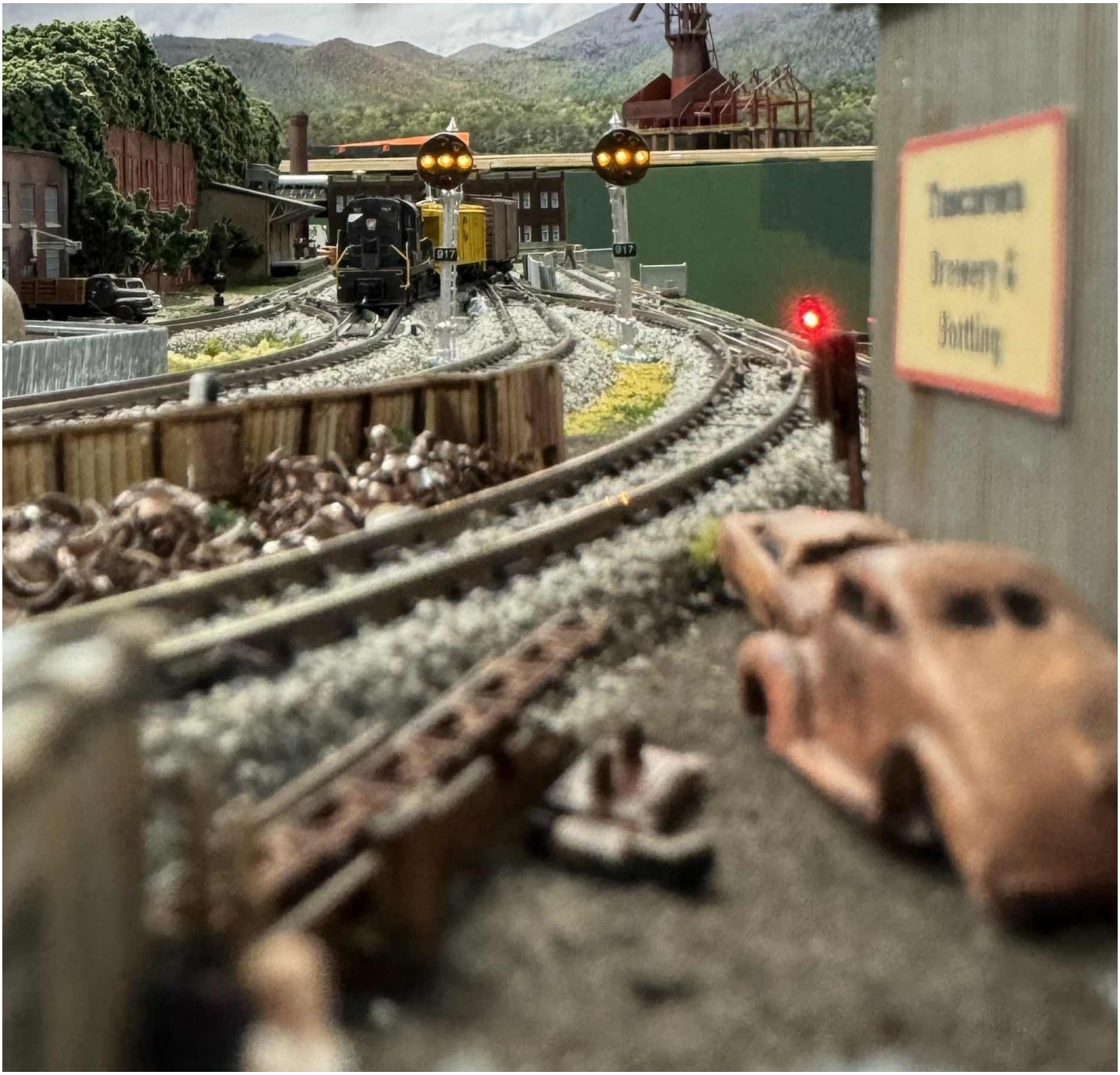
The Journal Box

"The Best Region Under The Sun"

Winter Issue 2023

Vol. 79 Issue 1
$6.00



The Journal Box

Volume Seventy-Nine Number 1 Winter 2023

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Total Subscribers	**223**
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SSR on the Web

Looking for the latest Region activities? Check us out on website at http://www.nmrasunshineregion.org. You can also get there via links from the NMRA website at www.nmra.org. Thanks to Glenn Kopriva, our Webmaster, for keeping the site up to date.

Journal Box Submission Deadlines

Spring Issue	February 15
Summer Issue	May 15
Fall Issue	August 15
Winter Issue	November 15

The Journal Box will be in the mail 2-3 weeks after these dates. Please do not include events with dates close to mailing dates as information will not reach readers in time.

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Women's Program-
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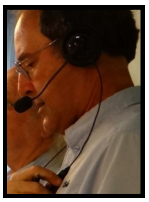
To have news from your club appear in the Journal Box Send an article and photos to Robert Leonard, Editor *leonardstrait@gmail.com*

The *Journal Box* wants to share your thoughts and articles. It takes a lot of contributors to fill these pages, and with the new electronic version, we are looking forward to even longer editions.

Robert Leonard will need your input to fill next year's publication. Please post him anything, from layout reviews to product reviews to events. Support him!

Don't delay! The next deadline is February 15th!



Journal Box Editor

Robert Raymond

Big news this issue—and going forward. Some of it you might like and some you might not. But that's the world—it changes.

First off, I will be stepping down as editor of the *Journal Box*. After sixteen issues (four years) of producing content and correcting all your spelling errors, it's time to put a new captain at the helm and see where this ship might go. Frankly, four years is forever—it's how long World War One lasted. It was also roughly that transition era we all love, steam to diesel. And trust me, as I get older, time passes at breakneck speed!

Your new editor will be Robert Leonard (who is also the Southern Division Superintendent). Of course, he will have his hands full coming up to speed on Publisher (or whatever editing tool he ends up using). And while he's learning all this, he'll need support for content—he can't beat the bushes for articles while prepping the issue. Please support him, the region and the NMRA by continuing the efforts behind the *Journal Box*.

The other change is coming at the decision of the board. After carefully considering the subscription income vs. the potential for new advertisement revenue (and a more flexible format), the *Journal Box* will be going digital. I know this is going upset some people (I was collecting the issues on my shelves as well). I've asked the board to provide information about what we can expect and look forward to in February. Right now, I'm sure we all feel like firemen in the roundhouse, looking at those newfangled F-units and realizing that change is upon us.

Anyway, that's all the official information I have on the changes taking place. Personally, I've been trying to get as much scenery done on my own *Tuscarora Branch Line* to feature it in this issue's *Rolling Hot*. Looks like that time is now. Other than that, I've had a great time playing the part of an ink-stained editor for this publication. I'd like to thank the people who made this possible, from Ken Farnham for "volunteering" me for this position to the top contributors to our pages: Michael Collins and Al Sohl, who filled many of our pages and issues with their fine modeling and excellent how-to's. Of course, all others who contributed also have my thanks.

And of course, special thanks to all those who opened their layouts for our visual tours (via *Rolling Hot*). In order, it was Ken Farnham (Florida East Coast), Michael Collins (Lehigh Valley Railroad), Tom Wilson (Pittsburgh and West Virginia), Greg and Gail Komar (West Virginia Northern), Orlando N-Trak Club (Lehigh, Monongahela and Ohio), Al Sohl (Western Bay Railroad), Mark Svendsen (Chicago and Alton) and the Treasure Coast Model Railroad Club. Honestly, seeing the stories the layout hosts would come up with for our little hopper car's journey was the favorite part of every issue for me. I'm hoping the new editors of this publication find some way to continue this ongoing feature.

Anyway, that's all I've got. I'm lighting the marker lights and waving the lantern forward to roll out of town. It's been a great experience. And keep supporting the NMRA!

Cover Photo: A random photo by Zach Bischoff captured a Pennsylvania scene in 1962. The happy coincidence was that it was shot in the Orlando N-Trak clubhouse and the extensive layout (with the skyboard and the half-completed steel mill) made a nice backdrop. The foreground is my own Tuscarora Branch Line, a microlayout you might have seen at conventions over the last year or so. This layout is featured in this issue's *Rolling Hot*, detailing a typical operations session on the railroad (which can host four to five operators for a four hour session). More on that on page 13!

Yes, for my last issue, I'm giving myself the front cover.

*Note: The foreground might look blurry, but it's only because you need progressive lenses. *smiles**

(Above) With the completion of scenery along his 2nd Division, Superintendent Al Sohl ordered an MOW train up the hill to test clearances. Richard Webster ran the train out of Alamosa, picking up a front-end helper above Ute Junction to make the stiff 4% grade. Operating in a prototypical fashion of the real D&RG, clearances in the new cuts were tested by running an engine through them and seeing if anything hit. Al has enough faith in his club's work that he was piloting the helper, ground zero for any boiler explosions. (Photo Credit: Chip Pecere)

A loose club has formed around Al Sohl's Western Bay Railroad. I'll admit to making the two-hour drive down to Port St. Lucie to act as a station operator for his sessions. Beautiful work. Infrequent sessions. Let's step up on that, Al!

Examples of what is possible via filament versus resin 3D printing. For more on this, check out the article by Glenn Kopriva on page 16!

"The only way to read the Journal Box"

From an anonymous subscriber whose identity might be detected by sharp-eyed readers.

Contributor
Michael Collins,
MMR 157

Judged or Be One

Here comes the Judge !

For those interested in getting your model judged or becoming a judge, here is some helpful advice.

Introduction

Evaluating a model is a personal decision based on the values listed with each of the five sections listed on Form 902. For a detailed explanation, see the **nmra.org** website, select **Achievement Program**, the different modeling categories, and the **Judging Guidelines**.

To get judged, in addition to a person's skills and experience in model building learned through trial and error, you need the 'drive' to compete. The pursuit is to create a miniature scale model compared to some sort of prototype.

Support

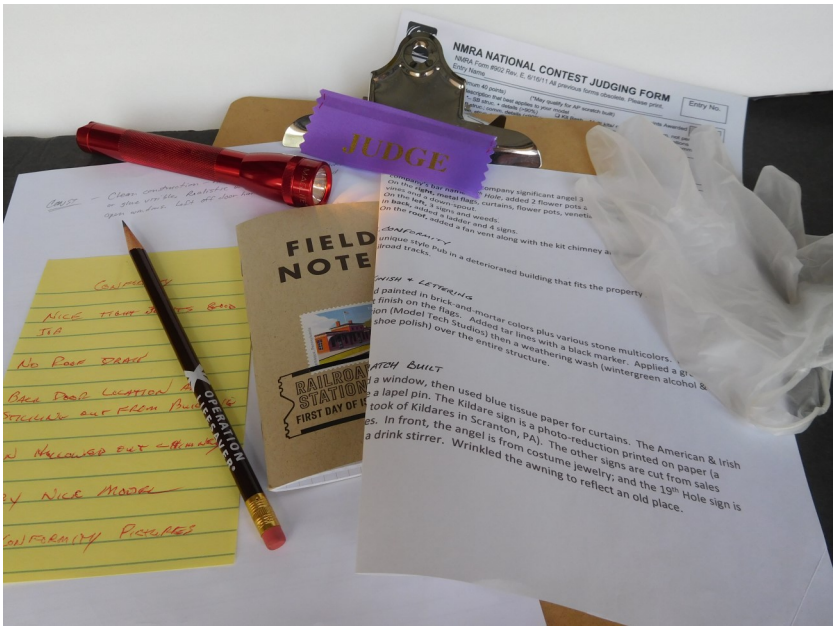
Here are a few sites to understand the concept …

On the **nmra.org** website, search box, type in *Judging.* View … **Contest Judging** by MMR Marty Vaughn where he provides a good explanation in a fifty-eight minute video.

Back to the home page, in the upper right corner, select the box with an arrow (YouTube), seek ... **Judge's Tips for Better Modeling**. Also, my video, **Michael Collins model railroad Part 8** (in 4 sections) regarding winning awards. I have been successful by adding extra items and/or something different to a model, super-detailing and weathering. Examples: SSR Presidents' Award 2021 (Houseboat), Best of Show 2021 (Hardware Store) and 2022 (Abandoned Control Tower).

And attend a clinic by Benita Jameson, 'Celebration of Models/Judging,' when it is offered. Benita is the SSR Chairperson of the Model Contest.
If you have old *Journal Boxes*, Spring, Summer and Fall 2015, *The Contest Corner* by Carl Smeigh (now MMR), a former SSR Model Contest Chairman and NMRA National Contest staff member, does an excellent job describing elements of judging.

Also, take note of contest winning models, learn what they did to increase their scores.



Overview

Explaining a model in print takes time, effort, and extra attachments. It is critical that the explanation is understandable to the judges. Extra support information, graphics and prototype pictures are very helpful. *More is better than less.* In the DETAIL category, adding extra features (super-detailing) to reinforce the models' character, such as vines, gutters, down-spouts, doorknobs, cracked window, etc.

Weathering in some degree highlights the model; and reflects the real world. If the model is not scratch built, do some handmade additions to gather points in this section, such as an interior, signs, roof detail, a renovation, etc.

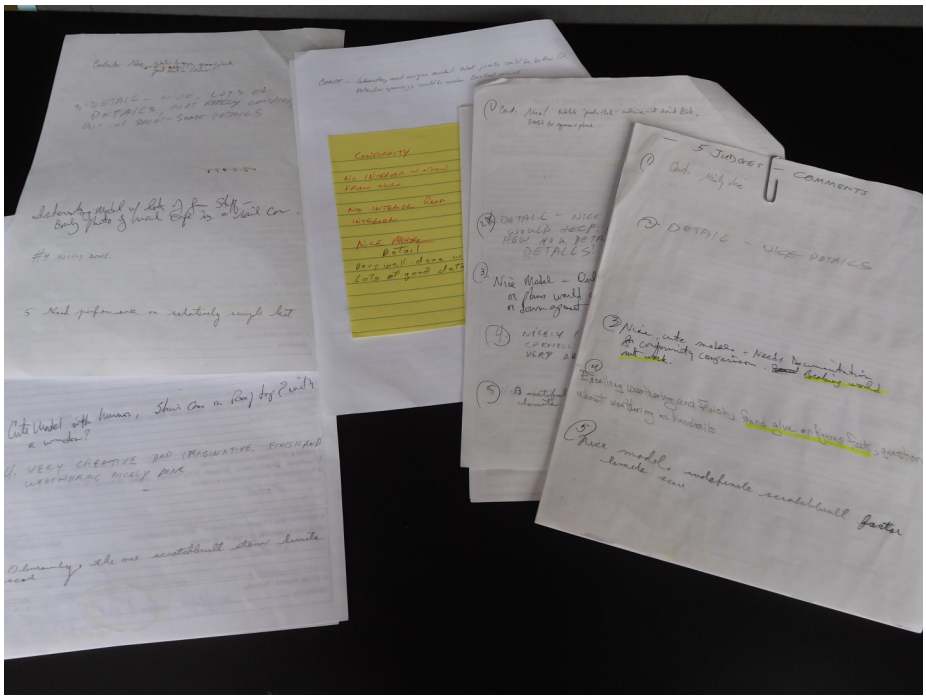
And adding something creative, complex, or different (such as an abandoned structure, a crashed section or burnt area, a unique locomotive or rolling stock) will increase your score.

Numbers

There are charts, a matrix, for each category. Your target is to strive for the merit quality range (lower right corner). Does the appearance capture the essence of the prototype?

Before having a judge evaluate your model, take pictures, then enlarge them on your computer (if you can or have someone do it for you). Check for spots that need correction or improvement. Another method is to use a flashlight and magnifying glass. FYI, judges use flashlights.

Fortunately, there are at least two judges per category. Therefore, a compromise is reached that is fair and reasonable. The judges' notes are usually supportive, positive and negative factors, hopefully educational.



The SSR AP Chairmans' views by Ken Hoot (the chief)

"The Achievement Program is an exceptionally good benefit in that the more you do and the deeper you get into it, it makes you a better modeler by paying attention to standards and detail; also meeting more people, some becoming friends.

"Judging is done on a matrix system. That means you are judged on the features of that specific model. There are two kinds of judging, merit and contest. In merit judging you have two or three judges evaluating the five different sections on the 903 Form. In contest judging, there are two or three different judges evaluating each section. Then, at the end, a head judge will add up the final score

"All judges should leave positive feedback on the backside of Form 902/903, so the modeler knows what was good about the model and, also, what needs to be done to the model to bring up the score next time.

"Being a judge has taught me a lot about what to do and not do on a model to improve my score."

Commentary by the new SSR Southern Division AP Chair, managed by Robert Leonard (a man of many titles).

"I see the AP Program as a personal test for an individual; and I believe everyone needs a test in their life. Testing and improving your skills can only make you a better modeler. The categories of Motive Power, Cars, Structures, Scenery, Civil Engineering, Electrical and Prototype Modeler test your psychomotor skills. Author, Volunteer, Official, and Dispatcher categories test your communication and organizational skills, especially communications (and dealing with people, *mc).*

"As it was said in school, all the basic courses will make you a 'well-rounded individual'. All the modeling categories will make you a 'well-rounded modeler'! One who then can pass on the knowledge to others. Gaining a higher skill level and mentoring others is an achievement."

Summary

The judging process tries to provide positive criticism and encouragement for improving your skills for future evaluations.

Being judged and being a judge is serious business (some of us have been on both sides), however, the results make for better modeling, which is the goal of the Achievement Program.

NOTE: *Watch for revised procedures and assignments regarding Judges and Judging.*

The Citrus Model Railroad Club (shown to the left) is located at:

3600 South Florida Avenue, Inverness, FL 34450

You can find out more about the club and their open-hours at:

http://www.citrusmodelrrclub.org/

Contributor
Al Sohl
MMR 305

The Western Bay's O scale Denver 3D backdrop in HO Scale

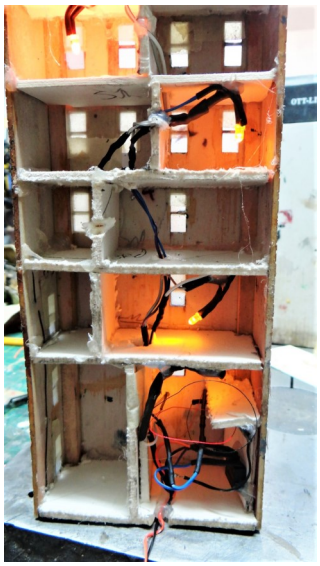
A narrow-gauge railroad is usually land locked in ways that it can ship and receive goods and materials along it's right of way but must somehow transfer the same to a standard gauge railroad or railroads to allow goods and people to get to or come from the other parts of the country. Our narrow-gauge O scale railroad, the Western Bay, is no exception.

I designed one (of four) of our yards to be dual gauge. I called it Denver as we operate in both Colorado and New Mexico, modeled after the Denver & Rio Grande RR and the Rio Grande Southern RR, Era, 1939, June 12th, 1939!

The yard has the narrow-gauge trains only operational as the standard gauge rolling stock and locomotives are just there as part of the scenery. We usually have two crew members working this yard during our op sessions. The yard master usually is stationed in the main aisle and his hostler is on the other side of this peninsula-built yard, in the aisle nearest one of the main layout walls.

The back wall behind him needed a backdrop as the rest of the layout has. However, this was not to be of more mountains but a 3D scene of part of the city of Denver. Denver the way it might have appeared in 1939. That being, all vehicles and signage to carry that time stamp as well as lots of pollution generated by the homes and industries, burning lots of COAL, producing lots of smog! I wanted it to be viewed as a city from the main aisle with a feeling of greater distance than it is, so I built it in HO scale.

(See Above)



I built each building from spare wall fronts and sides from various kit Mfg. —one building at a time. Each one is built on my work bench with all the partitions and (LED) lighting in (a few) rooms so as to not have the whole building lit like what we all might have done in our younger days; usually being done by lighting a building with the good 'ole single (large?) light bulb. All but two of the fourteen 'Denver back drop' buildings were built from the spare bits and parts except for two. Those two were built as the Mfg. designed and sold them to be built. (Right)

This is a picture of a typical inside view of one of the buildings (bottom of prior page). Nothing pretty but it is functional. I added the needed resistor, and a bridge rectifier. I then ran the two wires (plus and minus) up to each floor which had an Led or two soldered to each, testing as I went up each floor. These buildings all had the two main wires that (not polarity sensitive due to the bridge rectifier) exiting the bottom of the building to allow me to connect to a 12-volt DC but wire that ran the distance of the city 'shelf'. (Building on the bench, Right)

The buildings were all completed (and tested for correct looking lighting) on the work bench. When each building was finished, I installed it on the Denver back drop shelf (in the layout room).

Once all the buildings were completed and installed, I built up the roofs with details one might find on large city buildings. Water tanks, elevator machine cupolas, some with billboards, ladders and lots of smokestacks and vent pipes.

I went to work building the cobble streets, added the sidewalks, T poles with working streetlights, pedestrians, automobiles as well as trucks.

Once the city scene was completed to my satisfaction, I dragged out one of my airbrushes and airbrushed the smoke and smog on the backdrop,

(See following photos for results!)

Editor's Note: I gotta admit that I got a laugh when I pasted this up—Hell's Cold Storage? Priceless.

We welcome all visitors if you wish to see this and the other part of the 950 Sq. Ft. Western Bay railroad.
Best way is to send me a request via my email:

als0622@yahoo.com

Web site is:

www.westernbayrailroad.org

E.C.H.O.E.S is a modular model railroad club located in Miami-Dade, Florida, dedicated to building and displaying our HO scale model railroad layout. Our purpose is to enjoy and promote the hobby of model railroading and preserve the history of railroading in South Florida. The club was started in the summer of 1985, with the goal of presenting a HO scale modular model railroad layout for display at “The Harvest Festival”. Throughout the years, the layout has been displayed at regional conventions, four NMRA National Train Shows (Atlanta twice, Ft. Lauderdale, FL and Orlando), and other events in Miami Dade and Broward counties. We do running/operating sessions several times a year and welcome guests to join us. Membership is open and we welcome anyone who shares an interest and passion for Model railroading.
For more information, please contact:

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Rolling Hot
Robert Raymond's TBL

In the late 1890s, the Pennsylvania Railroad decided it needed another route west to side-step the traffic-clogged lines around Pittsburgh. In this, they pushed a coal branch that ended in Waynesburg, PA west to the Ohio River. So excited were the Pennsylvanians of this town that they renamed it Tuscarora, PA.

The Pennsy took great advantage in the *Tuscarora Branch Line*, running freights and limited passenger service through the rough country of southwestern Pennsylvania. In 1923, an interlocking tower was added to protect this junction (where the east-west line met a feeder from Pittsburgh).

Coal continued to flow through beyond 1962, the era represented on this layout. Sadly, passenger service was dropped in 1952. Operating under Time Table and Train Order, the rails through Tuscarora hum from the steady passage of steel wheels.

It's just another day in the heat-hazed hills of coal country.

Our hopper, formerly identified as SSR 1980 but now sporting a futuristic (for 1962) repainting to WM 5527, rolls into Tuscarora on the head end of EW-2 (the second Easton to Westly westbound freight). The RS-11's brakes are on, the train slowing for its daily setouts, dead on the dot at 8:20AM. (Left)

The head-end power uncouples our hopper and an empty boxcar for setout on the inner industrial track (to the right of the signal). This is where Tuscarora Local 2 will come looking for them at 10:00 AM. Note the large yellow "box" in the background—this is the working interlocking tower with repeater signals facing the engineers. A microcomputer checks level fault logic. (Below)

(Above) Local 2 has sorted itself correctly and moved both cars to the outer industrial, running the "Zipper", a series of three crossovers. Disregarding the switcher's earlier run-around move to position itself, it takes the towerman fifteen lever throws to move a train from one side of the main to the other. As the local is clear, two coal trains meet under interlocking signaling and routing.
(Below). The car has been spotted in Tuscarora Brewery and Bottling. Grains cannot simply be "dumped" - to protect against rats, insects and contaminants, the car must have its contents sucked out. One worker maneuvers the hose while a second raps on the car's flank with a mallet to shake its contents loose. Meanwhile, the switcher now is shifting the empty boxcar into Lowery Brickworks.

(Below) It's getting towards 9 PM and the towermen watch the final freight of the day, EM-2 (Easton to Martin Yard) endure his labors. Nicknamed the "PeeDee" (for Per Diem), this train sweeps Tuscarora of all outbound cars, carrying them up the branch line to Martin Yard (near Pittsburgh, PA). The second section of the Tidewater (a long westbound empty hopper drag with some deadheading anthracite coal thrown in) is expected through. The tower will hold EM-2 on the siding, waiting for the annunciator bell to ring, signaling that the Tidewater is at the distant signal and ready to enter the interlocking plant.

With his train built and air pumped, EM-2 departs Tuscarora in the fading sunlight, rounding the curve around Jacobs Fuel Distributor and the boarded-up station, our plucky hopper tucked in just in front of the caboose. It's been a long day for the crew and they still have an hour run before they reach Martin Yard. Tomorrow will be just another day on the Tuscarora!

A quick note on this layout—it is a 2x4 foot N-scale layout with sessions that keep a five-man crew (scheduled engineer, extra (coal) engineer, leverman, station operator and dispatcher) busy for a four hour session. It also doubles as "Tusk Hill", an English Midlands version with its own operation method. It's been a real treat to build it and find people excited to run it. It just shows, in a small space, the joys of model railroading.

All photos courtesy of Zach Bischoff.

Contributor
Ed Harris

Model Railroading is Fun!

Back when I'd first discovered it, what really got me interested in model railroads was the creativity of it. There was plenty of railroad stuff but what caught my eye and ear was the depth of the modeling.

Barry Boggs is a Master Model Railroader. I went to see his layout during one of his open house invites. What I saw was amazing! His layout was steam era. Everything I saw just made me smile. Every time I looked at something different my smile got bigger. By the time I left his place my smile was bigger that the Joker's.

His steam engine blew smoke as it travelled and you could hear it chuffing. Over the engine house I heard people talking, banging on an anvil. Over at the construction site there was construction noise as well as people talking and a bull dozer moving. Over there was Mom hanging laundry on the line while children were playing with their dog. I heard the children laughing and talking, as well as the dog barking. All over the layout I could hear birds. Over at the park there was a child flying a kite. The kite was moving!

I had a monster smile when I left. The train was not the only thing that was animated. That man modelled! The scenery was awesome! So many different stories involved in his layout.

I went to the San Jacinto Model Railroad club's annual train show. It was so eye-popping. I learned that HO was not the only scale. Tin plate, Thomas the Tank Engine, Lionel, G-scale, Live steam, N-scale, switching layouts. Even a 12" circle of track with an engine that was powered by a fan!

Continues on following page...

The modular layout that caught my eye was HO-scale. Each module was a different scene. That one has stayed with me. One was a bluebonnet field made with those tiny sewing beads. Another was a drive-in theater. Another was a dinosaur excavation. One was woods. The train went into the forest and you did not see it again until it came out. While looking at all the different modular stories I was also watching the train pass. It was a long train; I kept looking for the caboose. Finally I saw the end of the train, no caboose. Wait!! There was the caboose! An N-scale caboose on an HO-scale truck. Someone was having fun!

So, with my little knowledge of modeling and my limited space, I have decided to have some fun modeling. Last year I attempted to build a modular switching layout, 2'x12', three sections. I wired it, took care of a couple of problem spots, though I had it ready to run but the next day the gremlin was back. Every time

I fixed a spot that gremlin reappeared elsewhere. The gremlin beat me.

Now I am going to have fun. I'm going to build a different scene on each of the three modules. I have picked out the scene for each module. I will get to practice my scenery skills. I am building special rail cars for one of the scenes. I wish to add sound and animation. I am so unknowledgeable about this aspect of modeling. I have used a Tortoise switch machine to open a shop door and have an animation book. If anyone knows about animation that does not require a computer, I'd love to hear from you at…

Edharris34470@gmail.com

Come along with me on my journey as I build these modules.

Model Railroading is Fun!

Contributor
Glenn Kopriva

3D Printing- Filament versus Resin

3D printing technology has been around since the 1980s, but it has only recently become more accessible and affordable for use in homes and small businesses. The technology has also advanced significantly, making it possible to print objects with a wide range of materials, from plastic and metal to food and even living tissue, but what can we "print" for our railroads?

The 3D printing process typically starts with the creation of a 3D model using specialized software or a 3D scanner. The digital model is then sliced into thin layers and sent to the 3D printer, which uses the information to create the object layer by layer. The printing material is deposited by a print head or nozzle that moves along the x, y, and z-axis, building up the object as it goes.

There are several types of 3D printing technologies, each with its own strengths and weaknesses. Some common types of 3D printing technologies include fused deposition modeling (FDM), stereolithography (SLA), selective laser sintering (SLS), and digital light processing (DLP).

3D printing has a wide range of applications, from rapid prototyping to manufacturing complex components for aerospace and medical industries. It has also revolutionized the production of customized products, such as prosthetics and dental implants, and has even been used to print entire houses.

Despite its many advantages, 3D printing also has its limitations. The technology is still relatively slow and can be expensive, and the quality of the printed objects can be affected by factors such as the type of material used and the complexity of the design. However, as the technology continues to advance and become more accessible, it is expected to become an increasingly important tool for manufacturing and innovation in a wide range of industries.

The main difference between filament and resin 3D printers is the material they use to create objects and the maintenance methods.

FILAMENT
(pictured Above)

Filament 3D printers use a spool of plastic filament, typically made from PLA or ABS, which is melted and extruded through a nozzle to build up an object layer by layer. Filament 3D printers are often more affordable and easier to use than resin printers, and they can create larger objects with more color options. However, the resolution of filament 3D printers is typically lower than that of resin printers, meaning that the surface finish of the object may not be as smooth.

Continues on following page...

Maintaining a Filament 3D printer is essential to ensure that it performs optimally and produces high-quality prints consistently. Here are some maintenance tasks that are typically required:

- Cleaning: 3D printers require regular cleaning to remove any dirt, dust, or debris that may affect the quality of the prints. The printer's build plate, nozzle, and extruder should be cleaned regularly with a soft cloth and isopropyl alcohol.
- Lubrication: The printer's moving parts, such as the rods and bearings, should be lubricated periodically to prevent wear and tear and ensure smooth movement. This can be done with a small amount of lubricant oil.
- Filament management: Proper storage of filament is important to prevent it from absorbing moisture and causing issues during printing. Filament should be kept in a dry and cool place, and only enough should be removed from the spool for a single print to prevent tangles and knots.
- Leveling the build plate: The printer's build plate should be leveled to ensure that the first layer of the print adheres properly to the plate. This should be done regularly as the plate can shift during transport or use.
- Nozzle maintenance: The printer's nozzle should be checked and replaced if necessary to prevent clogging and ensure proper extrusion of the filament.
- Firmware updates: The printer's firmware should be updated periodically to ensure that it is operating at its best.
- General inspection: Regular inspection of the printer for loose screws, damaged parts, and worn belts or gears can help prevent more serious issues and ensure the printer is working properly.

RESIN

(Pictured Top Right)

Resin 3D printers, on the other hand, use a liquid photopolymer resin that is cured with UV light to create an object. The resin is contained in a vat and the printer uses a build platform to gradually raise the object out of the resin. Resin 3D printers are capable of producing very high-resolution objects with fine details and smooth surface finishes. However, they are typically more expensive than filament printers, and the resin can be messy and difficult to work with. Also note that the resin printer is the item on the left in the picture while the curing station is on the right. The curing station is needed to harden the resin using UV light.

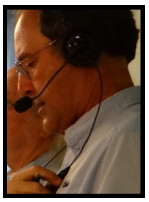
Resin 3D printers require specific maintenance to ensure optimal performance and to extend the lifespan of the printer. Here are some maintenance tasks that are typically required:

- Cleaning: Resin printers require frequent cleaning due to the mess created by the resin. All parts that come in contact with the resin, including the build plate, resin tank, and resin cartridge, should be cleaned regularly with isopropyl alcohol or a specialized resin cleaner.
- Resin tank replacement: The resin tank has a limited lifespan and should be replaced periodically, as it can become scratched and hazy over time, affecting print quality.
- Build plate leveling: The build plate should be leveled regularly to ensure that the first layer of the print adheres properly to the plate. This should be done before each print.
- Resin filtering: Resin should be filtered before and after each print to remove any solid particles or impurities that may affect print quality.
- UV lamp replacement: The UV lamp in the printer should be checked and replaced if necessary to ensure that the resin cures properly.
- Firmware updates: The printer's firmware should be updated periodically to ensure that it is operating at its best.
- General inspection: Regular inspection of the printer for loose screws, damaged parts, and worn belts or gears can help prevent more serious issues and ensure the printer is working properly.

Overall, proper maintenance of a resin 3D printer is important to ensure that it operates optimally and produces high-quality prints consistently. By following these maintenance tasks, you can help prolong the lifespan of the printer and prevent issues from occurring.

In my opinion, filament 3D printers are better for creating larger objects with more color options, while resin 3D printers are better for creating smaller, highly-detailed objects with smooth surface finishes – think N scale and even some super detail items in HO. The choice between the two will depend on the specific needs and requirements of the project and the amount of money you have to spend. While 3D printers can be had for only a couple of hundred dollars it may be a prudent decision to find a fellow hobbyist that already has a 3D printer. :)

For those of you attending the convention I'll be offering a hobbyists introduction to 3D printing and I'll have both printers on site for you to see and ask questions about as well as where to find prints online, how items can be printed at scale and how you can adjust them.



Contributor
Robert Raymond

Inglenook

I came across this a while back, a neat little switching puzzle you can probably do on your own railroad.

Okay, so the puzzle works this way. You need a mainline track with enough room for five (5) cars on the main to the left, and three (3) cars and an engine on the right. You also need two sidings that can each hold three (3) cars. Overall, it looks kinda like what is shown below.

The thing is, it's okay if your main and sidings are actually longer. Just stick to the car lengths and the game works fine.

So, first things first – put an engine on the drill track. Put eight cars wherever you wish, main or sidings.

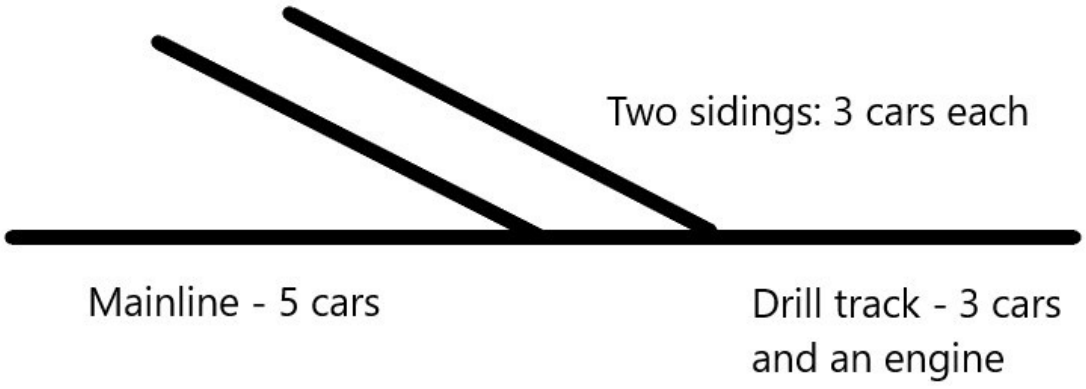
Now, you need to set up some way to select cars. Maybe playing cards with the car written on them. Or poker chips. You just need something you can put in a jar or whatever and pick.

When you are all ready, pick out five car markers and place then in the order drawn in front of you. That's the train you must build on the mainline (to the left) in that order. Everything else needs to be on the sidings. When you are all done and have a train built, toss your markers back into the jug and pull another five. You can play as long as you wish.

The beauty of this system is that a lot of railroaders out there have some sort of track arrangement that will support this. On my *Tuscarora*, those sidings exist on either side of the mainline (and that's fine, as long as you define the five-car main and the two three-car sidings). Whatever works. I'm sure that most railroads could play this game.

Credit goes to Alan Wright, who (I read in passing) came up with it when he had to make a module in a day or so for a show. They started diddling with it at the show with the guests and realized that everyone was having a great deal of fun shunting cars.

So think about putting "Inglenook" somewhere on your railroad. You can spend a couple of mesmerizing hours moving cars about.



MUGSHOTS

People getting what's coming to them...

BEV FARNHAM EARNS MMR 743!

Beverly Farnham was awarded her MMR from National for completing all requirements for her award. According to the NMRA listing, only three other husband-and-wife couples have achieved combined MMRs. Her husband Ken holds MMR 658.

Her various APs are on display behind her, including the one for cuckoo clock making.

RICHARD PAUL EARNS DISPATCHER AP!

Early one morning, Ken Hoot rousted Richard Paul out of his Denver flop house bed, loaded him on a burro and laboriously ascended to the top of a nearby ridge overlooking Alpine Tunnel Trestle and the Montezuma Mine to present him with his AP in Dispatching. You can see the rising sun reflecting off the award.

This is a difficult award to achieve since it involves dealing with petulant station agents at Dolores, Dulce and Placerville Jct.

Further AP information can be found on the SSR website, at...

http://www.nmrasunshineregion.org

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National Model Railroad Association
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