OPSIG Design Challenge New London and Vicinity

Over the past couple years our challenge has involved narrow gauge in Northern California and a fast bridge route in Oregon and Washington. This year we are moving east to the route of the fastest train in America but the era is the late transition era where steam still graced the rails along with diesels and electrics.

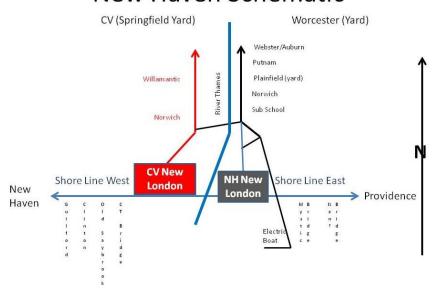
The New York, New Haven & Hartford was the principal passenger carrier from New York to Boston and other areas of New England. Its predecessors dated back to 1833 and by the time of our challenge it had consolidated almost all the railroads in Connecticut, Rhode Island, and southeastern Massachusetts. The four track main from New York to New Haven and the double track main to Boston carried thousands of passengers a day both directions between NY and Boston with a fast time of just over 4 hours at an average speed of 52 mph including stops. [Acela does the same run today in 3 hours 40 minutes at an average speed of 60 mph.]

The challenge centers around New London where the NY, NH & H interchanged with the Central Vermont. The CV heads north up the Thames River through Massachusetts and Vermont and on to Montreal. More of a freight railroad than the New Haven, it provides for freight interest on the model. The New Haven also had a Branch up the river, so there were active railroads on each side of the river.





New Haven Schematic



Givens and Druthers

Wide aisles - 36 inch with 40 inch plus in traffic areas [30 inch pinch points] Nearly 360 degree access

No bottlenecks in the aisles ever.

Manageable amount of mileage,

No track or turnout more than an arms length away.

Operational flexibility but want to run without a huge crew.

Maybe leave the prototype behind and freelance entirely.

No tortoises anywhere.

No bowl of spaghetti track plans.

Enough railroad to warrant a dispatcher separated from the pike.

Maybe elevated, maybe completely remote!

A main line.

View blocks strategically placed.

No lift bridge or duck under in a traffic lane.

No specific requirement as to minimum radius, frog no., grades, just the usual No switch machines unless situationally critical. Moving to mechanical, finger throw or cables/rods to fascia.

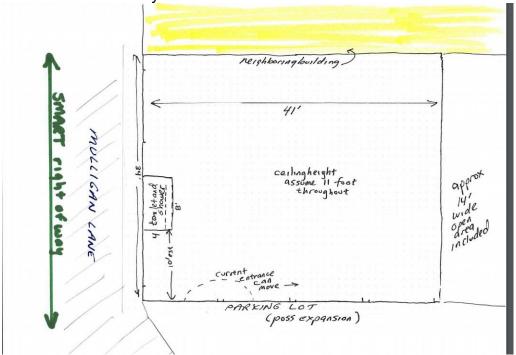
Live frogs.

Use the height of the room fully. 12 foot space to the ceiling beams, roof is peaked so there is essentially an open air attic above that.

Please NO helix

Space for dispatcher and operator(s)

Space is 41x34
Restroom is the only interior obstruction



A group has been discussing layout plans and operations since August. There have been about 25 plans thus far. A better plan may be out there that satisfies the givens and druthers and we hope that this challenge will provide more inspiration. There are some issues like the New Haven station location in New London how to solve the track arrangement in New London to keep everything in proper relation. Another is how to include the New Haven branch and CV lines north. None of the existing plan items are granted immunity from revision.

This Challenge is concentrating on operational suggestions for the railroad. If you have layout design comments, modifications, or alternate plans they are welcome.

Operational Considerations Era 1956 TT/TO or Track Warrants Level 1 is mostly passenger,

Level 2 is mostly freight

Crew - 12 makes for a fully staffed session, and the jobs probably adjust to match such a target... as in 8 to run and 12 to run full bore

Group operational comments:

When we made the decision to do New London station, I think we felt we could, and wanted to, show the scenic CT shoreline. There is a lot of industry along the shore line and I envisioned a hybrid on the lower level and more rural, CV switching above. There are plans and schemes that can make this passenger vs. freight interaction fun. Also remember, the idea was level 2 would be a great switching layout by itself, the lower level can run from time to time, or nighttime schedule, or whatever...

This would leave 2 alternatives. The layout can be all CV from New London and its piers to Palmer MA. Thats a lot of railroad. Or the layout can be the northward CV line and the northward NH Norwich branch, with the Thames river bridge being the base of what is really a big V shape. This would be very intriguing to try.

The line is Providence/New Haven. Not too far and a local or hauler could make that in a day's run. You have enough main to support 6 town/major industries given a 16' train and two "blocks" (you'll want to allow for the possibility of at least ABS signaling) between towns/major industries. Could I suggest division point yard at one end and clusters of industries in switching districts at either end? Port facilities in Providence or NH? That leaves 4 LDEs and about 100 real miles in between. The NH main had lots of cool bridges for the blocks between towns. The major city is New London, so you could do Electric Boat and the submarine base. Or your right of way could veer inland for some nice New England towns with small industries.

Additional material is available for persons interested in accepting the challenge and willing to make a short (10 minute) presentation at the PCR SIG meet January 28, 2017 in Mountain View, CA. Contact Bruce Morden, bdmorden@sbceo.org for additional information.