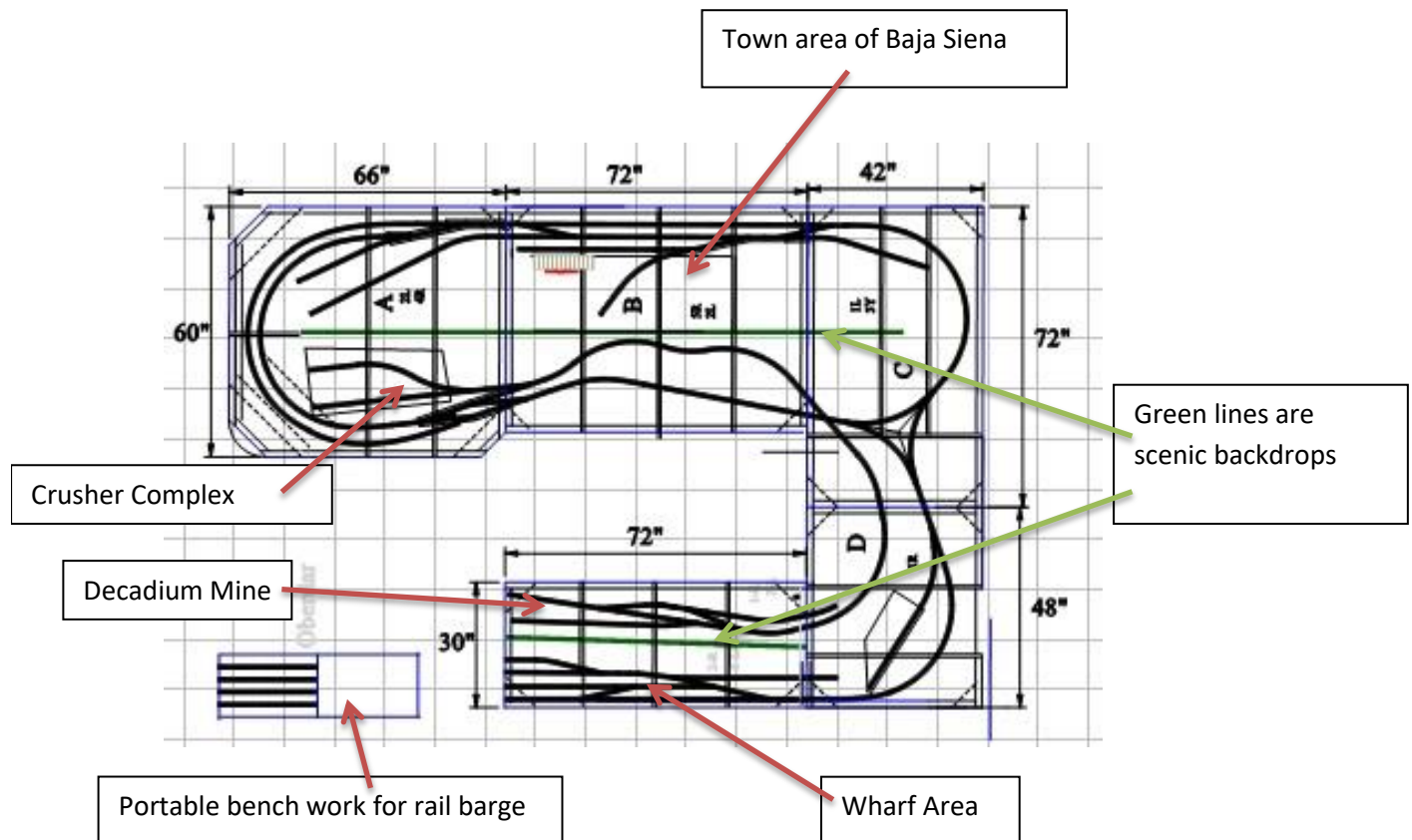


In the spirit of sharing, Master Model Railroader Chuck Ricketts is creating a series of emails to describe how Jim Elder and he are constructing a sectional layout in the garage. This layout, while a pure fantasy model railroad, is operations oriented. The first email described Chuck's model railroad background with a brief look at some of his previous layouts and why, in his mid-eighties, he is starting a new layout. The second article told the history on Baja Siena (or at least Chuck's version of the history). In this article, Chuck begins to describe the construction of the Baja Siena Railroad and Navigation Company.

Fantasy Island Layout - Article 3

The Baja Siena Railroad and Navigation Company Track Plan



Construction Goals

Goals for this layout include:

- **build the layout as cost-effectively as possible**
- **build it sectional**
- **use high quality track for reliability**
- **provide inexpensive turnout control with polarity controlled frogs**
- **provide decent operational possibility for several operators.**

In this layout, I also want to incorporate new construction ideas, some of which were not used in past layouts.

Lumber

So far, I have only spent approximately \$100 on new lumber, buying the least expensive (but still straight) pieces I could find. I had some left over plywood that was available for the project too.

Lumber purchased for the layout:

- **1x2's and 1x3's for frames and joists and L girders**
- **3/8 inch plywood sub-road bed**
- **1/2 inch plywood for legs**



Once some L girders, joist and leg assemblies are built, they will be arranged into the sectional benchwork for the Baja Siena. Fantasy Island – Article 4 will describe how lumber becomes benchwork for a model railroad.

Track

I have spent about \$300 for new rail and ties to assure that the track work is high quality.

Track products purchased for the layout:

- **297 feet of code 83 rail at a cost of approximately \$180**
- **pre-cut wooden ties for approximately \$100.**

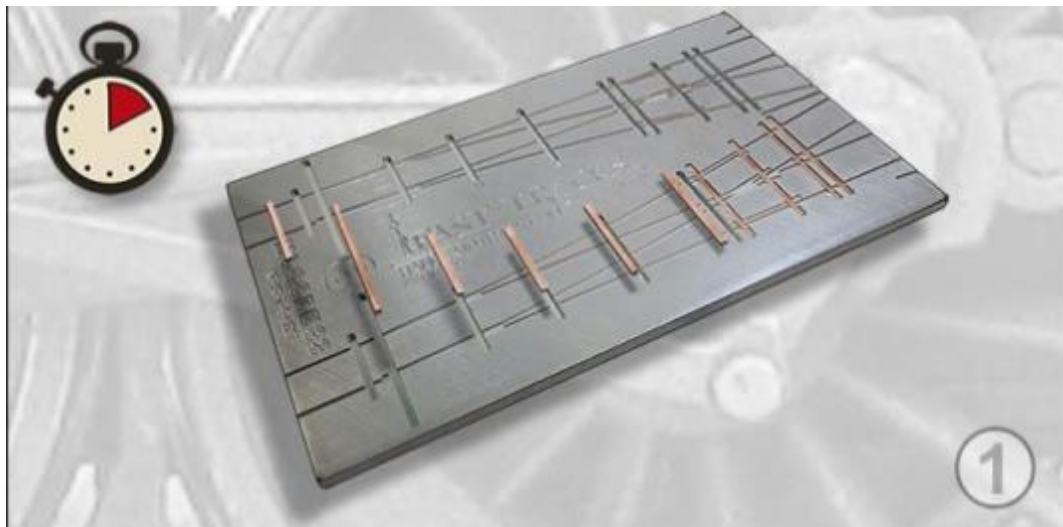
Some of you know that I strongly prefer handmade track. I find it to be the most reliable and durable. With my poor eyesight, spiking rail to ties as I have done in the past is darn near impossible. So we are trying several new things this time around:

- **I have pre-constructed multiple “sectional track pieces”, using code 83 rail soldered to Fast-Track cross ties without all the wood ties for now. Curved sections have the soldered in ties spaced more closely than the straight sections.**

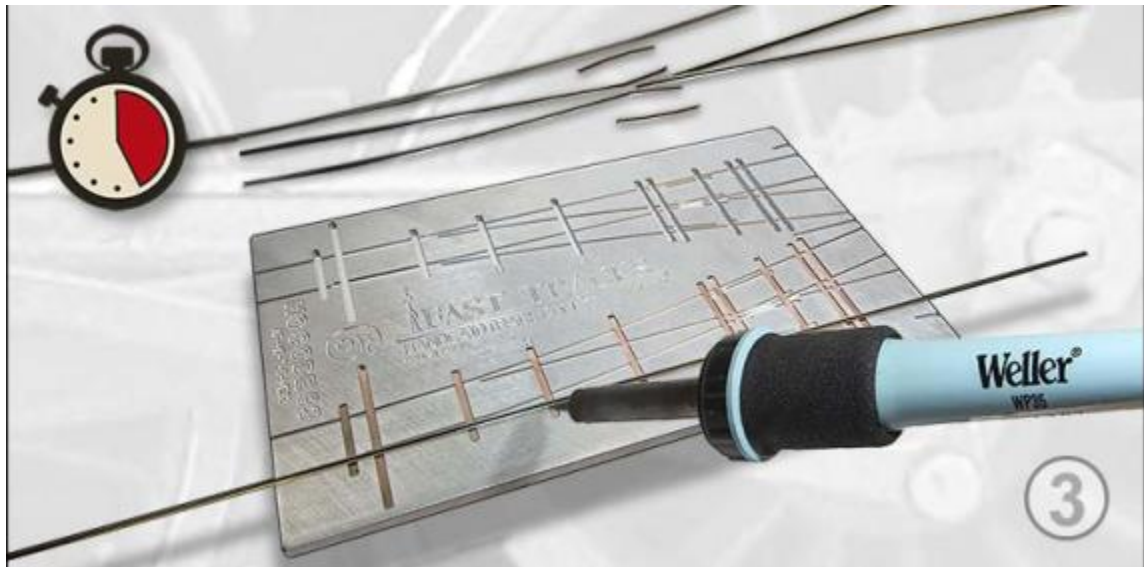


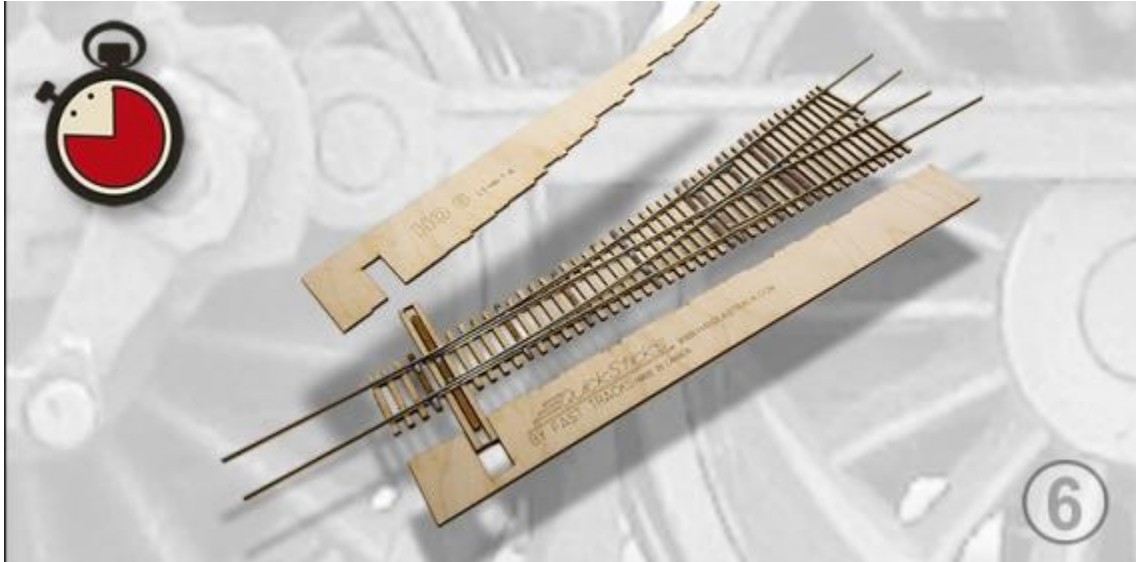
Examples of the “sectional” track pieces built by Chuck using a 3 point track gauge

- **Jim has built the 30 turnouts using a Fast Track Assembly Fixture. These turnouts cost approximately \$1.50 each.**



Fast Track Assembly Fixture <https://www.handlaidtrack.com/>





Instruction included with the Fast Track Assembly Fixture and video tutorials describe the construction of a turnout using a Fast Tracks Assembly Fixture, tools and supplies. Here is a sample of the process.

Building a Turnout includes:

Form the Guard Rails

Form & Solder the Frog Points

Prepare & Insert the PC Board Ties Into the Assembly Fixture

Prepare & Install the Stock Rails

Prepare and Install the Switch Points

Install the Guard Rails & Frog Points

Complete the Switch Points

Re-Enforce the Frog Points

Cleaning the Turnout

Isolate the Frog



13 left hand turnouts, 13 right hand turnouts and 4 wyes built by Jim using the assembly fixture

Getting the Roadbed, Ties and Track on the Layout

Since rails won't be spiked, I have chosen to use Woodlands Scenics foam roadbed in most places with 1/8th inch cork sheets in the yards.

Wood ties will be attached to either type of roadbed preferably with Alex Plus caulk if available or white glue. The flexible bond created by the caulk is my preference.

The rail sections and turnouts will be sprayed with Rust Oleum camo sand paint and the tops of the rails immediately wiped clean.

Pliobond will be applied on the bottom of the rails and then with everything set in gauge, a hot soldering iron is held to the rail which activates the glue and fixes the rail to the wooden ties. A quick touch secures the track to the wooden ties, in gauge, without unsoldering any of the previous work.



PLIOBOND 20 adhesive is a general-purpose thermosetting **adhesive** which can be used to bond virtually all porous and nonporous substrates. When cured, **PLIOBOND 20 adhesive** provides tough, chip resistant bonds.
<https://ruscoe.com/products/adhesives/>

Track work will be treated with more detail, when we get to that step in a future Fantasy Island Railroad email, but first we need some benchwork built!

What's Next?

In Fantasy Island - Article 4, Chuck will discuss how joists, L girders and legs are assembled into benchwork for the railroad. Chuck will also discuss how he is combining some of his technical theater experience with model railroading experience. Chuck's innovations in construction will, hopefully, require seldom having to duck underneath the layout.