

RUNNING LITE

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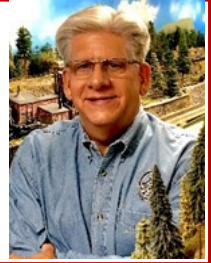
October 24
Cajon Fall Event
Buena Park, Ca

November 14
Cajon Event
Boulder City, Nevada



From The Director

Jeff Hermann
Cajon Division Director



This will be my last report as Cajon Division Director. As many of you know, I recently retired from a 40-year career as an executive with the Boy Scouts of America and my wife and I have moved to north Idaho (Coeur d'Alene area). We have looked forward to retirement and particularly living in this part of the country with its outdoor adventures lifestyle and rich railroading, mining, and timber industry heritage.

With this physical move, my NMRA membership moves as well. Please know how much my involvement in the Cajon Division has meant to me! I have a strong appreciation for the positive influence NMRA has brought to our hobby; especially in the areas of standards, product conformity, education, and advancing modeling techniques. But most importantly I have come to value the friendships I have made along the way...friendships that would not have occurred without NMRA participation.

I am particularly appreciative of the relationships and friendship that developed with the members of the Cajon BOD over the nearly 10 years of my involvement.

But this is not the end of my involvement with NMRA...

I am humbled and excited to have been elected to serve a two-year term as President of the Pacific Northwest Region of The National Model Railroad Association beginning in September! The Pacific Northwest Region includes Oregon, Washington, Idaho, Montana, and Alaska in the US and Saskatchewan, Alberta, British Columbia, Yukon Territory and Northwest Territories in Canada.

Clearly with the recent and on-going COVID-19 related cancelations of so many of our NMRA meets, conventions, and train shows, we have some interesting challenges ahead of us. If we are going to continue to bring value to membership in NMRA and promote our hobby to a wider and younger audience, changes and a new focus in how we operate may be necessary.

I am confident in the abilities and enthusiasm of Joel Morse, Cajon Division Superintendent, and the Cajon BOD to bring fresh and exciting new approaches during these challenging times.

I wish each and every one of you good health clear tracks ahead! Let me know if your model railroading adventures brings you to north Idaho!



Election Results for the Position of Cajon Division Director

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Cajon Division and PSR Board Members:

The election for interim Director for the Cajon Division has closed and with over 16% of the affected members responding (about normal for our Division elections) have unanimously confirmed Richard Hock as their interim Division Director replacing Jeff Herrmann. Jeff has relocated to Idaho and has accepted the Pacific Northwest Region position of President.

Jeff- Thank you for your service to our Region and the Cajon Division during these past two years. We look forward to possible increased interchange between our two Regions.

Richard's position is effective immediately as he assumes the position of the Cajon Division voting member of the PSR Board of Directors. This is an interim position and will be up for re-election at the normal Division Director term cycle in September of 2021.

Richard- Congratulations! and welcome to the NMRA PSR/Cajon Division management group.

Gary Butts, MMR

Cajon Div. Election Committee Chair.

President, PSR, NMRA



“ From the Brass Hat “
by Joel Morse Superintendent



Well, my friends, here we are, five months into the “Covid lifestyle”, and it doesn’t look like things are going to change much for the better in the near future. In my opinion, the only thing each of us can do is be smart, be safe, be kind to one another, and make the best of this terrible situation.

For me, making the best of this terrible situation means more spending time with my family and friends (socially distant outside and/or video calls) and doing things that I enjoy, to get my mind off the things I cannot personally affect. Model railroading, and these days that mostly means model building and scenery construction, is how I’ve been spending the bulk of my free time. (I also read voraciously and play banjo.) I’ve made a commitment to myself that when we get back to the “new normal”, I will be able to look back and see that I used whatever extra time the Covid lifestyle has given me, constructively.

The Cajon Division Board of Directors has been using this Order Board Lite as a way to tell the membership about what we have been doing with our model railroading time. I also post to the Cajon Facebook Page and the Group IO, but I’m not seeing many posts from the members about what YOU have been working on! Frankly, I’d like to know what you are working on, and I think the rest of the member would like to see it as well! So please go to the Cajon Division pages listed below and tell us what you have been up to!

Io group: <https://groups.io/g/CajonDivisionPSRGroup>

Facebook page: <https://www.facebook.com/CajonPsr/>

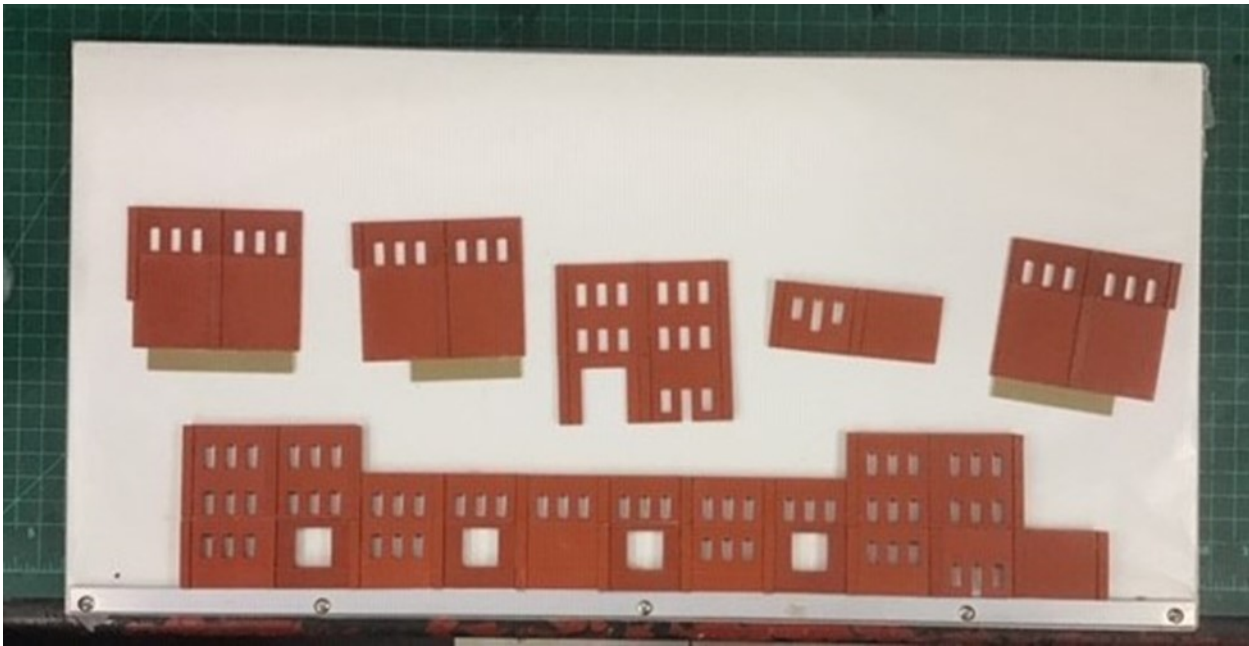
Facebook group: <https://www.facebook.com/groups/CajonDivisionPSRGroup/>

Other News; Keep an eye out for information regarding the Cajon Division Buddy System, which the Board of Directors is working out now. A number of Regions and Divisions are creating Buddy System programs in order to provide more membership interaction until we can meet in groups, in person (and maybe beyond). The Cajon Board sees the Cajon Buddy System as a way for members to get acquainted with other members who share their interests – through video calls and presentations or even in small, socially distanced groups. More to come on this as we flesh out the program.

Modeling Tips

A new structure building tool – Shelf with stop by Joel Morse

When building structure kits or scratchbuilding, I usually tape a 15" ruler to a 23" long, ¾" thick laminated shelf piece I purchase a number of years (\$10.00?) to use as a "stop". This has worked well enough over the years. But recently I started on my current project, a 16" long, 2.5" deep, three story high factory building flat, and it became clear that if I wanted the base to be even and the structure to be square, my old way wouldn't work well enough. I looked around the layout room and considered styrene or wood for the stop. Each were problematic. Then I remembered that I had a piece of ½ inch wide, ¼" deep aluminum "U" channel from another project, that would be perfect. I cut the aluminum channel (\$5.00?) to the shelf length with a hacksaw (Dremel would have worked) and then using the Dremel, ground down the sharp edges. Then I drilled a few holes, turned the channel so the "U" was down, and attached it. I also attached wax paper to the shelf, to keep the glue from sticking to anything but the model. This has made building this structure much easier, faster and with a better result. Ready for painting.



A new product - Museum Wax by Joel Morse

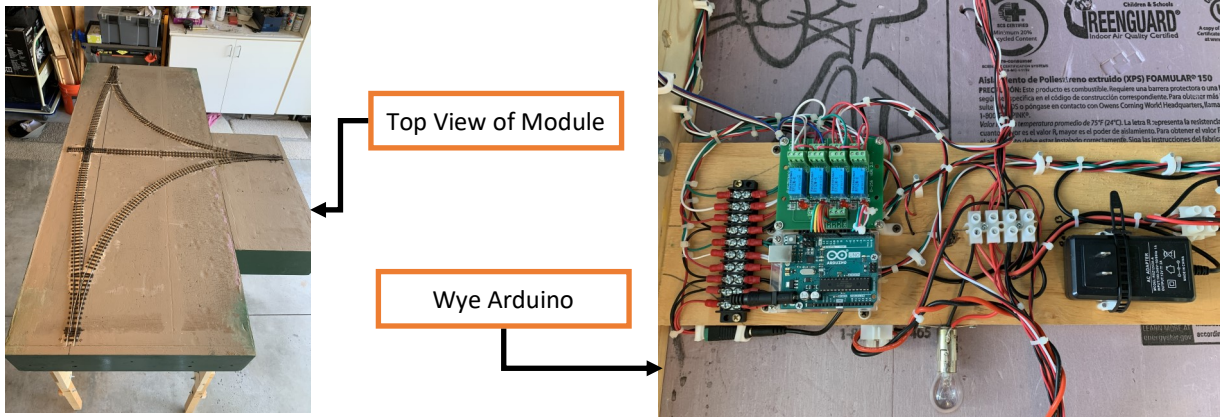
Museum Wax is a handy product to have around the workbench. If you've never heard of or seen it, you may want to consider it as an alternative to tape and glue for some applications. I've been using it for many years and this is the only jar I've ever purchased. A little goes a long way. Marketed to hold items on shelves during earthquakes, it is excellent for a number of purposes on the layout or at the workbench. At room temperature, it's a relatively hard wax, which is scooped up in small increments with the provided wooded diamond shaped scoop or with popsicle sticks. I use to hold odd shaped items to the foam core I use as a painting base. I also use it to hold figures, vehicles and details in place temporarily. This jar like this cost less than \$10.00.



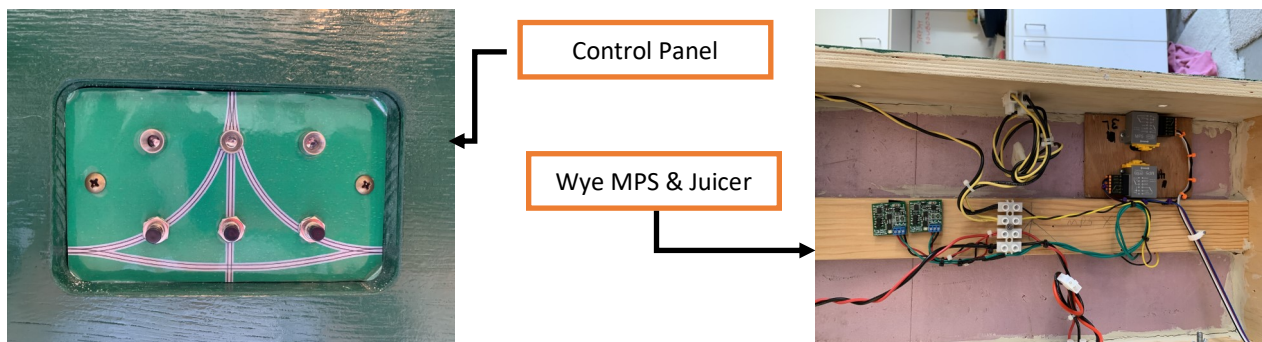
Building an On30 Wye Module by James Smith

With the COVID-19 lockout keeping me home more than usual, I've been working on a new wye module for my California South Coast On30 modular club that is a bit different. What makes it different from most wye's is that it has a three-way switch with a center leg that intersects the main line at a 90-degree angle. I have nicknamed this module "Gomez Crossing" in honor of the old Addams Family TV series. Since I'm a retired software engineer, I decided that it would be fun to also implement path switching using an Arduino Uno mated with a quad DPDT relay board to drive four MP5 switch machines.

Looking at the pictures, you may have also noted that the module comes in two pieces. This serves two purposes. First it allows for easier transport and second, it allows me to electrically isolate the three-way switch from the rest of the module. I'll explain why that is important a bit later. The small 1' x 2' piece with the three-way switch on it mounts to the main module using a set of modified auto door latch pins that were invented by Hugh Poole. These pins ensure that the rail alignment stays true each time the module is reassembled after transport.



The way the path switching works is that I use three GPIO pins on the Arduino as inputs for the push button switches and four GPIO pins as outputs to drive the four relays. When one of the buttons is pressed, it connects a ground to the input pin which the software detects as a momentary low on the pin. After de-bouncing the input by making sure the pin stays low for 10 milliseconds, the software then sends the appropriate high or low signals to the four relays to drive the MP5 switch machines to the appropriate position. The second contact on the relays is used to drive the LED's on the two control panels so the operator can easily determine which path is currently set.

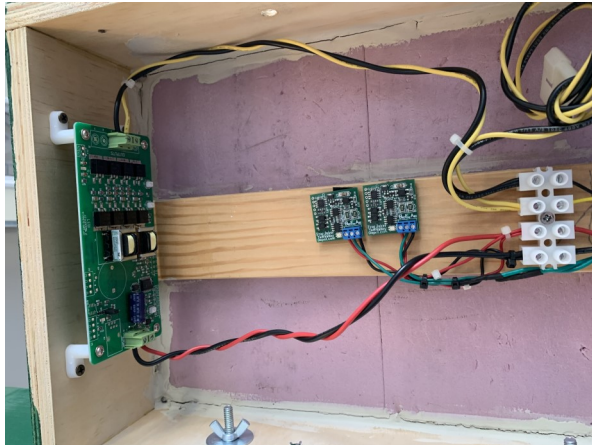


You may have also noted that I'm not using the extra contacts on the MP5 switch machines to power the frogs on the switches. Instead, the frogs are being powered using Tam Valley Frog Juicers. This was due to an issue where the contacts on the switch machines could close prior to the switch points moving, causing a short. Our modules use two-inch thick foam insulation board as the base for our track and scenery. Even using heavier gauge piano wire to connect the switch machine to the switch, there was enough of a delay that a temporary short would occur, causing our DCC controller to reset.

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The reason for electrically isolating the three-way switch is to allow it to be connected to an auto-reverser. This ensures that the rail polarity is always correct no matter which leg of the wye is used by a locomotive. When another module is connected to the three-way switch side, it is also powered by this auto-reverser and isolated on the far side to ensure that there is sufficient length for an entire train to fit in the auto-reversed section, preventing possible shorts.

The software is written so that it ensures only one of the three legs is active at a time, thus preventing multiple trains from entering the wye. It does not prevent two trains from colliding at the 90-degree crossing however, hence the name "Gomez Crossing". It remains to be seen if the members of my club will live up to the name!



Wye Reverser



Side View of Module

FUTURE EVENTS

~~September 9—13 PSR Convention in Van Nuys, Ca.~~ **CANCELLED**

October 24, Cajon Division Meet, Buena Park.
Contact Carl Heimberger @ cjheimberger@gmail.com for details

November 14, Cajon Division Meet Boulder City, Nv.

September 8—11, 2021 Orange Blossom Special

PSR Convention

Irvine, California

<http://www.psrconvention.org/>

[OrangeBlossomSpecial2021](https://www.facebook.com/OrangeBlossomSpecial2021)

Cajon Media Sites

Groups.io group: <https://groups.io/g/CajonDivisionPSRGroup>

Facebook page, <https://www.facebook.com/CajonPsr/>

Facebook group, <https://www.facebook.com/groups/CajonDivisionPSRGroup/>

The Editor's Column

by Morrie Fleishman
Editor: Cajon Division



Welcome to the third issue of **Running-Lite** for Cajon Division members. During this current Pandemic situation with all of the normal events such as Train shows, Division, and other NMRA sponsored events being cancelled The Cajon Board felt that a monthly short-form Order Board would be invaluable in keeping members updated with modeling opportunities available such as the many Virtual (On-Line) events that have been popping up everywhere. Please send me an email and pictures showing what you are working on and letting us know what on-line events you are aware of so that we could spread the word to others.

Thanks. Morrie Fleishman mefleishman@cox.net

Reminder: Virtual Meetings via Zoom, Skype, etc.

While new to some, IT types have been using products like webex and gotomeeting to do training to remote sites for many years. I have recently become aware of the NMRA-X Virtual Model Railroad Convention Live Events which runs for 12 hours with 10 or more presentations on a variety of topics. Check the calendar on the NMRA website for future dates.

From July 12 to 18 the NMRA hosted the first-ever NMRAX Virtual National Convention. For the entire week for 15 hours each day they presented clinics on various model railroading subjects. I was able to watch many of them at a time convenient to myself as they were available on Youtube and Facebook. If you would like to access them, I suggest you highlight the Virtual Convention-X on the July calendar on the NMRA website. It will take you to the Convention page and by clicking on the Facebook or youtube connection it will get you to page where each program is shown by day. I suggest that you check the daily schedules first. Since each days recording is continuous, you will need to shift throughout the recording to find your clinics.

Finally, the Operations Special Interest Group, OPSIG, held their annual meeting as a virtual meeting on Sunday, July 12. The schedule for August will start on Sunday August 2 and continue on August 16 and August 30. For times and other information see the OPSIG website opsig.org.

Common elements of all of these meetings are that attendees are provided with the login information, the time and as well as reservation information as there may be limits on the number that can join in. Often the meetings have been recorded and are available on youtube.

The formats use a combination of layout tours and clinics, some with Powerpoint presentations. In addition, there are a lot of videos available on the NMRA website.

While it doesn't look like we will have train shows and events in the immediate future, these options provide valuable ways that people can take advantage of clinics and can have some limited interaction with other Model Railroaders.

As many of you know, I'm very interested in operations, and during operations on my layout, the crew and the dispatcher are all together in the garage. The dispatcher is out of the way of the crews, but can still clearly see the layout and therefore "cheat" a bit in the dispatching effort. Over the years we have advanced from "smoke signal" dispatching (stop if you see the smoke of another train) to verbal track warrants with the Dispatcher using a Dispatcher's Train Sheet to run the railroad. The way we currently handle verbal track warrants is through a formalized script the train crews and dispatcher are supposed to follow (note supposed!) in order to maximize the efficient transfer of the pertinent information. Crews walk over to the Dispatcher's desk and report (OS) the location of their train, and receive verbal permission (warrant) to proceed to the next station or control point location (ie: Walton Yard Limit).

The next step is to move the Dispatcher from the layout room to another room in the house, so he cannot see the location of the trains on the layout, and like a real Dispatcher, he must run the railroad based on his ability to keep control of the location of the trains. When the decision is made to move the Dispatcher out of the layout room, you must consider, select and implement an appropriate method of communication. I can't use a telegraph key (and even though my last name is Morse, I don't know the family code) and that wouldn't be era appropriate for my time frame of the early 1950's. Many operating layouts use walkie talkie radios with ear/mics, but operators complain about the amount of cross talk and chatter that each operator is constantly dealing with. One alternative to the telegraph or the radio, is a telephone system, which is era appropriate for me.



Figure 1 Agent Phone on Backboard



Figure 2 Basic Phone Component Kit



Figure 3 Cup Style Hookswitch

The basic "phone kit" consisting of the Speech Network Module, "Push to Talk Handle" and "Cup Style Hookswitch" is shown in Figure 2. The phone system Frank purchased consisted of five of "Push to Talk Phone Handles", five Cup Style Hookswitches (where the handle rests when not in use) and five Speech Network Modules, as shown in Figure 2. Frank also purchased a power supply module, a Dispatcher Station module and two buzzer/light combination components. A close up of the Cup Style Hookswitch in Figure 3 shows the black portion "cup" and the white actuator of the "Hookswitch". Figure 4 shows the mechanical contacts of "Hookswitch" on the back of the Cup. When the phone handle is in the Cup ie: "on hook", the white actuator is depressed, the switch contacts of the Hookswitch break the phone circuit and the phone is dead (hung up). When the handle is "off hook", the connection is live; and the "press to talk" handle works like a radio or walkie-talkie. Press to talk, release to listen.

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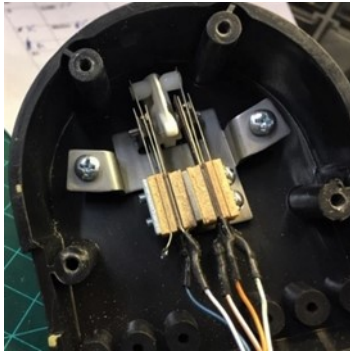


Figure 4 Hookswitch

The wiring, while it may look complex, was actually quite straightforward, once I understood some of the telephone wiring terms and the concept of how older types of telephones work. At the end of the day, with this system, in order to get the voice portion of the telephone system working, you only need two wires, the “Tip” and the “Ring” to create the talking circuit. The rest of the wiring is available for “auxiliary” applications, so the system is wired using a CAT 5 cable for a bus, so you could use all the wires if you needed them. In order to install a light and buzzer in two of the phones, I used three wires for this auxiliary circuit. This circuit will allow the Dispatcher to alert the Yard Master to go “off hook” in either Bakersfield, or the Traffic Control Manager (staging master) with the push of a dedicated button at the Dispatcher desk.

Each phone needs to be mounted on a board – I used some ¼ inch thick shelving cut to size and spray painted flat black. The four screws hold the cup hook to the backboard. The wires coming from the hole at the top come from the “hook switch” and the wires from the bottom hole come from the handle. The terminal strip provides a location for the CAT 5 bus to connect to each individual phone backboard – note that the terminal strip has not been installed in Figure 5, as this picture was taken while I was testing the circuits. Figure 6 represents the finished Yard Phone with light and buzzer circuit. I want to repeat the message that this is not a difficult project, despite the rat’s nest of wires shown in Figure 6. The wires are color coded of course, so blue to blue, white to white. The instructions provided with the kit are constantly being improved to clarify terms and procedures. Once I understood how the wiring worked, the hardest part was creating a template for mounting the Cuphook to the backboard.

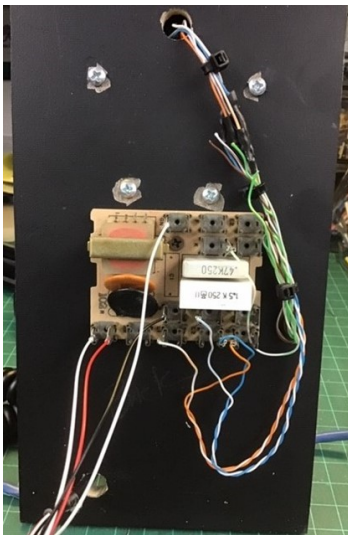


Figure 5 Typical Wiring - Agent Phone

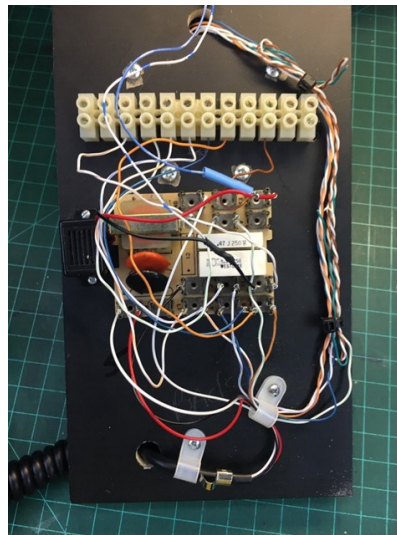


Figure 6 Yard Phone wired for Light and Buzzer



Figure 7 Yard Phone with Light and Buzzer

Now that I know how to do this, I’m looking forward to building a few phones for me and moving the Dispatcher out of the train room.

Support Your Local Hobby Store

In these times when Hobby Stores have not been able to function normally, we need to continue to support them when we can. There are 3 Brick and mortar train stores in our area that support our hobby;

**Arnie's & Milepost are now
OPEN for regular business!**

YES!! Come in and shop around!

Arnie's HOURS: Tuesday - Saturday 10am-6pm

Milepost 38 HOURS: Tuesday - Saturday 10am-5pm

**Social distancing of 6' will be enforced & we ask that you wear
a face-cover for the safety of other customers and employees per OC Guidelines.**

Arnie's Trains www.arniesmodeltrains.com 714-893-1015

Milepost 38 Toy Trains | www.milepost38.com 714-892-9471

6462 Industry Way, Westminster, CA 92683

NOTE: There is highway work going on around Arnie's so check with them about the best route.

RailMaster Hobbies, 9812 Belmont St., Bellflower, Ca. 90706 562-867-5627

We plan to go back to regular hours starting June 1.

Tuesday - Friday 10:00am to 6:00pm

Saturday - 10:00am to 5:00pm

Sunday - 12:00pm to 4:00 pm

Following us on;

www.railmasterhobbies.com

www.facebook.com/railmasterhobbies

Twitter - @RMHobbies

Restrictions to come into the store:

We follow official health guidelines

We do thank all of you for your support. Stay safe.

Jeff and Leticia Smith and Crew

The Train Crossing, 1113 Baker Street, Costa Mesa, Ca 92626 714-549-1596

Store Hours

Tuesday - Friday 11:00am to 7:00pm

Saturday - 9:00am to 5:00pm

Sunday - 11:00am to 3:00 pm

Closed Mondays

www.TheTrainCrossing.com

Authorized Lionel Repair Dealer

Restrictions to come into the store:

We follow official health guidelines John Amir