Update of Vermont Rail Plan & Vermont Freight Plan
Presentation #2

Vermont Town Hall
December 17, 2020
Background & Goals

- Good planning and follow-through makes for efficient passenger and freight rail for Vermont
- FRA requires a State Rail Plan at minimum every four years to be eligible for certain rail grants
- FHWA requires a State Freight Plan every five years in order to obligate Freight Formula funds

- **Public’s Role:**
  - Provide input!
Rail Plan & Freight Plan Overlaps

Although two separate planning efforts, the Freight and Rail Plans share common tasks and work products.
Additional Information on Web Pages

- Newsletters
- Data Trends Summaries
- Existing Conditions Technical Memo
- Commodity Flow and Economic Futures Memo
- This presentation and handouts for the meeting (reasonable initiatives, screening criteria, draft screening)
- Vision, Goals, Needs & Potential Initiatives Memo (coming soon)
- Online map with information and initiative feedback tool (coming soon)
- Recording of Town Hall #1 full presentation and slides

Rail Plan: https://vtrans.vermont.gov/rail/reports
Freight Plan: https://vtrans.vermont.gov/planning/freight
Rail Plan Elements

- **State of System**
  - Overall socio-economic background

- **Vision and Goals**
  - Review vision and specific goals for the rail system

- **Existing Conditions**
  - Commodity flows
  - Passenger ridership

- **Trends Analysis**
  - Overall socio-economic conditions

- **Initiative Ideas**
  - Outstanding from 2015 Rail Plan
  - New initiatives

- **Initiatives Prioritization**
  - How do we decide which initiatives to pursue?

**Today's Topics**
Modeling Some Passenger Rail Initiatives
Passenger Rail Modeling Approach

• Forecast Horizon: 20 years (2040)

Background Factors
• Economic Trends
• Demographic Trends
• COVID-19 Impacts

Already Committed Service Improvements

Explore Selection of Initiatives
Passenger Rail Modeling Scenarios

<table>
<thead>
<tr>
<th>Rail Scenarios</th>
</tr>
</thead>
</table>
| **Vermont Corridor** | No Build  
*Vermont* train extension to Montreal, one round trip per day  
*Valley Flyer* train extension, one round trip from Greenfield, MA to White River Jct.  
Twice-daily *Vermont* service, with both terminating in Montreal  
Connection to Boston at Springfield, MA from *Vermont* serving Montreal  
79 mph service on *Vermont* |
| **Ethan Allen Express / Western Corridor** | No Build (*Ethan Allen Express* extension to Burlington included)  
Albany - Burlington via Bennington and *Ethan Allen Express* extension to Burlington (separate trains)  
79 mph service on *Ethan Allen Express*  
Extend *Ethan Allen Express* to Essex Junction to connect with *Vermont* to Montreal |
27 Potential Growth Scenarios Developed

How quickly will rail service return to 2019 levels?
• 2021, 2022, or 2023

How long until passenger rail demand returns to pre-COVID ridership levels?
• 1 year, 2 years, 3 years

At what rate will population & employment grow by county?
• Low, medium, and high projections

Developed background growth scenarios using answers to above questions
• 10th percentile of the 27 outcomes (low)
• 50th percentile of the 27 outcomes (medium)
• 90th percentile of the 27 outcomes (high)*
### Passenger Rail Modeling – Results (Preliminary)

<table>
<thead>
<tr>
<th>Scenario</th>
<th>FY2019 Ridership</th>
<th>Low Growth (2040 Ridership)</th>
<th>Medium Growth (2040 Ridership)</th>
<th>High Growth (2040 Ridership)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Vermont – No Build</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Vermonter day train extension to Montreal</td>
<td>78,673</td>
<td>117,300</td>
<td>126,700</td>
<td>191,500</td>
</tr>
<tr>
<td>Twice-daily Vermonter service, with both terminating in Montreal</td>
<td>78,673</td>
<td>185,700</td>
<td>189,000</td>
<td>208,600</td>
</tr>
<tr>
<td>Extension of one Knowledge Corridor Valley Flyer train to White River Jct.</td>
<td>78,673</td>
<td>362,100</td>
<td>368,900</td>
<td>407,100</td>
</tr>
<tr>
<td>Connection to Boston at Springfield, MA from Vermonter serving Montreal</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>79 mph service on Vermonter</td>
<td>78,673</td>
<td>Under development</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Ethan Allen Express – No Build (includes Burlington extension)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Albany - Burlington via Bennington and Ethan Allen Express extension to Burlington (separate trains)</td>
<td>16,561</td>
<td>34,900</td>
<td>37,300</td>
<td>56,300</td>
</tr>
<tr>
<td>79 mph service on Ethan Allen Express</td>
<td>16,561</td>
<td>Under development</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Extend Ethan Allen Express to Essex Junction</td>
<td>16,561</td>
<td>Under development</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Discussion & Questions

Which future growth scenarios seem most likely to this group?

Are we missing essential elements of the potential initiatives that were modeled?

These modeled initiatives are being screened like all the others, but do you have reflections on them so far?
Potential Initiatives
2020 Rail Plan Goals (Minor changes from 2015)

- Maintain existing system (State of Good Repair)
- Expand capacity to accommodate growth
- Increase rail system use (freight & passenger)
- Fund the rail system adequately and sustainably
- Improve intermodal connectivity (freight & passenger)
- Act on opportunities for ancillary economic development
- Enhance safety, security & resiliency

- Aligned with other efforts
Sources for Potential Initiatives

- Data Analysis/Performance
- Stakeholder Input
- 2015 Rail Plan

Potential Initiatives
Location-Specific Sample Initiatives

• Phased upgrade to gates/flashers of rail crossings of public roads on existing and planned Amtrak routes

• Improve wayfinding, explore transit-oriented development near stations

• Coordinate and increase marketing when Amtrak services resume

• GMRC bridges to 286,000 pounds and rail weight upgrades
Policy & Program Sample Initiatives

• Preserve rail siding access to existing industrial sites
• Publicize existing voluntary efforts of railroads and encourage “freight as a good neighbor” (NCHRP Syntheses 320) while respecting rail’s exemptions from local control
• Upgrade all lines to 286k pound weight bearing capacity
Discussion & Question

Are there additional initiatives that should be added?

Is there more you want noted about any of the initiatives?

How much background is useful in the report & tech memos?
Next Steps: Initiatives to Implementation Table

Table of potential initiatives

Model some potential passenger rail initiatives

Screen the full table & discuss next steps

Short set for VTrans implementation table
Screening Rail Initiatives
Screening is & is Not...

• The full table of potential initiatives can be pursued by anyone and may be helped by being listed in the Plan
• Screening IS quantitative, transparent background to assist in well-informed discussions
• Screening IS NOT “the” answer or commitment
• The 2015 Rail Plan used qualitative screening, but the state of the practice has moved on as tools like GIS have improved
Screening to Short Set of Initiatives

--- 20 points each ---

Safety
  - In an area with existing crash locations or identified safety issue

Asset Condition
  - Maintains or improves asset conditions

Connectivity
  - Enhances connectivity for bicyclists, pedestrians, transit, or freight modes

Economic Access
  - Promotes economic competitiveness and/or reduces costs

Resiliency
  - Helps accommodate disruptions and changes in network demand

Environment
  - Reduces vehicle miles traveled or vehicle emissions

Community
  - Improves sense of community or endorsed by the RPC/municipality

--- 10 points each ---

Mobility
  - Improves network role of rail beyond Vermont

Health Access
  - Increases access to health facilities
# Introduction to Draft Results of Screening

<table>
<thead>
<tr>
<th>Location Specific Initiatives</th>
<th>Preliminary for discussion only - not final</th>
</tr>
</thead>
<tbody>
<tr>
<td>Initiative #</td>
<td>Initiative Name</td>
</tr>
<tr>
<td>---------------------</td>
<td>-----------------</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Program/Policy Initiatives</th>
<th>Preliminary for discussion only - not final</th>
</tr>
</thead>
<tbody>
<tr>
<td>Initiative #</td>
<td>Initiative Name</td>
</tr>
<tr>
<td>---------------------</td>
<td>-----------------</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Next Steps

• Provide input/comments on draft screening by Thursday Dec. 31st
  • By email
  • Through the online web map

• You will also have a chance to comment on the Draft Rail Plan
  • Coming after the holidays
But Wait, There’s More!

• The Freight Plan is on-going and will pick up steam once the Rail Plan is finalized
  • Will use relevant information developed in the Rail Plan
    • Freight rail existing conditions
    • Commodity flows
    • Needs and potential initiatives
  • Supplemented by information from other modes (truck, air, water)
Thank You

For more information on the Vermont Rail Plan Update, visit vtrans.vermont.gov/rail/reports or contact Zoe Neaderland at Zoe.Neaderland@vermont.gov or (802) 793-2778.

For more information on the Vermont Freight Plan Update, visit vtrans.vermont.gov/planning/freight or contact Dave Pelletier at Dave.Pelletier@vermont.gov or (802) 595-9675.