



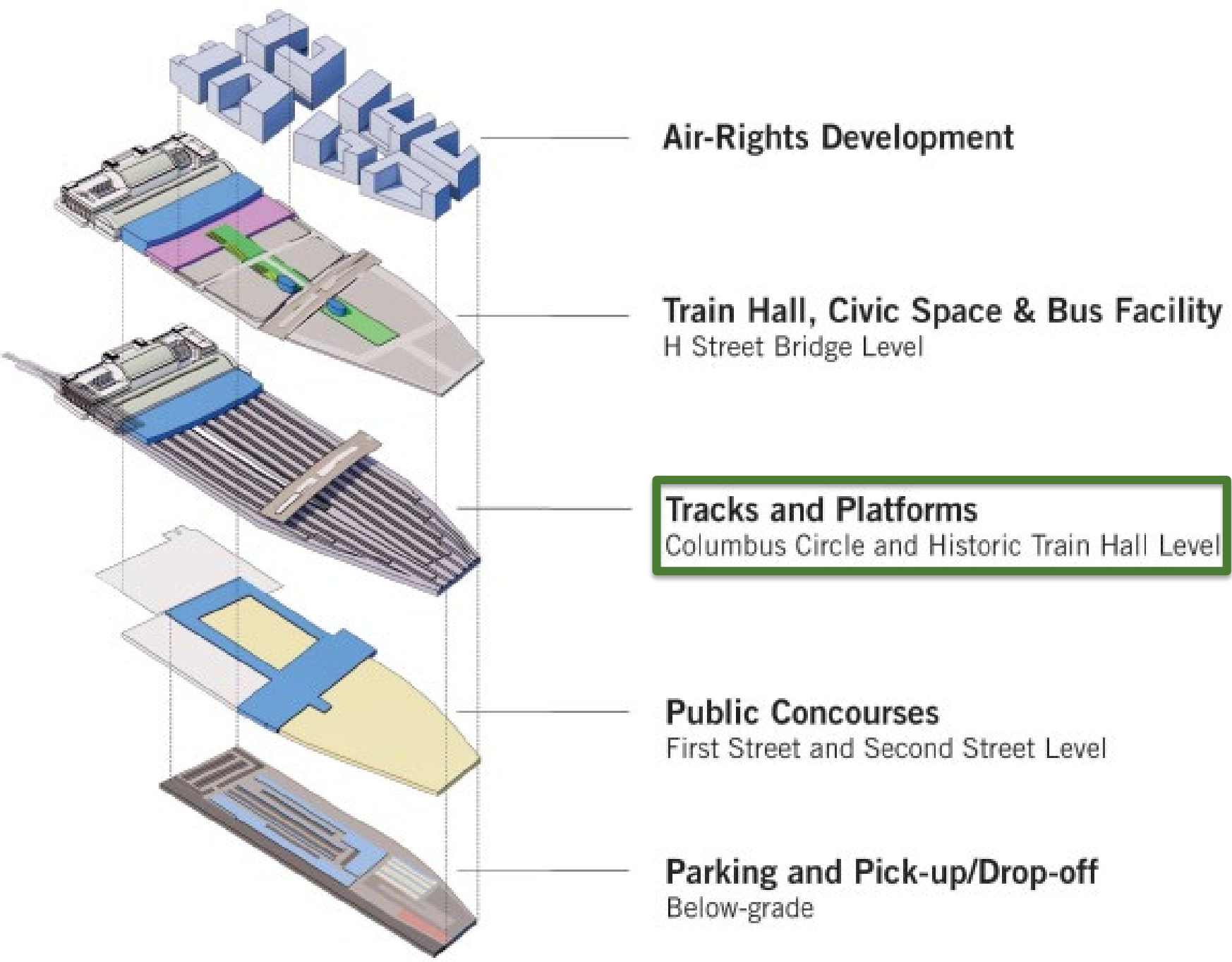
Washington Union Station Expansion: Terminal Infrastructure

Run-through Service Analysis

October 24, 2023

Station Expansion Project

Washington Union Station Expansion Project



- Ongoing environmental review process (NEPA EIS); FRA lead federal agency.
- Union Station Redevelopment Corporation (USRC) as Project Sponsor
- Considers long-term passenger and train capacity needs with projections to double capacity.
- Expansion alternatives build upon the 2012 Master Plan Vision.
- Includes the footprint of the historic station, terminal rail yard, parking garage and its uses (buses, parking, etc).
- Includes a comprehensive Terminal Infrastructure plan for the rail terminal with consideration for rebuild of H Street Bridge.

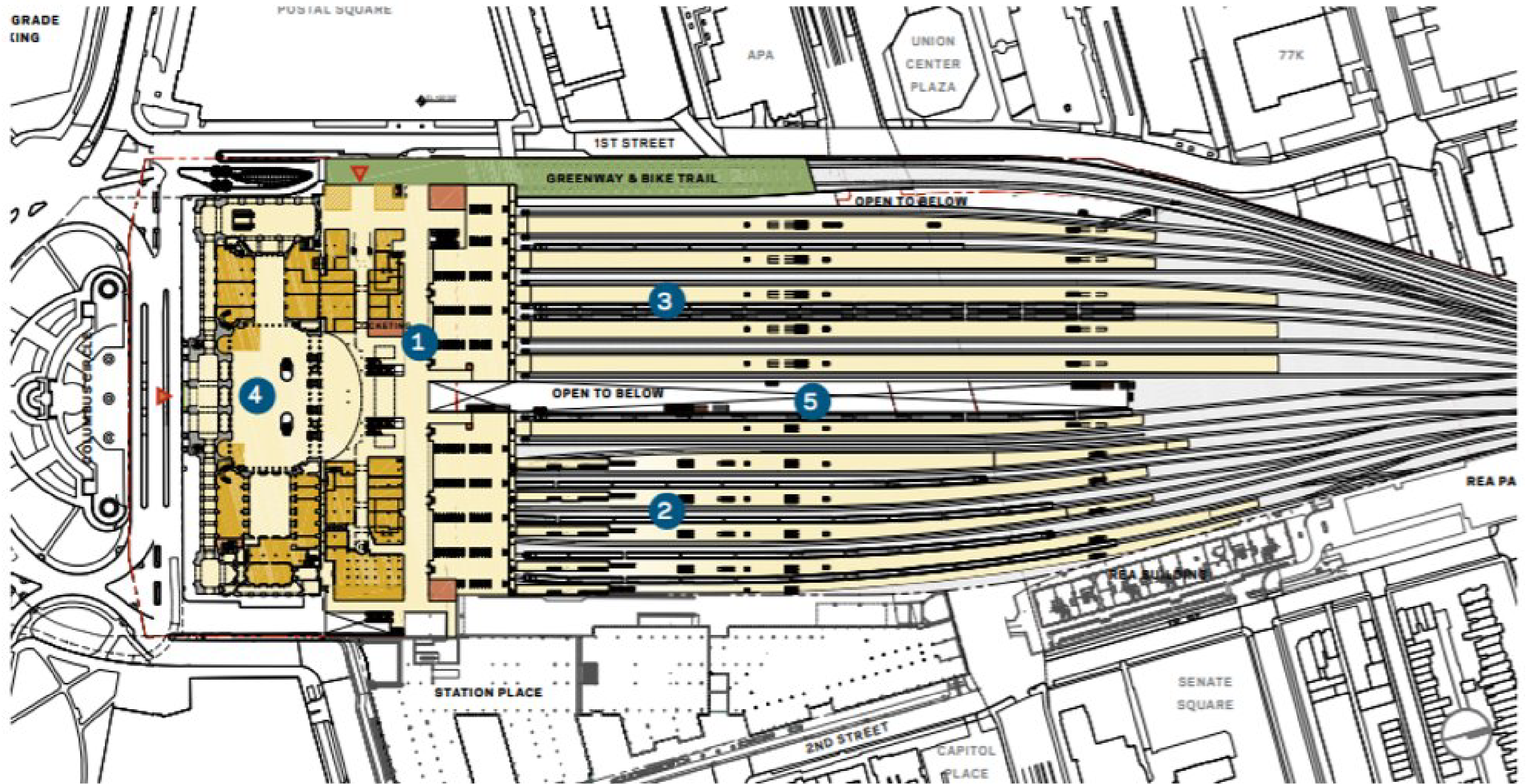
New Train Hall



Bus Terminal



Station Expansion/ TI Improvements

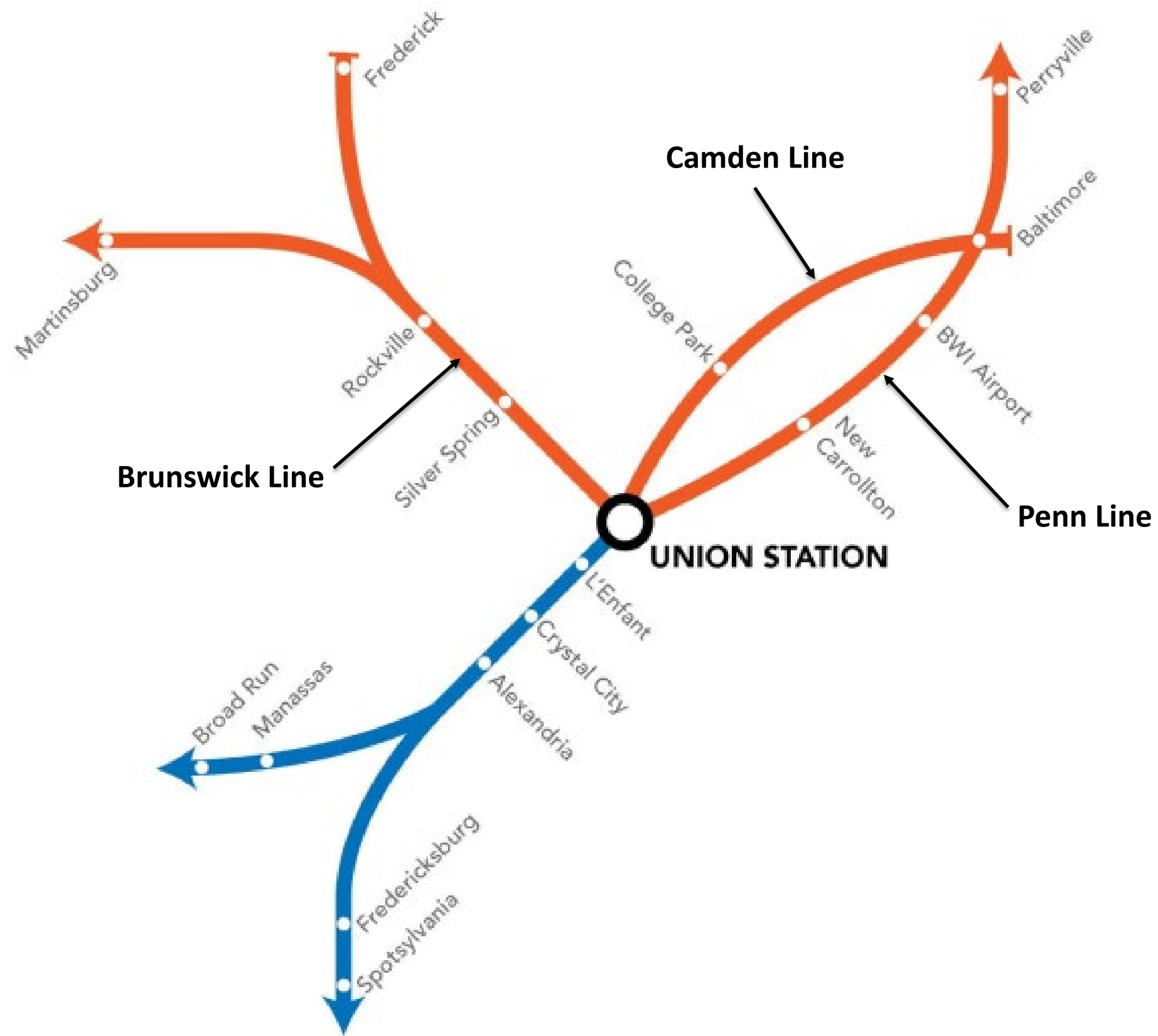


Terminal Infrastructure Run-through Analysis

Purpose of Study

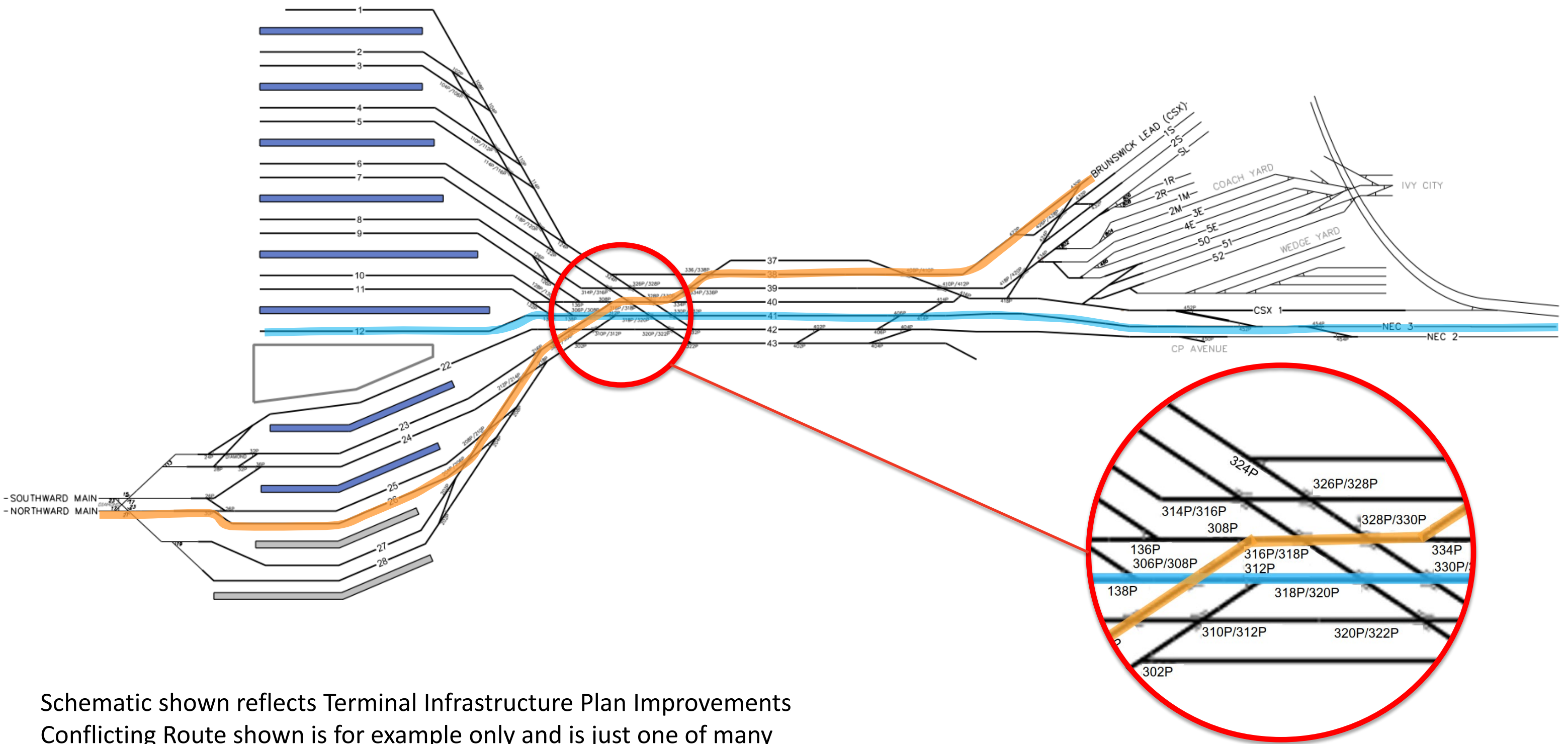
“...to review how elements of the existing Terminal Infrastructure plan can accommodate the necessary train movements for all MARC and VRE services to run through Washington...”

National Capital Region Commuter Rail Network



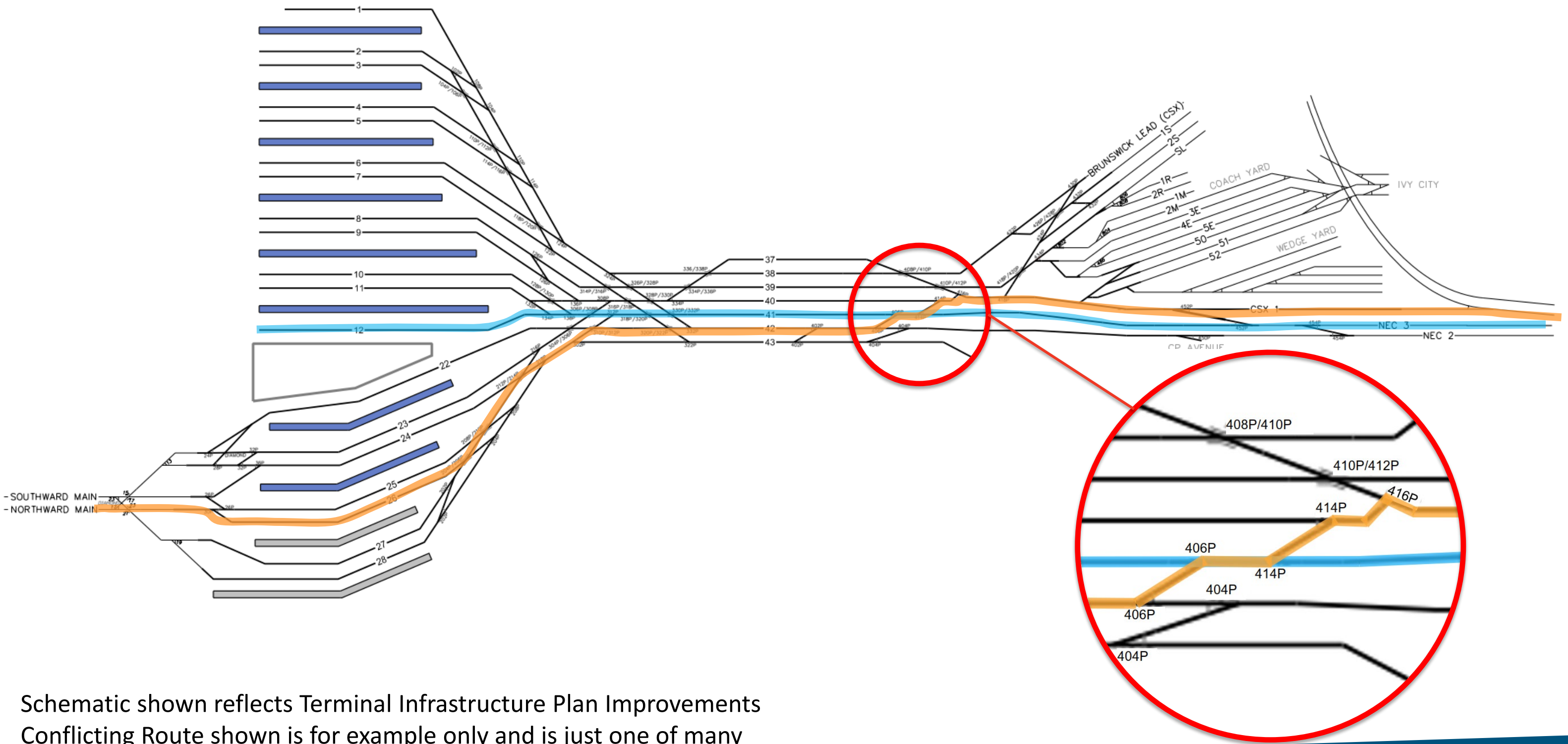
Source: "Market Assessment and Technical Considerations for VRE-MARC Run-through Service in the National Capital Region", Metropolitan Washington Council of Governments

VRE-MARC Through-Routing: Brunswick Line (Northbound and Southbound)



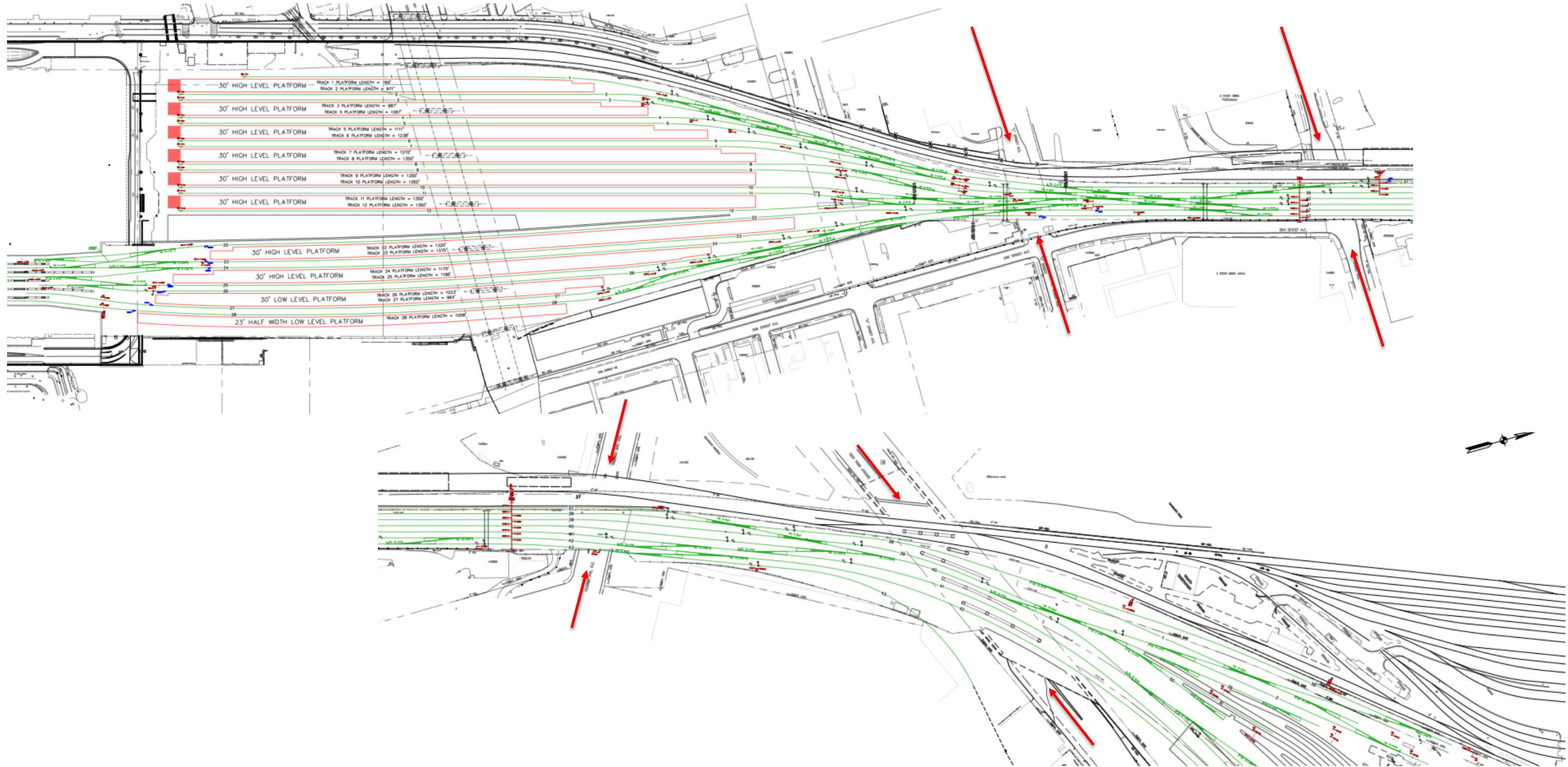
Schematic shown reflects Terminal Infrastructure Plan Improvements
Conflicting Route shown is for example only and is just one of many

VRE-MARC Through-Routing: Camden Line (Northbound and Southbound)



Schematic shown reflects Terminal Infrastructure Plan Improvements
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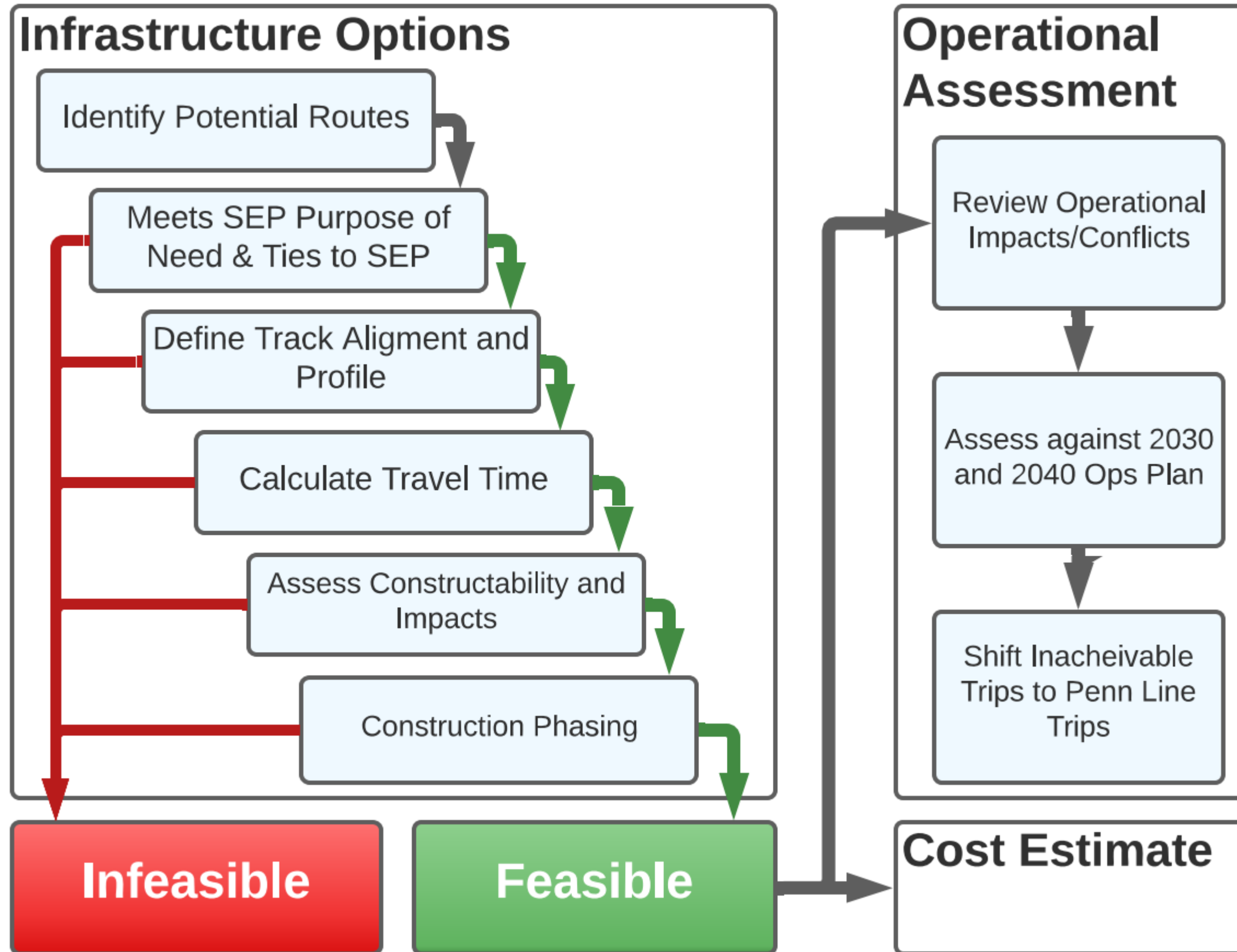
Future Baseline



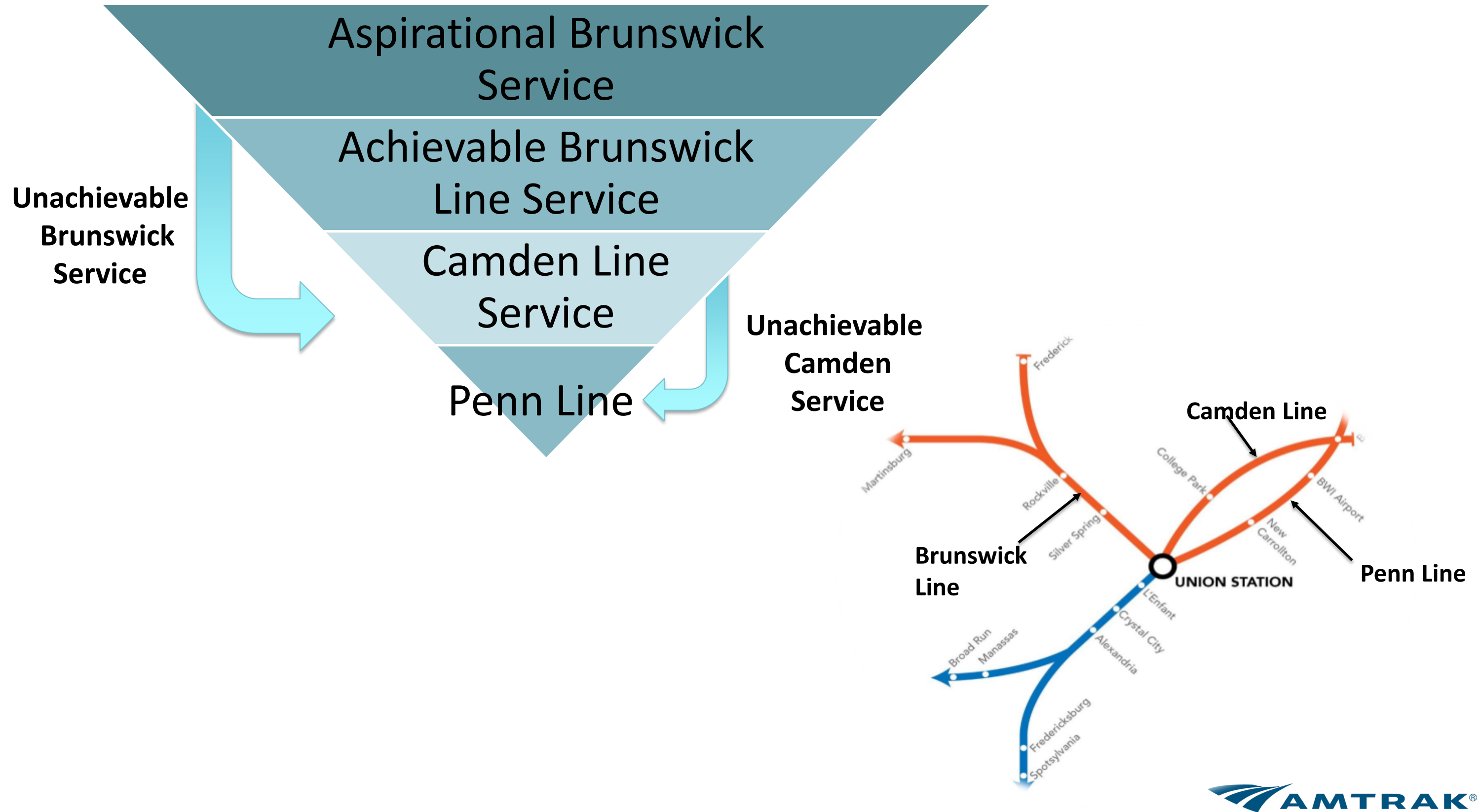
Review Goals & Methods

- Develop **aspirational** schedules to analyze the supplemental run-through service
- Assess run-through service on the TI planned infrastructure (Future Baseline)
- Attempt to identify additional infrastructure requirements to the TI plan to support run-through service
- Evaluate operations with proposed infrastructure
- Conclusions about **achievable** train service level

Analysis Methodology Flowchart



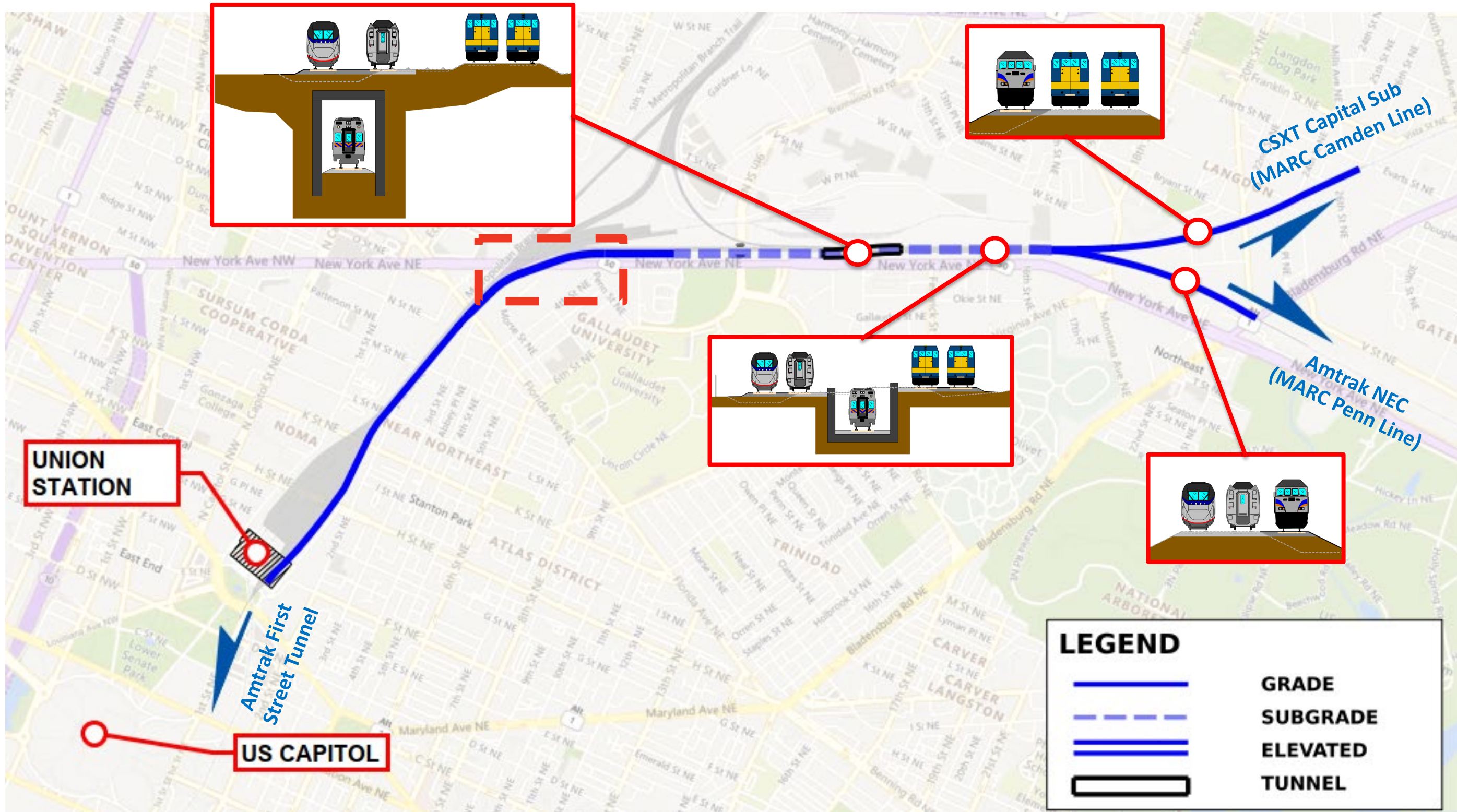
Prioritizing Service Assumptions



Options Previously Dismissed

Option	Criteria Not Met
New York Avenue Flyover	
Option 1	Geometry Infeasible
Option 2	Geometry Infeasible
Brunswick Connector	Geometry Infeasible
Deep Tunnel	Does not tie to SEP

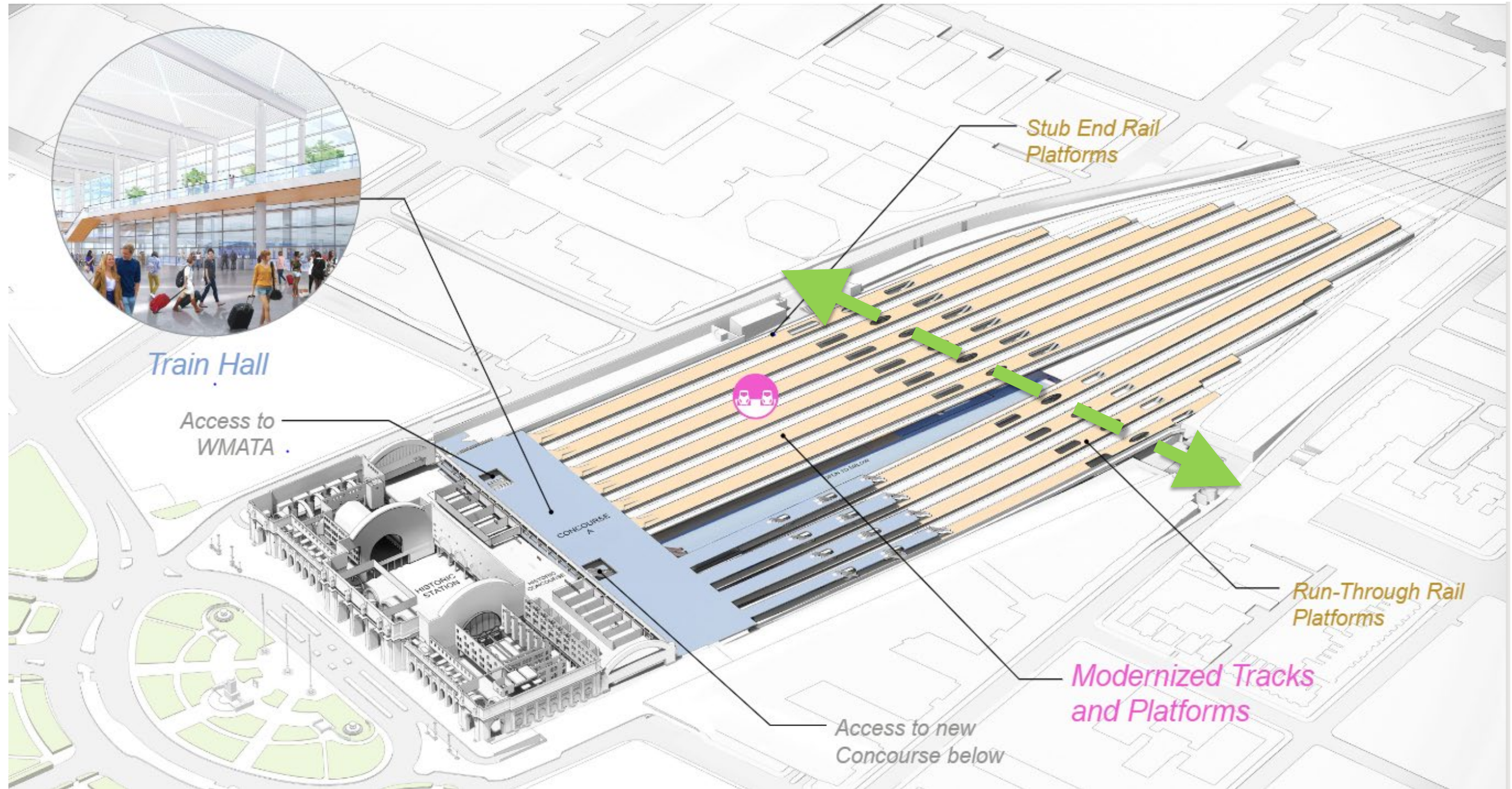
NEC Crossing: Duck Under



Performance of "NEC Crossing" Option

- Maintained Travel Time
- Minimizes conflicts between Northbound and Southbound trains at WUS
- Enables limited Camden Line Run-through Service
- No potential for MARC Brunswick Line Run-through Service
- Minimal benefit from the improvement relative to the cost of construction and associated land acquisitions.

Station Expansion Project: Platforms & New Connections



Central Concourse (Left) H Street Concourse (Right)



