

BANTRAK News

A Monthly Newsletter for BANTRAK Members • Volume 33 • Issue 8 • September 2020



The Engineer's Cab: LeRoy Brandimore

Hello All,

We enter September still under the COVID-19 pandemic restrictions. If you haven't heard the Great Scale Model Train Show scheduled for October 3rd and 4th has been cancelled. The next GSMTS is scheduled for February 6th and 7th 2021.

Next on our schedule is the B&O Museum in Baltimore. We are currently penciled in for December 16th to January 3rd. This event is subject to the Museum being open, and our participation is conditional that no out of state vendors being present. There is a good chance that this will not be canceled.

Since The COVID-19 restrictions are still in place, which include the 6 feet of distancing and a restriction on the number of people that may meet in one location, this month's meeting will be a Zoom meeting again. That will be September 20th.

Take care, all.

Happy Modeling,

LeRoy Brandimore



Kansas City Public Service: Bob Bunge

Kansas City Public Service Company street car #472 was built by Brownell Car Co, St, Louis, MO, in 1900. It is a good example of a 1st generation electric street car, an adaption from the two axle horsecar pulled cars, and seated 24 people. About 1930, it was converted to be a rail grinder, saving it from scrapping. In 1956, it was donated by the Kansas City Public Service Company to the Ohio Railway Museum (ORM) in Worthington, Ohio. ORM members replaced about 70 percent of the wood in the process of restoring to its original configuration and full operation by the early 1960's.



At ORM, it was a popular car, easy to operate, particularly useful on slower days with smaller crowds. It was also fun, if you considered a bumpy ride fun. My father, an early member of ORM, called 472 and another single truck car at the museum "puddle jumpers" because at above anything over 20 or so MPH, they bobbed up and down like a dolphin jumping through the water.

472 was also useful at the museum because it was a double ended car. ORM didn't have turn-around tracks at the ends of the line. At the end of the line, the motorman, after securing the car, got out, used a rope to pull the trolley pole down off the electric trolley wire, unhooked the rope and walked the pole around to the other end of the car, hooked up the pull rope and raised the pole to contact the trolley wire so it would be trailing away from the new direction of the car. He would then climb into the car and start it up using the controller at the other end of the car. In the meantime, it was traditional for all those riding to

stand up and flip their seats so they would be now facing forward. Other cars in the ORM collection were single ended, designed to be used on a line with turn-arounds, and so had to be carefully backed up, in some cases, with the trolley pole pushing in the wrong direction.



In the museum's "heyday," during the 1960's and 70's, Dad often served as a motorman on weekends, often bringing my brother and me along for the day. Jerry and I were sometimes drafted to work in the museum's store, or other similar duties. Sometimes, I would wander across the way and watch monster N&W coal drags pass by on their way to Sandusky, Ohio. More often, we just roamed around and rode the cars.

Sometimes while Dad was motorman on 472 and once the car was out on the mainline, he would allow us to operate the car, standing behind us, providing instruction as to when to speed up and slow down and stop. Once near the station, after he would take control, we would stand up front and step on the foot bell, a small lever on the floor that rang a bell that was used to let people on the ground the car was nearby and moving.



Kansas City Public Service: Bob Bunge

This model of 472 got its start at the show last fall when I found a Model Power “Brill” trolley car set for \$5 - one power car and a dummy. I wasn’t surprised when the power car didn’t operate - they rate a grade of “D” on the Spookshow website. While the MP units have two axle trucks, they are too long in scale and have too many windows to match 472. To solve this, I cut a center part out so it would have the correct number of windows and glued the ends together. They also have wood plank sides, which I filled in with putty and three sided ends which I sanded round.



Since the inoperable chassis would not fit in the shortened car, I acquired off E-bay a Tsugawa Yokou TU-16A (#14054) chassis from a vendor in Japan (this was pre-COVID-19). This tiny unit is less than an inch long, but seems to move over Peco turnouts just fine. In any case, the trolley line on our city module is straight with no turnouts. Since the trolley line is DC, I did not put a DCC chip in 472, even though there is room. I had some extra truck sides from a Tomytec chassis that I glued to the floor, which was cut from Styrene. A piece of balsa wood replicates the balance bar on the prototype’s DuPont Type C truck.

I’ve found no information on how 472 was decorated when in service, but I did have information on how 472 was painted when at ORM, which is what I wanted to model anyway. While I remembered it

being green with red windows, a search for photos turned more interesting when one photo from the late 1960’s appeared to show my mother and my brother as riders. The motorman is hidden, but it’s a guess it is Dad and I’ll further guess I’m in there somewhere as well. For the model, the green and red paint are Tamyia. The roof is a mix of craft store black and grey. I used Microscale decals for the gold “472” and the 1-inch white strips. The strips were a pain, by the way, as they usually broke into small pieces and had to be lined up using a wooden toothpick. In the near future, I hope to add some figures in the windows and a motorman at the controls.

In the late 1970’s, an unwatched teenager broke into 472, managed to get it moving, but was unable to stop it before it ran into a caboose, severely damaging one end of the car. My understanding is that repairs were finished, but the car did not see much use before the museum had a major leadership break down with most active members, including Dad, leaving the organization. Today, 472, still in Worthington, is wrapped in a plastic cocoon and is not operational.



Quarantine Time = Modeling Time! : Ethan Bernstein

Scratchbuilding a Concrete Grain Elevator from Paper and Cardboard

Hello all! Hope you are all still enjoying your additional train time and not getting too bored. Here is another one of my paper scratchbuilds, but this one is a little different than my previous creations. The model I will share with you this week is of a small concrete grain elevator, consisting of six silos arranged in three rows of two with an elevator structure on one end spanning the top of the silos, as well as an attached covered-hopper loading shed. The difficulty of building this compared to my other paper buildings is due to the primary difference between the prototypes: wood vs concrete construction.



The idea for this project began with a roll of wrapping paper - well not the wrapping paper itself, my cheap modeler's eye was caught by the long, hollow cardboard cylinder around which the paper is rolled - perfect for creating silos. So I carefully unwound the wrapping paper from the cardboard cylinder, freeing the cylinder from the paper, then re-rolling the paper to disguise the fact that I had removed the cardboard cylinder to avoid my parents' notice. I searched "grain elevator" and immediately found a perfect candidate: a typical, North American, six-silo grain elevator with the elevator section located on one side with a covered structure resting on top of the silos housing the conveyor. I cut the large

cardboard cylinder into six smaller cylinders of equal height, forming the structure for my silos. I had tried spray-painting toilet paper rolls in a previous attempt at building a grain elevator with little success. This time, I knew that I did not want the cardboard grain exposed, so I decided I would wrap each cylinder with cardstock paper, my go-to scratchbuilding material. I cut strips of double-sided tape, wrapping four strips around the circumference of each cylinder to provide an easy adhesive attachment for the paper. I used 5 1/2" x 7 1/2" cardstock sheets, wrapping one entire sheet around each cylinder. I then used wood glue to attach the overlapping layers of paper to each other, securing the attachment with rubber bands wrapped around the cylinder to hold the paper in place while the glue dried. I repeated this process six times to complete all six silos. I made sure that the paper overhung each cardboard cylinder on the ends, as I did not want the jagged-cut edges of the cardboard cylinders to interfere with the height of each silo, as well as ensured that the paper was not creased or bent anywhere to properly simulate smooth concrete slabs.

While the wood glue dried, I began construction of the elevator tower mounted on one side of the silos. I determined that the elevator structure should be situated on the left side of the elevator when viewed from trackside. I used another sheet of 5 1/2" by 7 1/2" cardstock, as this would ensure that the height of the elevator structure is level with the height of the silos. Again using the width of the paper as the height of the elevator (5 1/2"), I made measurements along the length of the paper for each side wall. Once I marked the measurements of each wall, I folded the paper, using a ruler as a straight-edge, to form each wall. Be sure to crease the paper thoroughly to make sharp corners in order to disguise that the structure is made from folded paper and not concrete. I then made sure that the seam where the two pairs of walls attach to complete the elevator is hidden. It is important to plan which side the elevator structure is to be placed ahead of building it in order to make sure that the seam will be hidden on the side attached to the silos and not exposed on the front of the model. I did not glue the walls together yet, however, as I still had to add windows and doors to the elevator. I unfolded the four walls, made the measurements for the door

Quarantine Time = Modeling Time! : Ethan Bernstein

and window openings, copying prototype photos for placement and sizing, and cut out the openings. I then used very thin strips of wood painted dark brown to form window panes and construct the access doors at the base of the elevator. Once those components dried, I then re-folded the four walls, attaching the fourth wall to the first using wood glue. No interior bracing is required for the elevator structure as the creases should provide ample structural support and prevent warping. If needed, small 90-degree triangle supports made from wood or paper could be glued to the corners on the interior of the elevator structure to ensure the creases do not unfold over time (cardstock is relatively strong, and since a roof will be glued to the top of this structure, the walls will maintain 90-degree angles so long as they are attached to the roof properly).

Back to the silos. With each individual silo complete, it was now time to glue them together into three rows of two. For this step, make sure that the seam where the paper overlaps faces inside, gluing silos together just in front of each seam. With three pairs of silos complete, glue each pair of silos together, placing glue on the side faces of both silos. Make sure that the silos are straight in arrangement by using the back of a thick metal ruler or other inflexible straight edge to force the silos into a straight line. Once all six silos are glued together, the elevator can be attached. Glue the elevator to the end two silos on the side of the elevator that has the overlapping seam where the four walls are joined together, this way no seams will be exposed, further contributing to the concrete slab look.



Next for the roof. I used another sheet

of 5 ½ x 7 ½ cardstock, gluing it to the top of all six silos and the elevator, with ample overlap on all sides. I then carefully trimmed away the excess cardstock to match the profile of the silos and elevator. After completing this step with mixed success, I would recommend that the cardstock roof be trimmed to shape before being glued down to prevent damage to the silos and allow for multiple attempts at achieving the correct shape. While the roof cured, I began the top structure of the elevator housing the conveyor which feeds all six silos. This is a long and narrow structure, a potential problem for a material that warps easily. I decided I would need horizontal bracing to maintain the shape of the side walls and roof. I cut the structure from cardstock sheet, making peaks on the end walls for the roof. I folded the structure into shape as with the elevator, then unfolded it to cut out windows. I again used small strips of wood painted dark brown to simulate rusty window panes, then refolded the structure. Before gluing the walls together and attaching the structure to the roof of the silos, I first cut two horizontal braces from cardstock with a peak in the middle to support the side walls and the roof. I then glued the structure together, with the horizontal brace equidistant from each end wall, and disguising the seam where all four walls meet as best as possible. Before attaching the roof, I glued the conveyor housing to the top of the elevator so that I could apply the glue from inside the walls of the structure. Make sure that the sides and ends of the conveyor housing are flush with the walls of the elevator, and that it is placed in the middle of all of the silos, terminating at the center of the end two silos.

If you wish to paint the elevator a concrete color, now is the time. Spray paint adheres well to cardstock, and makes for a very concrete-looking appearance thanks to the porous surface of paper. I chose not to spray paint my model, as the tan cardstock I used closely resembles the color of many concrete elevators. For the roof, I cut two strips of black cardstock, gluing them to the end walls and interior supports, forming a peak in the center. To simulate a metal roof, I then cut small strips of black cardstock, gluing them vertically on each side of the roof, making sure the seams where the strips overlap (mimicking the raised borders on metal roofs to guide snow and rain) line up at the peak.

Quarantine Time = Modeling Time! : Ethan Bernstein

With the roof complete it is now time to build the trackside loading shed. I again made this structure from cardstock, cutting four walls each braced on the interior with strips of wood. I cut out openings on the end walls large enough to fit a covered hopper car on ballasted track. I cut a horizontal angle running the width of the shed on both end walls to create mounts for a sloped roof. I then cut lots of small strips of cardstock, running them vertically on each wall to simulate vertical siding. I glued a single black sheet of cardstock to the end walls to form the base of the angled roof, gluing more vertical strips of black paper as with the roof of the conveyor housing to simulate a metal roof. Once the shed was dry, I glued the shed to the front of the first silo from the elevator. Make sure that the bottom of the shed is flush with the bottom of the rest of the structure. I used a small wood dowel to represent the loading shoot, sanding the ends so it sat flush against the elevator wall and the roof of the shed.

Next for decals. I lettered my elevator for Archer-Daniels-Midland, copying logos from the internet onto a Word document and printing them on plain white printer paper. I cut out each letter of "ADM" individually, leaving only the ink, and glued each letter to each of the three silos. I also glued various other signs and logos across the elevator. In order to make my printer paper decals look more like paint, I first sanded the back of the printer paper behind each "decal," then cut them out. The final look is really realistic and really easy to apply, requiring only a few dabs of wood or project glue to bond to the cardstock. The final step is weathering. I used my typical mixture of water color paints, using a gray wash on the roofs to make them look more like weathered aluminum, and a rust color on the loading shoot, sides of the elevator, and loading shed, streaking in a downward motion to simulate rain-pulled rust stains.

I now have a very realistic looking concrete grain elevator to load my more modern covered hoppers, and for a very conservative price! The total price of this build, just in materials used, was a few cents (one cannot even buy a pack of gum for that little these days!). By thinking outside of the "kit box," I now have a very unique structure that fits my space perfectly without having to modify a \$20+ kit. I did not include details on the other side of the

elevator, only on the side facing the tracks. If desired, a truck unloading shed could be attached to the other side of the elevator housing, constructed in a similar method as the hopper loading shed, just smaller in size.



Well that concludes the details of another satisfying scratchbuild. I hope you all found this article at least mildly interesting and hope that it distracted you from utter boredom for a short period of time, if not inspired you to embark on a new scratchbuilding adventure. Thanks for reading! Next up: scratchbuilding an N scale Lockheed L1049 Constellation from matchsticks, paper, and popsicle sticks. As always, feel free to reach out with questions, comments, or modeling suggestions/requests!

Ethan Bernstein
epberns@gmail.com

Train Spotting: Ethan Bernstein



An old, graffitied CSX bay window caboose/shoving platform, #900422 brings up the rear of the south bound local on July 3, 2020 at St. Denis. Note the car number spray-painted over the graffiti

BANTRAK was founded in 1983 as the Greater Baltimore N-Scale Associates. Begun as a “round robin” group to share skills and experiences, we have expanded our focus to include participation in many diverse activities to promote model railroading in general and N-Scale model railroading in particular. Activities include participation in local, regional and national shows, meets and conventions. BANTRAK membership includes membership in the national NTRAK organization.

The BANTRAK Newsletter is the official publication of Baltimore Area N-TRAK (BANTRAK), Inc. This is **your** newsletter! Please send articles, photos, and suggestions to newsletter@bantrak.net
Editor: David Betz



BANTRAK 2020 Calendar

September 20, 2020

Club Meeting

Location: Zoom Meeting

October 18, 2020

Club Meeting

Location: Zoom Meeting

November 15, 2020

Club Meeting

Location: Zoom Meeting

December 16, 2020

B&O Museum Setup and club Meeting

Location: B&O Museum

December 17, 2020 - January 3, 2021

B&O Museum Festival of Trains

Location: B&O Museum

BANTRAK Membership: Al Palewicz

BANTRAK does a significant amount of charitable activity, although we rarely think of it that way because we get pleasure out of it. When you think about it, that is as it should be with all giving from the heart.

What is our charitable activity? Our major participation is in the B&O Museum's (which is a charitable organization) Annual Festival of Trains. Our display has been a major draw for people to come to the Museum for many years, both recent and in the past. There are plenty more examples, this is just one.

Please contact Treasurer [Tim Nixon](#) for more information regarding your membership status and roster questions or contact [Al Palewicz](#) with general questions.

Member Benefits:

- Sharing of your knowledge (railroading and modeling) with others of similar interests
- Access to railroading and modeling knowledge of other members
- National exposure and recognition of your endeavors in modeling
- Hands on activities: Club modules - track, wiring and scenery. Raffle layout - track and scenery Members' layouts
- Recognition as being part of a Nationally known club.