



PAC Meeting #8 July 11, 2019



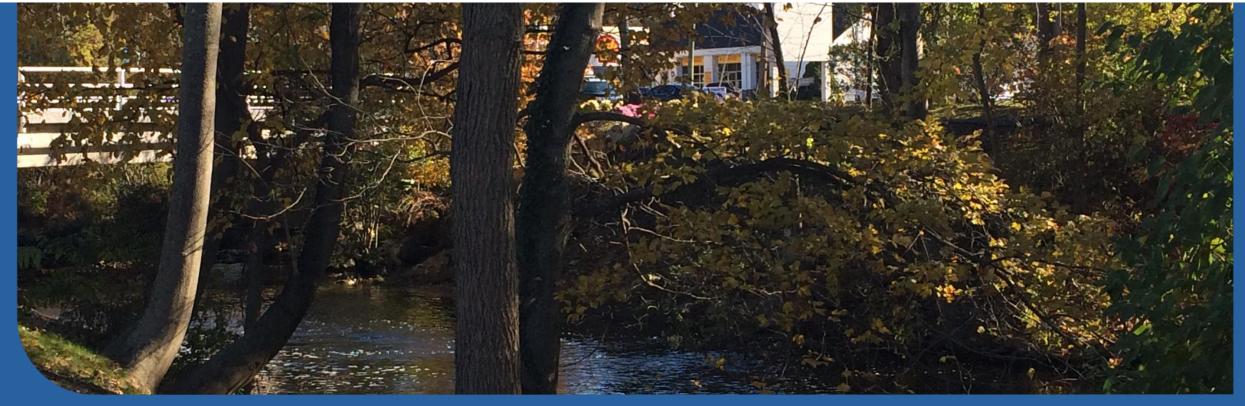
AGENDA

- 1. Introductions
- 2. Review of PAC #7
- 3. Level 2 Screening Exercise
- 4. Environmental Documentation Process
- 5. Next Steps
- 6. Schedule



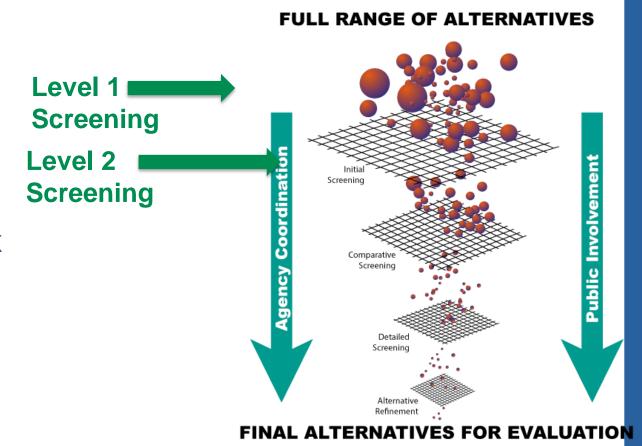


Review of PAC #7





- Reviewed Level 1 Screening (Purpose & Need Comparison)
- Began Level 2 Screening Review
 - Comparison to prior (2008) matrix
 - Reviewed evaluation criteria
 - Defined criteria for each topic





Complete Level 2 Screening Evaluation

Criteria	Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Compatible with Regional Initiatives	Traffic operations are free flow in nature optimizing traffic flow through corridor		Traffic operations are controlled by traffic signals creating some delay in traffic flow through corridor	
Construction Costs	Significantly lower construction costs relative to other alternatives		Significantly higher construction costs relative to other alternatives	
Maintenance Costs	Least number of bridges, bridge lengths and roadway miles to be maintained	Moderate number of bridges, bridge lengths and roadway miles to be maintained	Greatest number of bridges, bridge lengths and roadway miles to be maintained	
Integrating Project Roadways into Environment / Neighborhood Context	No new ramps/roadways in proximity to Merritt Parkway	Simplified and compact interchange footprint as compared to other alternatives	Complex and more extensive interchange footprint as compared to other alternatives	



Complete Level 2 Screening Evaluation

Criteria	Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Elevated Ramps	Design includes no ramps/roadways elevated higher than the Merritt Parkway			Design includes new ramps/roadways elevated higher than the Merritt Parkway
Potential Impacts to Norwalk River	No Norwalk River crossings required	Some anticipated Norwalk River crossings required	Most anticipated Norwalk River crossings required	
Proximity of New Ramps / Roadways to Neighborhoods	Least neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps/roadways toward neighborhood areas	Some neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps/roadways toward neighborhood areas	Most neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps/roadways toward neighborhood areas	
Construction Duration / Impacts to Public	Minimal anticipated construction duration/impacts compared to other alternatives based on roadway miles and new bridges required to construct	Moderate anticipated construction duration/impacts compared to other alternatives based on roadway miles and new bridges required to construct	Greatest anticipated construction duration/impacts compared to other alternatives based on roadway miles and new bridges required to construct	
Direct Archaeological Resources Impacts	No impacts	Potential Impacts	Likely impacts	

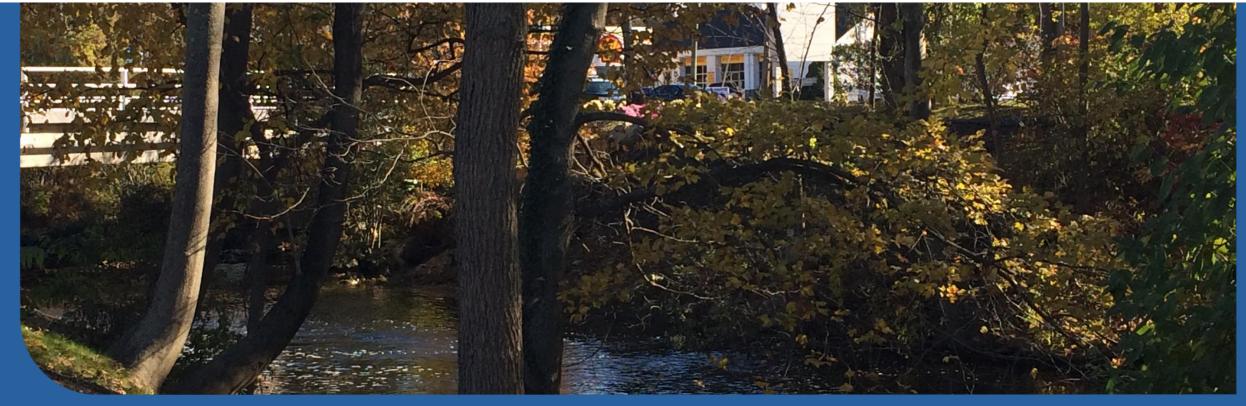








Level 2 Screening Exercise





Criterion A: Compatible with Regional Initiatives

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Traffic operations are free flow in nature optimizing traffic flow through corridor		Traffic operations are controlled by traffic signals creating some delay in traffic flow through corridor	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
A) Compatible with Regional Initiatives				



Criterion B: Construction Costs

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Significantly lower construction costs relative to other alternatives		Significantly higher construction costs relative to other alternatives	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
B) Construction Costs				



Supporting Data

Alternative	Road Miles	Bridge Length (ft)	Bridges (#)	Ramp Length (ft)	Norwalk River Crossings (#)
12A	5	2,600	19	17,700	5
20B	5.2	1,500	14	15,700	5
21D	5.6	1,700	14	17,300	5
26	4.5	800	7	8,800	3



Criterion C: Maintenance Costs

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Least number of bridges, bridge lengths and roadway miles to be maintained	Moderate number of bridges, bridge lengths and roadway miles to be maintained	Greatest number of bridges, bridge lengths and roadway miles to be maintained	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
C) Maintenance Costs				



Supporting Data

Alternative	Road Miles	Bridge Length (ft)	Bridges (#)	Ramp Length (ft)	Norwalk River Crossings (#)
12A	5	2,600	19	17,700	5
20B	5.2	1,500	14	15,700	5
21D	5.6	1,700	14	17,300	5
26	4.5	800	7	8,800	3



Criterion D: Integrating Project Roadways into Environment / Neighborhood Context

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
No new ramps / roadways in proximity to Merritt Parkway	Simplified and compact interchange footprint as compared to other alternatives	Complex and more extensive interchange footprint as compared to other alternatives	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
D) Integrating Project Roadways into Environment / Neighborhood Context				



Criterion E: Elevated Ramps

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Design includes no ramps / roadways elevated higher than the Merritt Parkway			Design includes new ramps / roadways elevated higher than the Merritt Parkway

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
E) Elevated Ramps				



Alternative 12A: Looking East Along Merritt Parkway





Criterion F: Potential Impacts to Norwalk River

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
No Norwalk River crossings required	Some anticipated Norwalk River crossings required	Most anticipated Norwalk River crossings required	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
F) Potential Impacts to Norwalk River				



Supporting Data

Alternative	Road Miles	Bridge Length (ft)	Bridges (#)	Ramp Length (ft)	Norwalk River Crossings (#)
12A	5	2,600	19	17,700	5
20B	5.2	1,500	14	15,700	5
21D	5.6	1,700	14	17,300	5
26	4.5	800	7	8,800	3



Criterion G: Proximity of New Ramps / Roadways to Neighborhoods

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
Least neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps / roadways toward neighborhood areas	Some neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps / roadways toward neighborhood areas	Most neighborhood quadrants with new ramps or roadways extending beyond existing footprint of ramps / roadways toward neighborhood areas	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
G) Proximity of New Ramps / Roadways to				
Neighborhoods				



Supporting Data

Neighborhood quadrants impacted	# of Neighborhoods	<u>Neighborhoods</u>
Alt 12A	2	Creeping Hemlock, SW Silvermine
Alt 20B	3	Creeping Hemlock, SW Silvermine, NW Silvermine
Alt 21D	2	Creeping Hemlock, SW Silvermine
Alt 26	1	Creeping Hemlock



Criterion H: Construction Duration / Impacts to Public

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal		Fatal Flaw		
Minimal anticipated construction duration / impacts compared to other alternatives based on roadway miles and new bridges required to construct	Moderate anticipated construction duration / impacts compared to other alternatives based on roadway miles and new bridges required to construct	Greatest anticipated construction duration / impacts compared to other alternatives based on roadway miles and new bridges required to construct				
Criterion		Alt 12A	Alt 20B	Alt 21D	Alt 26	
H) Construction Duration						



Supporting Data

Alternative	Road Miles	Bridge Length (ft)	Bridges (#)	Ramp Length (ft)	Norwalk River Crossings (#)
12A	5	2,600	19	17,700	5
20B	5.2	1,500	14	15,700	5
21D	5.6	1,700	14	17,300	5
26	4.5	800	7	8,800	3



Criterion I: Direct Archaeological Resources Impacts

Meets Goal	Moderately Meets Goal	Does Not Sufficiently Meet Goal	Fatal Flaw
No impacts	Potential impacts	Likely impacts	

Criterion	Alt 12A	Alt 20B	Alt 21D	Alt 26
I) Direct Archaeological Resources Impacts				



Anticipated Impacts / Effects to NRHP-Eligible Sites

	Alt 12A	Alt 20B	Alt 21D	Alt 26
Site 103-57	None	None	None	Direct
Site 103-58 / 103-60	None	None	None	Direct
Site 103-61 / 103-62	Possible	Possible	Possible	None



Level 2 Screening (PAC)

Criteria	Alt 12A	Alt 20B	Alt 21D	Alt 26
A) Compatible with Regional Initiatives				
B) Construction Costs				
C) Maintenance Costs				
D) Integrating Project Roadways into Environment / Neighborhood Context				
E) Elevated Ramps				
F) Potential Impacts to Norwalk River				
G) Proximity of New Ramps / Roadways to Neighborhoods				
H) Construction Duration / Impacts to Public				
I) Direct Archaeological Resources Impacts				





Environmental Documentation Process





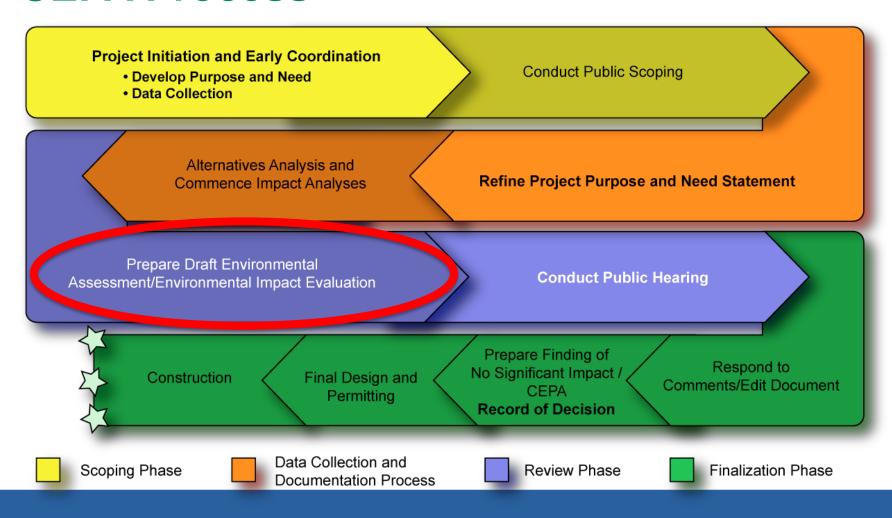
Where have we been

- Prepared Needs and Deficiencies Report
- Developed Purpose and Need Statement
- Completed Scoping Process
 - Public meeting
 - Agency Coordination
- Developed alternatives (28)
- Initiated Section 106 Consultation Process
- Completed Level 1 and Level 2 Screening





NEPA / CEPA Process





Alternative Analysis within NEPA/CEPA includes

- Reasonable range of alternatives from Level 2 screening and,
- No-Action/No-Build Alternative-

The No-Action/No-Build Alternative is used as a benchmark to measure the environmental impacts of build alternatives



Environmental Considerations- Natural Environment

- General Ecology and Endangered Species
- Navigable Waters
- Surface Waters
- Wetlands
- Flood Plains
- Groundwater
- Farmland Protection
- Air Quality





Environmental Considerations- Built Environment

- Land Use, Zoning, And Local and Regional Plan Of Conservation And Development
- Consistency with State Conservation And Development Plan
- Social and Economic Considerations
- Environmental Justice
- Traffic
- Bicycles And Pedestrians
- Right Of Way/Land Acquisitions
- Noise
- Community Services And Private Utilities





Environmental Considerations- Built Environment (cont.)

- Community Cohesion
- Cultural Resources
- Scenic Parkway
- Visual Impact Assessment (Via)
- Hazardous Materials
- Energy Analysis
- Construction Impacts





Environmental Documentation Examples- Limited Review Topics

Farmlands

- GIS mapping to identify farmland soils and active farmlands in the project area
- Overlay alternative disturbance footprints to assess for potential impacts
- No overlap = no impact. Resource topic dismissed

Coastal Zone Impacts

- GIS and CTDEEP mapping to identify coastal resources in the project area
- Overlay alternative disturbance footprints with resource mapping to assess potential impacts
- No overlap = no impact. Resource topic dismissed



Environmental Documentation Examples- Detailed Review and Documentation

Noise

- Identify Noise Sensitive Resources (Receptors) based on land use
- Identify noise sources in the project study area
- Take existing noise measurements at receptors
- Construct and run noise model (TNM) to predict future project noise levels
- Compare results to FHWA Noise Abatement Criteria (NAC) to identify impacts
- Assessment of Noise Abatement Measures reasonable and feasible
- Compare noise impacts for Build and No-Action/No-Build alternatives
- Document findings in the NEPA/CEPA document



Environmental Documentation Examples- Detailed Review and Documentation

Traffic

- Identify traffic study area and collect traffic data
- Develop future year traffic volumes
- Develop and run traffic simulation models
- Compare traffic operation results
- Document findings in the EA/EIE document



Decision making process to identify preferred alternative

Document Preparation

- For each alternative
 - Conduct impact assessment for resource category
 - Identify measures to avoid or minimize resource impacts
 - Identify feasible and reasonable opportunities to mitigate unavoidable impacts
- Compare benefits, adverse impacts, and mitigation for each alternative
- FHWA and CTDOT recommend a preferred alternative



Decision making process to identify preferred alternative

Draft Document Review

- CTDOT announces availability of Draft EA/EIE
- Public comment period and public hearing (minimum 45 days)

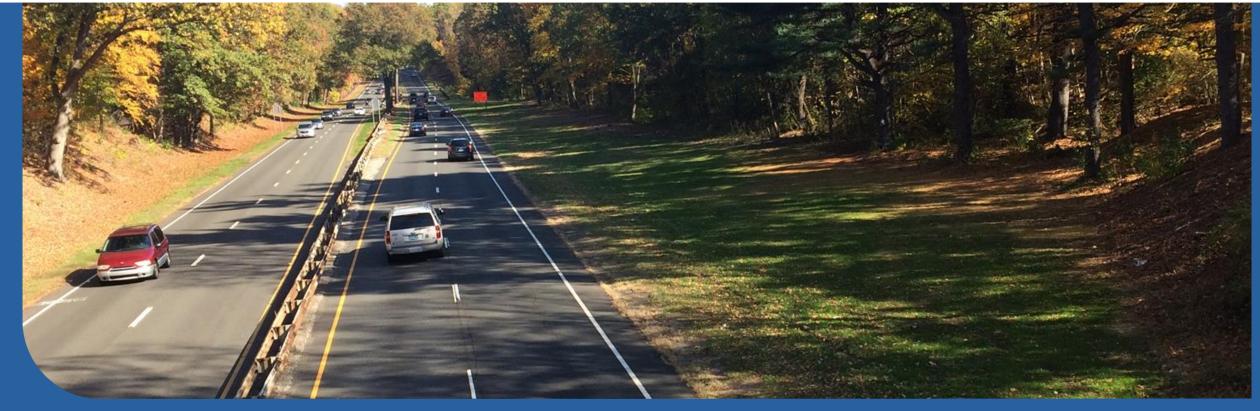
Document Completion

- Consider comments and, as needed, revise EA/EIE based on comments
- FHWA and CTDOT will select a Preferred Alternative and issue a Finding of No Significant Impact (FONSI) and a Record of Decision (ROD)





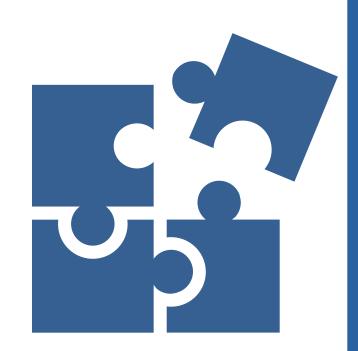
Next Steps





Next Steps

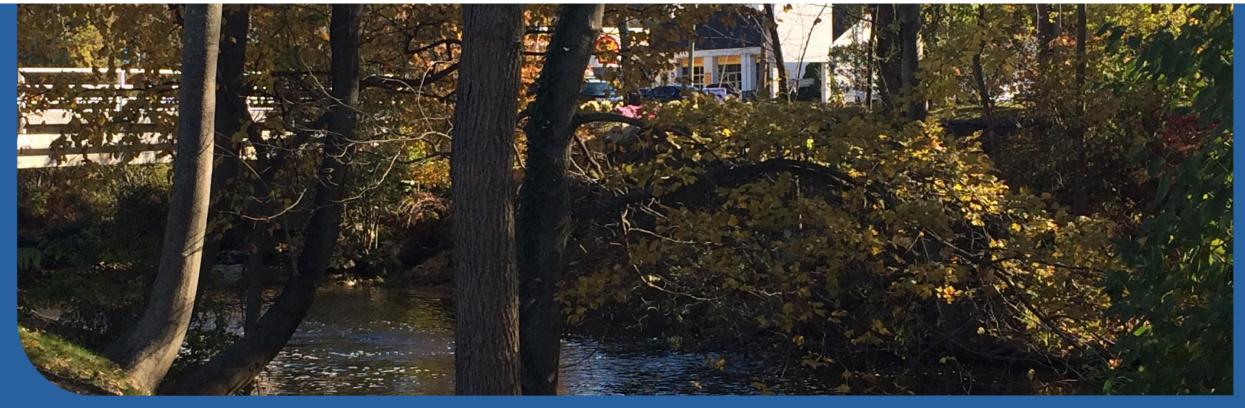
- Complete and distribute revised Phase I/II Cultural Resource Survey
- Conduct public informational meeting (Fall 2019)
- Conduct landscape subcommittee meeting (Fall 2019)
- Conduct environmental review concurrent with Section 106 Consultation process
- Submit Draft environmental document for review



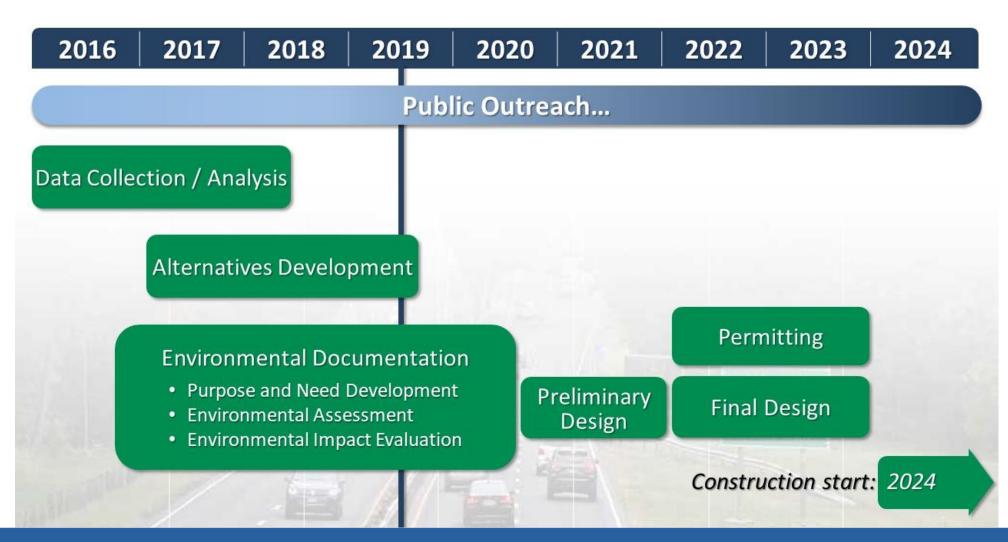




Schedule











THANK YOU!

Questions?

