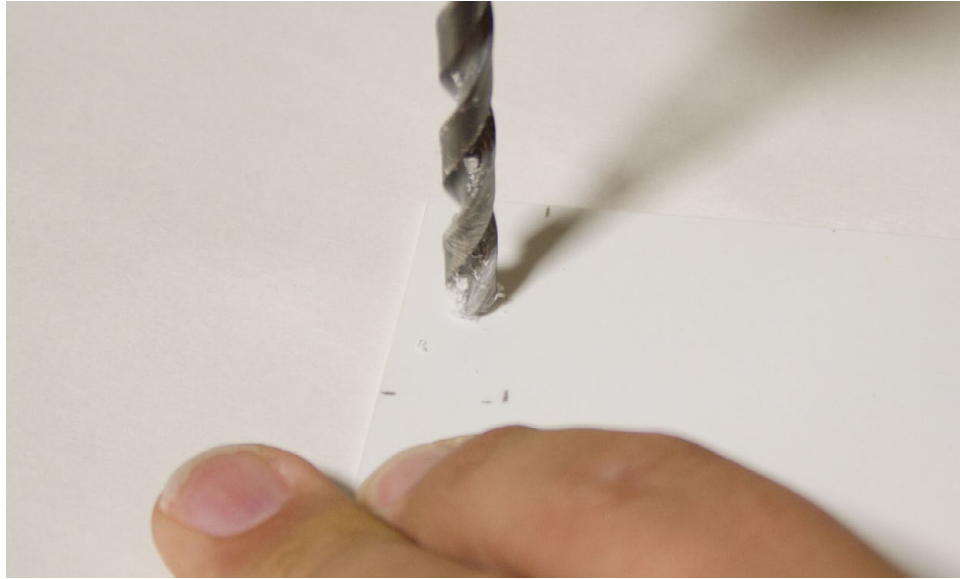
**3** Make a dot at the center of each culvert. This is where you will drill out a hole for the pipe to come through the culvert.

**2** Here, we are marking the line between the two culverts (at 9.5 feet).



**4** Use a razor knife to make a slight indentation at the center point of the hole for the pipe. This will keep the drill bit from “walking” out of place when you begin to drill the hole.

**5** Place the drill bit carefully where you need to drill the hole. You can start to drill it on a table like we did here, but you once the hole is started you will need to pick up the plastic and hold it tightly with your hand or in a vice.



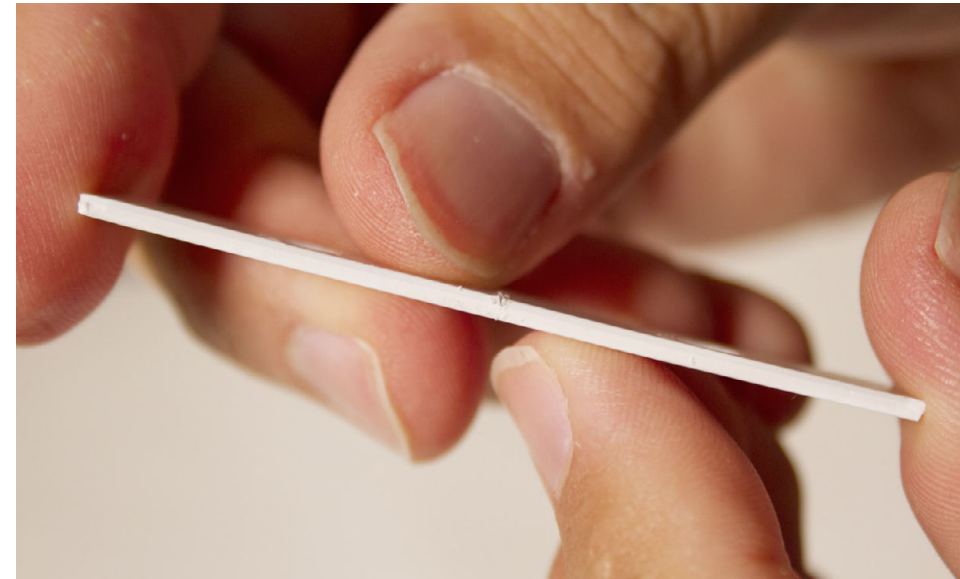
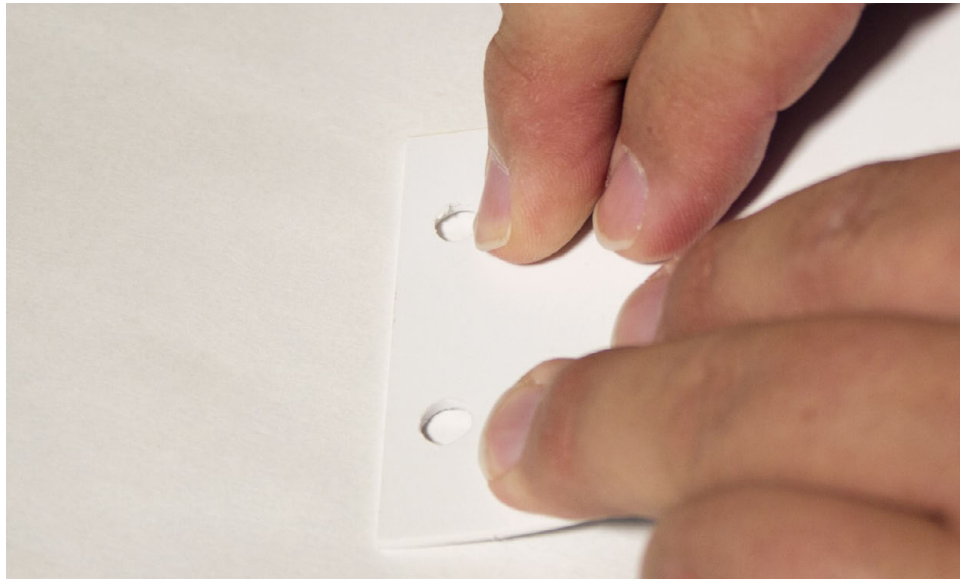
**7** Cut out the length of the culverts with the razor knife. You will want to score the sheet using the straight edge of the scale ruler.

**6** After drilling the holes for both pipes to come through the culverts, your styrene sheet should look like this. Now you are ready to cut out the culverts. (It is best to cut the holes first while you can still hold onto the plastic somewhat easily.



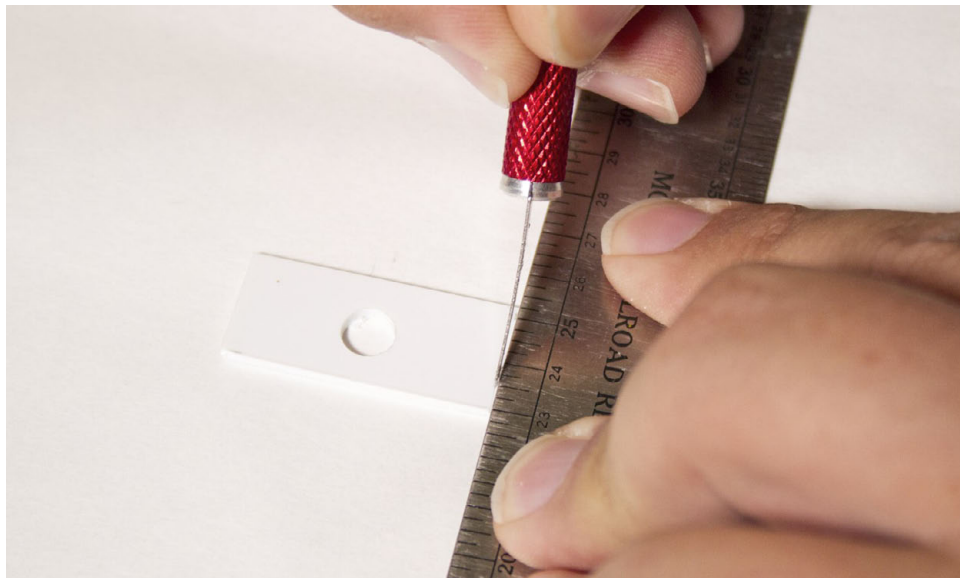
**8** Score the line a few more times with the knife.

**9** Once you have scored the sheet several times, break it along the line.



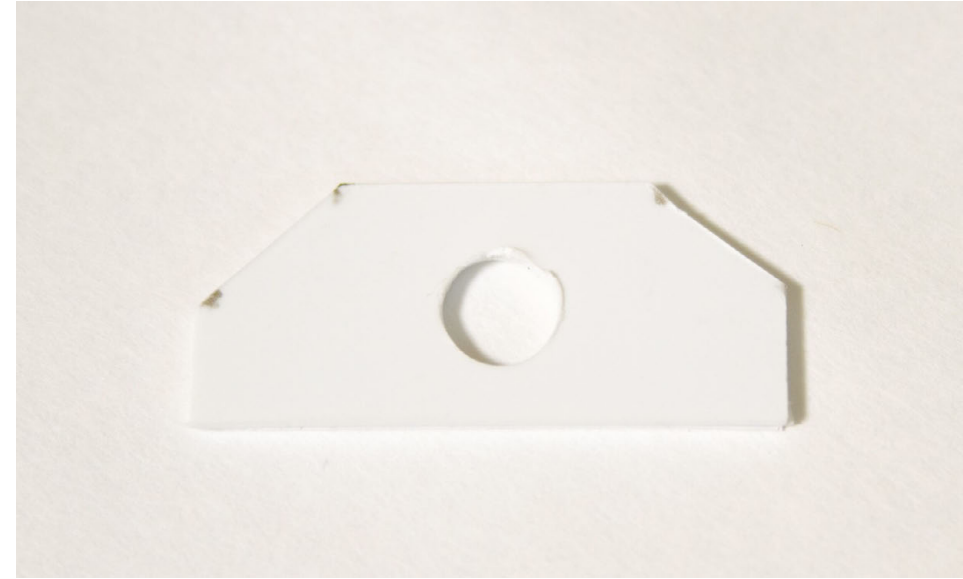
**11** The score does not have to be very far through the styrene to make a clean break.

**10** Now cut the two culverts apart from each other, following steps 7-9.



**12** Now mark the upper corners which need to be removed. We marked to 2 scale feet and then broke off the corner at that angle.

**13** Here, we are cutting the corner off.



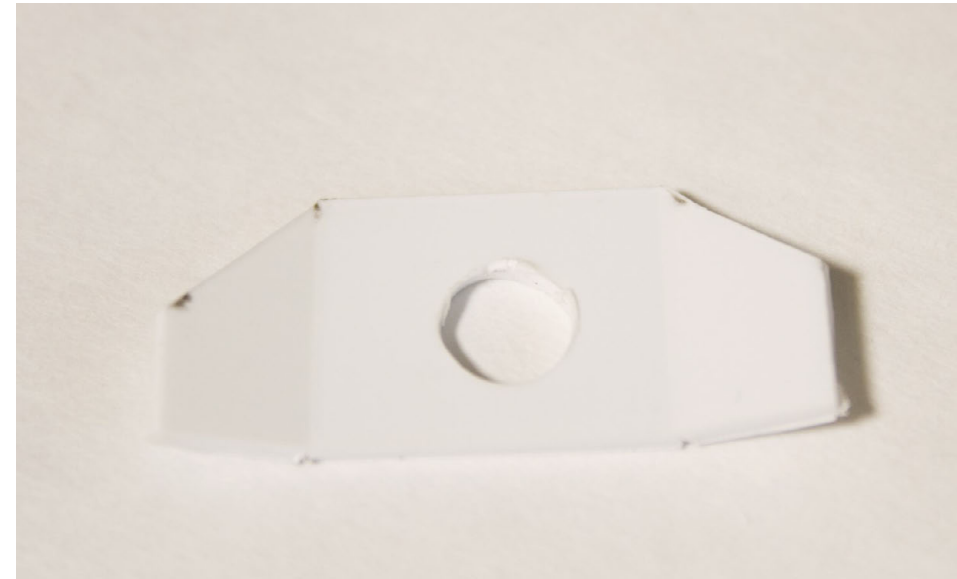
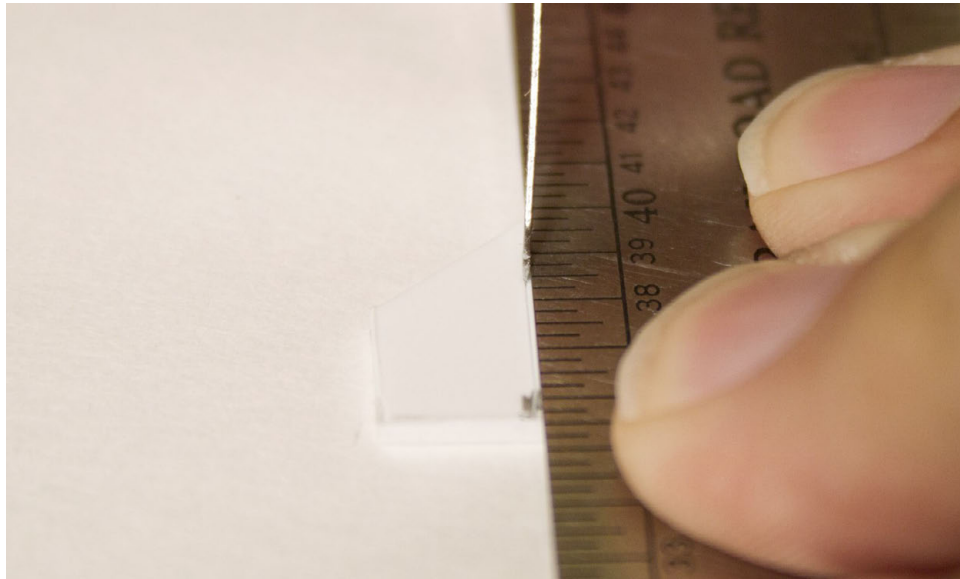
**15** Each of your culverts should look like this one once you have removed the upper corners.

**14** With the smaller pieces, it is easier to place the plastic edge over another piece of styrene or straight edge and press on it with a pencil or knife to break it free. We used the straight edge of the scissors for our break.



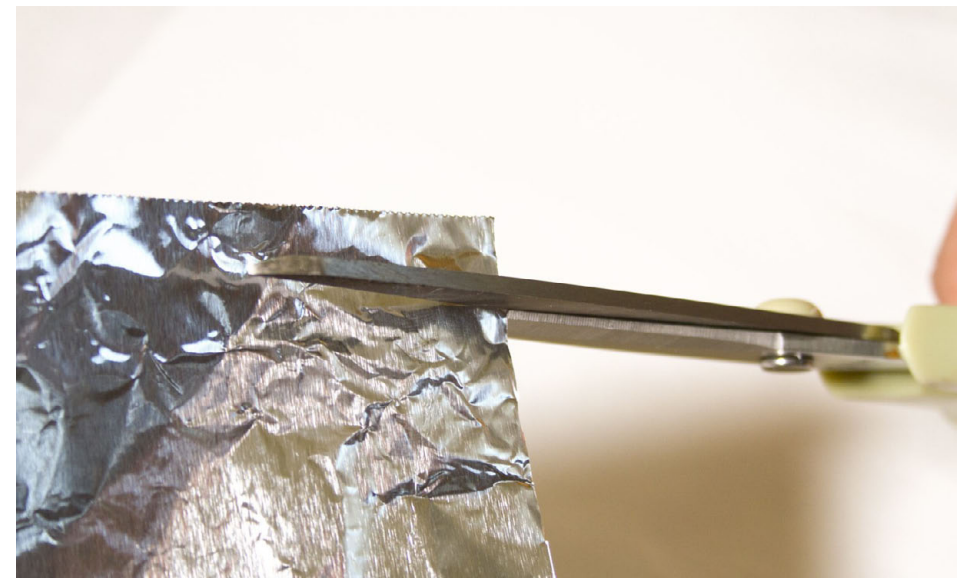
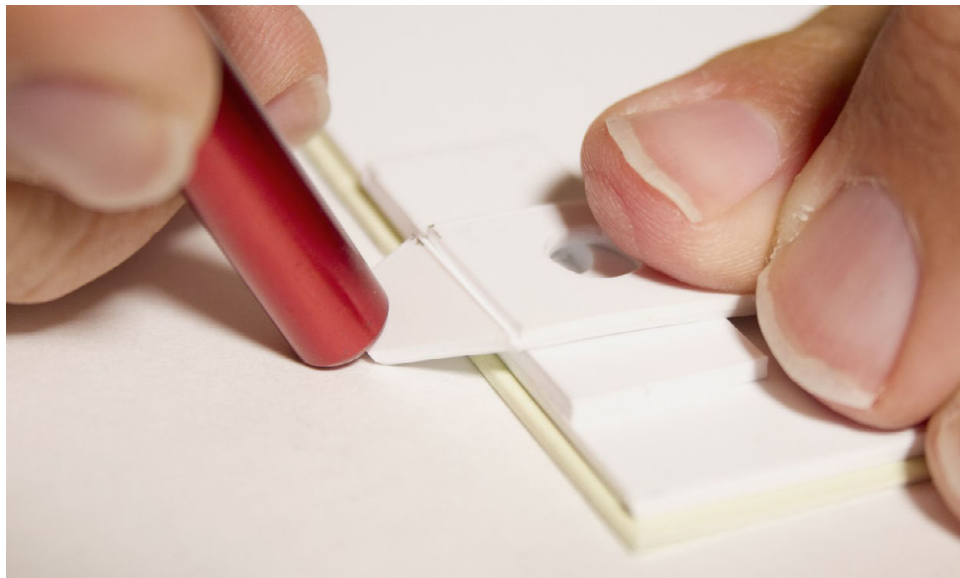
**16** Now you are ready to mark the sides that you will bend inward. We marked our culverts at two feet in (lengthwise) on both sides.

**17** Score that line. You will not want to break these tabs off completely, just bend them. Once you bend the tabs, try not to handle the culverts any more than necessary. Excessive bending could easily make them break off.



**19** The culverts should look like this. You will bend the tabs slightly more when you install them into your layout, but there is no need to do so yet. Set the culverts aside.

**18** We found that using three layers of styrene and pushing very gently was about right to make sure we did not accidentally break the tab completely free.



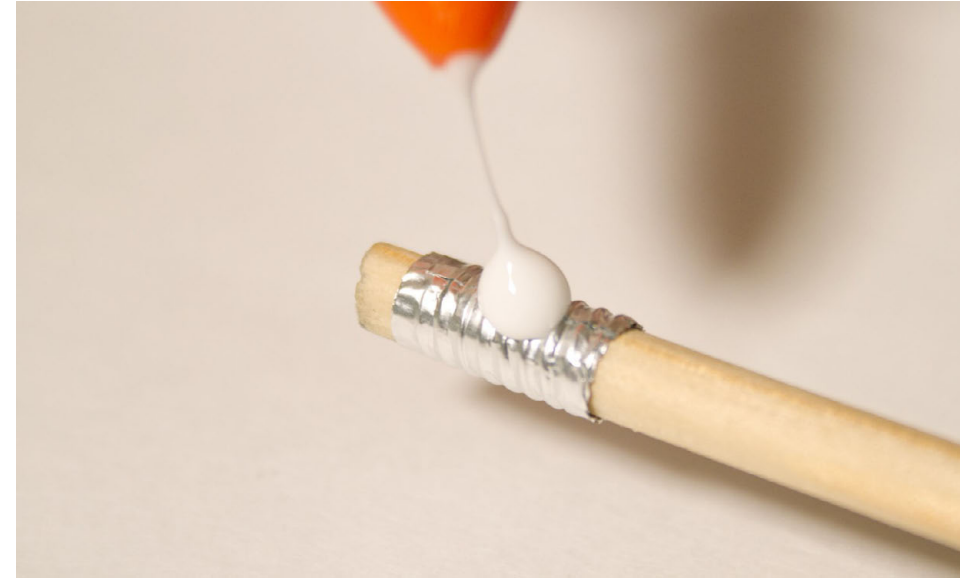
**20** Now you are ready to make the drainage pipe. Cut a piece of aluminum foil long enough to wrap the bolt about 3 times.



**21** Smooth out the foil and wrap it around the bolt.



**22** To make the corrugation more obvious, run your fingernail gently through the grooves. Then remove the foil from the bolt by twisting it off.

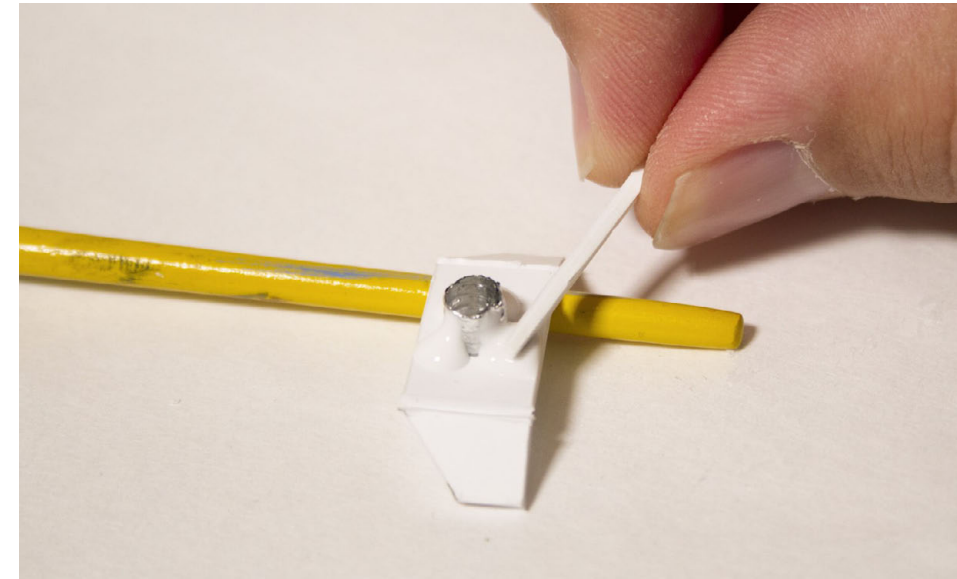


**23** Slide the foil gently onto the wooden dowel and tighten it on the dowel. Then put a drop of white glue over the foil where the edges meet.



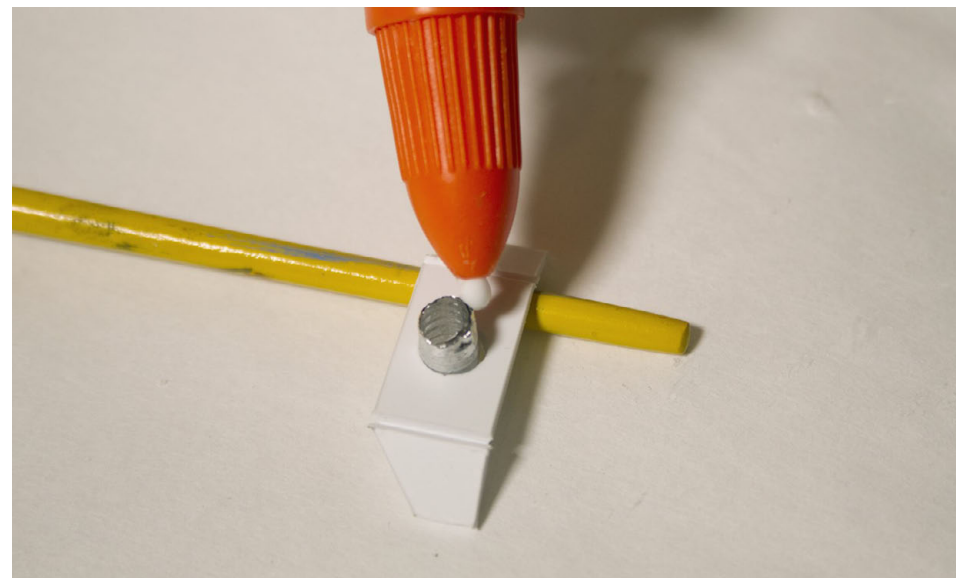
**24** Being careful not to get any glue on the wooden dowel, spread it evenly over the foil. The glue will dry clear and make the pipe stronger and easier to handle.

**25** Once the pipe has dried, gently remove it from the wooden dowel.



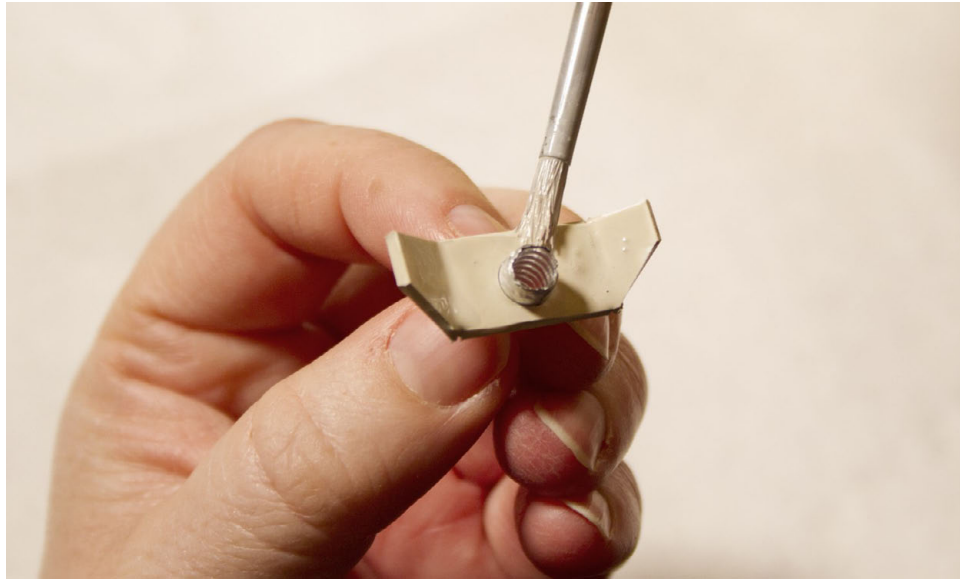
**27** Spread the glue gently around the pipe to make sure it seals it all the way around. Allow it to dry.

**26** Set the pipe into place in the center of one of the culverts and apply white glue on the back side of the culvert. You may need to prop it up to be straight



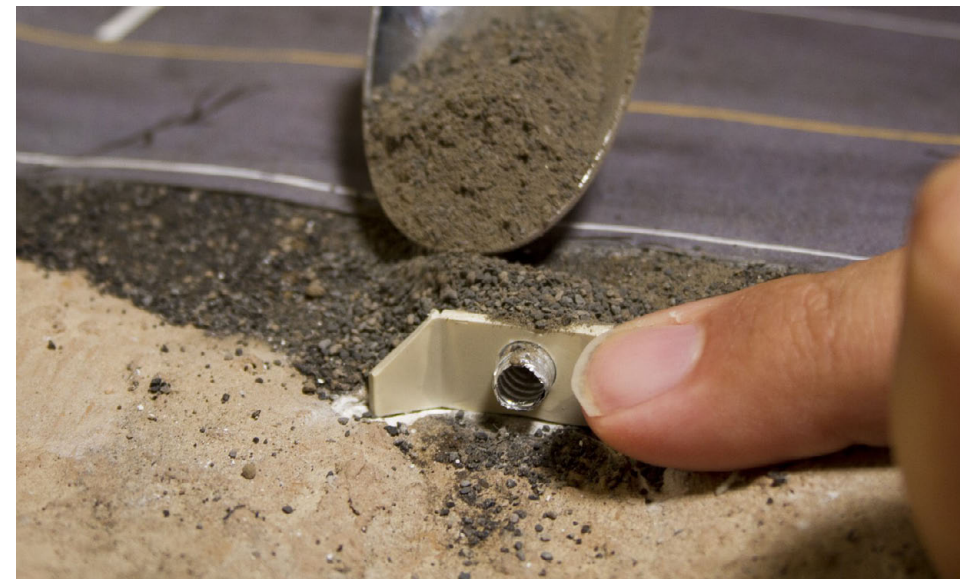
**28** Once the glue has dried, you are ready to paint the culvert. We used Polly Scale Concrete color and a little Reefer White to lighten it.

**29** Carefully paint the front of the culvert without getting any paint on the pipe. Set it aside to dry for a few minutes.



**31** Here, one of the culverts is in place below the road.

**30** You will need to prepare a place for the culvert to fit into your layout or diorama. We dug out an area below the road where the culvert can fit into place.



**32** Backfill the culvert while holding the culvert in place.

**33** Carefully tamp down the dirt/rock fill around the culvert.



**35** Use a 50% white glue, 50% water mix and drench the backfill. Allow the culvert time to dry. Repeat any steps to complete the same for the other side.

**34** Wet the backfill with wet water (water with a small drop of soap in it).



**36** The completed culvert looks like this. We cleaned up some rocks but allowed a bit of dirt that spilled over to stay on the concrete. You can add water later if it is the wet season on your layout, or leave the culvert dry.-TS

# Pacific Northwestern Railroad

Story by Jennifer Waters

Photos and Video by Ross and Jennifer Waters

This month we visit the Pacific Northwestern, a freelanced HO scale layout built by the late Tom Enloe and several of his friends. The PNW is based in western Oregon. The mythical Pacific Northwestern was originally developed by a group of Union soldiers, led by Col. Thomas V. Enloe, who came west after the Civil War looking for new

GN No. 229, an ALCO RS-3 powering the Black Diamond Turn, nears the snow shed on the Mountain Sub as it approaches the small town of Alpine.



opportunities. The route was initially a simple ox cart path used to pull logs from the woods which followed the river into the mountains from the original settlement at what is now known as Port Union. As the logging operations extended deeper into the woods, the ox carts proved incapable of handling the distance and the path was replaced by a narrow gauge railway. The railroad crossed the summit of the Cascade Mountains and continued down the east side of the range. Descending the east slope required extensive

cut and fill operations, and it was during this process that large coal deposits were discovered. After extending the railroad over the summit, Pacific Northwestern ownership made three important decisions.

First, the railroad was converted to standard gauge to facilitate the transfer of timber and coal eastward (prior to this, almost all lumber had been shipped out of Port Union to San Francisco and other West Coast ports). Second, the decision was made to split the line at Black Diamond and lay track both to Portland, to serve that city and provide access to much of the rest of the Pacific Northwest, and to extend a second line from Black Diamond to Salem, providing a connection to the south and east.

Third, a decision was made to create the Cherry Valley Timber and Mining Company to manage the coal and timber properties, and the branch line to extend into the coal fields and logging areas.

It was during this timeframe that both the Great Northern and the Southern Pacific became aware of the PNW.

Southern Pacific's Port switcher No. 1017 picks a reefer of fresh beef at the Champion Packing Company.





Great Northern No. 229 hauls a short mixed manifest up the steep grade at Summit.

Both railroads, without knowledge of the other's activities, started acquiring PNW stock with the intent of gaining control of the PNW. When the GN and SP discovered that they were both attempting control, a secret deal was made between the two railroads.

Both companies sold off their accumulated PNW stock and drove the railroad bankrupt, then acquired it for a song. To this day, the PNW is run under a joint ownership agreement.

However, both the GN and the SP missed the fact that the timberland, coal fields, and the branch line heading into the hills from Black

Diamond remained as separate entities.

The PNW mainline extends from Union City on the coastal river plain into the mountains via the towns of Alpine, Summit,

Carolton (named for Tom's wife, Carol) and Black Diamond. The PNW receives coal and timber products from the Cherry Valley at Black Diamond.

The PNW built a major classification yard at East Black Diamond. A four-track arrival and departure yard is modeled on the layout, and the actual classification yard is represented by staging. At East Black Diamond, the road splits in two with lines headed both to Portland and to Salem.

Tom and a group of friends started building the layout in 1985 by building the dedicated 28x42 foot (8.53x12.80 meter) outbuilding to house the layout. They handlaid most of the track on the layout and built the majority of the benchwork before constructing the

scenery. Tom chose to model the fall of 1955 so that he could include diesel locomotives along with the steam he desired to run on the layout.

He also modeled from the coast up into the mountains to allow for variety in the scenery. As it is autumn, the coast is still fairly warm but the fall color is climbing up the hills and the mountains are already covered in early snowfall.

Tom was a student of John Armstrong's track plans and used his "givens and 'druthers" approach to model railroad planning. He was originally a fan of the SP and he was also

interested in Jim Hill and the Great Northern. Once he and his wife Carol moved north into Washington State, he chose to model Oregon so that he could include some northwestern railroad influence on the layout. This way, new modeling friends in the area would have a stronger connection to the layout.

After bringing passengers to Union City in the early morning, a GN Doodlebug pauses near Union Station until its scheduled afternoon departure. A statue of civil war veteran Col. Thomas V. Enloe, founder of Union City, stands in the town square overlooking the railroad.





**Upper Left:** SP No. 1474 loads the barge in Port with goods to be exported.

**Lower Left:** In Black Diamond, Great Northern No. 229 leads this train out of town after spotting a few cars in the yard.

Tom planned the layout so that only one section of mainline was visible in a scene, as it was important to him that the scenery look as realistic as possible.

Much of the scenery was not completed before Tom passed, but many areas are complete and we show more images of those portions of the railroad.

The layout has two helixes. One is located on the east end of the layout and allows trains to drop from the modeled east end of the line down to the Underhill staging yard.



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**Stats:**

Layout Owner: Tom Enloe  
 Layout Name: Pacific Northwestern Railroad  
 Prototype: Southern Pacific, Great Northern, and the Freelanced Pacific Northwestern and Cherry Valley Railroads  
 Locale: Western Oregon  
 Era: 1955  
 Track: Mostly Handlaid  
 Track Height: 51 to 72 Inches  
 Style: Linear Walkaround with 2 Helixes and Hidden Staging  
 Roadbed: Homasote on Plywood, Hardboard Splines  
 Backdrop: Painted with Hardboard Mountains  
 Scenery: Various  
 Control: NCE  
 Size: 28x42 foot (8.53x.12.80 meter)



Click on the image above to go to the video page and watch the videos of Tom Enloe's Pacific Northwestern Railroad.



The SP Port switcher has picked up a string of cars from the PNW interchange. They are now headed through Jordan Junction on their way back to Port where they will be delivered or forwarded on to SP customers on the Oregon Coast.

The other helix is buried in the mountains and is used to drop the line from its high point at Summit down to the town of Carlton on the east slope. The west end of the layout is also connected to Underhill staging via a long ramp.

Both ends of the layout connect to the Underhill Staging Yard.

Underhill is configured in a manner that allows passenger consists to make both eastbound and westbound appearances over the modeled portion of the layout. Traffic is generally routed with empty trains headed east and loaded trains headed west, so a given consist can make multiple trips over the layout.

Tom wanted to run long trains on the layout, so he built the sidings 17 feet long. This allows for passenger trains with 10-15 cars, mixed manifests with around 30 cars, and up to 40-car coal trains. He also wanted to model a steep grade on the layout, so he made the mountains quite tall and the

railroads must use helpers when traveling upgrade. Sea level on the layout is 51." Port Union trackage sits at 52" and Union City Yard is at 55." The highest point on the layout is Summit, which is a steep 72." Summit is a ski area which is already covered in snow and preparing for the coming winter season.

Tom and his friends built the Union City Yard large enough that it could operate realistically as a classification yard. The town of Port includes an industrial area developed enough to accommodate two operators with some interesting switching operations. The largest industry is the Port Union Paper Mill, which requires pulp and chemicals to operate. Other industries in Port include Purina, a box company, a foundry, Acme Hardware Supply, chemical companies, a packing company, stock yards, and a cannery. A power plant serves the mill. Some freight is shipped out of Port via barge, which makes for an interesting addition to switching opportunities for operators.

The three main commodities moved on the PNW are coal, agricultural products, and logs. Coal is hauled into Port from Black Diamond and exported. Logs are brought in by the Cherry Valley Railroad and transferred to the PNW, then hauled to Union City or to Port. Agricultural loads run the entire length

of the railroad from one end of Underhill staging and across the layout to the other end of staging. Loaded stock trains generally travel west and loaded reefer trains return the processed foods to the east side.

The scenery on the layout is varied, including areas of plaster hardshell and foam. The backdrop includes painted areas and textured hardboard. The group built the rocks from plaster molds.

Trees are made from furnace filters, SuperTrees®, and some are commercial. Most of the structures are kits, though there is a custom-built snow shed in the mountains on the way up to Alpine.

Tom and his friends ran monthly operating sessions using a 3:1 fast clock. Timetables and train orders were used and a minimum of 6 people were required to operate, but the layout ran best with a crew of 14- 16 individuals. Tom's wife Carol and his friends continued to host occasional operating sessions after his passing, but not as frequently. The layout participated in the 2012, 2014 and 2016 SoundRail operating sessions. Tom was a founding member of SoundRail. Sadly, the PNW is now being dismantled due to the sale of the property. You can watch the layout in action on the video linked on [page 45](#).-TS



# Along the Rails

## Photographs from our Readers



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A Norfolk Southern train A84 returns from a trip up in the Anniston District and stops in downtown Birmingham for a crew change on Geno Sharp's HO scale Anniston District layout.

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