

Utility Impact Summary

Alternative A-1

SUMMARY

This alternative includes construction of an elevated structure that would route two lanes of 250 east and west bound traffic over the intersections of US 250/20 and US 250 and High Street. The existing intersections and bridge will remain below the flyover structure. The alternative would also include intersection improvements at both US 250/20 and US 250/High Street to increase throughput and allow for smoother turning movements. This alternative should also explore providing access management/turn lanes near the intersection.

- The express lanes will be on an elevated structure above the median. Any aerial crossings over Route 250 within 40 vertical feet of the existing road will be in conflict
- Some areas will impact the utilities parallel to Route 250 in areas where there is not room in the median for piers to support the elevated structure
- In those locations, a support structure that spans the entire width of Route 250 with piers along the outside edge will be required (generally between High Street and Route 20)

ELECTRIC

- Electric facilities consist mainly of single and dual three-phase circuits throughout the length of the project on both sides of US 250
- All poles at the intersections of US 250 and St. Clair Avenue, and US 250 and Landonia Circle are not in conflict because the improvements do not call for widening outside of the existing roadway
- All poles at the US 250 and East High Street/River Road, US 250 and Free Bridge Lane/New House Drive, US 250 and Stony Point Road/Riverbend Drive, and US 250 and People Place intersections will be in conflict with the project due to their proximity to the road and the proposed project
- There is evidence of underground electric facilities throughout the length of the project
- Utilities will be in conflict with the proposed bridge pier foundations
- Transmissions lines also exist at the intersection of US 250 and Stoney Point Road crossing US 250 running north and south
- The transmissions line will be impacted due to clearances over the proposed elevated structure
- Clearances from overhead bridge structures will cause the conflicts
- Assumed footages and units are reflected in the PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project on both sides of US 250
- Clearances from overhead bridge structures will cause the conflicts
- Major facilities exist underground throughout the entire project along both sides of US 250
- Other fiber companies exist within the project limits but could not be confirmed
- Facilities will be in conflict due to the proposed bridge pier foundations
- All facilities at the intersections of US 250 and St. Clair, US 250 and Landonia Circle, US 250 and East High Street/River Road, US 250 and Free Bridge Lane/New House Drive, US 250 and Stoney Point Road/Riverbend Drive, and US 250 and People Place are assumed to be in conflict with the project due to their proximity to US 250 and proposed bridge pier foundations
- Assumed footages and units are reflected in the PCES

WATER

- Evidence of existing water lines exist throughout the entirety of the project along the north edge of US 250 (from Landonia Circle east to Town and Country Lane)
- Water lines will be impacted and in conflict with proposed project due to their proximity to the proposed bridge pier foundations
- Assumed footages and units are reflected in the PCES

SEWER

- Evidence of existing sewer line exists running along the west edge of the Rivanna River and will be impacted due
 to its proximity to the proposed bridge pier foundations
- Assumed footages and units are reflected in the PCES

GAS

- Evidence of existing gas lines exist throughout the entirety of the project along the north edge of US 250 (from Landonia Circle east to Town and Country Lane)
- Gas lines will be impacted and in conflict with proposed project due to their proximity to the proposed bridge pier foundations
- Assumed footages and units are reflected in the PCES

PETROLEUM

- No evidence of petroleum lines that will be impacted along the extents of the proposed project limits
- Assumed no conflict



[ALTERNATIVE "A-1"] Intersection of US 250 and River Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted (viewing East)



[ALTERNATIVE "A-1"] Intersection of East High Street and US 250. Dual 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the western edge of East High Street to be impacted (viewing South West)



[ALTERNATIVE "A-1"] Intersection of East High Street and US 250. 3 Phase Electric Poles with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted (viewing North East)



[ALTERNATIVE "A-1"] Underneath the existing US 250 bridge at the intersection of East High Street and US 250. Sanitary Sewer to be impacted.



[ALTERNATIVE "A-1"] Intersection of US 250 and St. Clair Avenue. 3 Phase Electric Pole with telecommunications attachment and crossings along the northern edge of US 250. Not to be impacted (viewing South East)



[ALTERNATIVE "A-1"] Intersection of US 250 and Landonia Circle. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250. Not to be impacted (viewing South East)



[ALTERNATIVE "A-1"] Intersection of Free Bridge Lane and US 250. Telecommunications cott markers locating existing buried handhole and/or splicing location of underground telecommunication. Facilities to be impacted (viewing West)



[ALTERNATIVE "A-1"] Intersection of US 250 and Free Bridge Lane. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250. Aerial and underground utilities to be impacted (viewing North West)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted. (viewing North East)



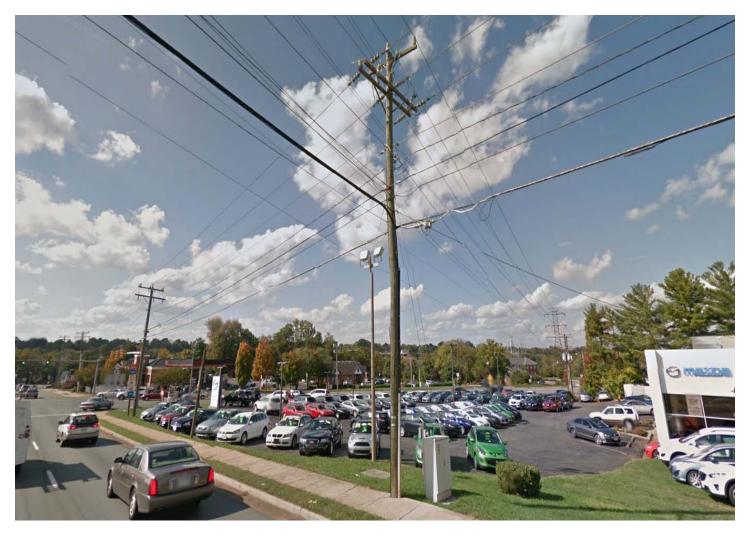
[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing South)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing North East)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing East)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Paint marking indicate and existing water line running underneath the existing sidewalk along the northern edge of US 250. Telecommunications handhole at the base of existing pole. Underground utilities and telecommunications facilities to be impacted (viewing North West)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Electric Transmission line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing West)



[ALTERNATIVE "A-1"] Just east of the intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along US 250 to be impacted. Electric Transmission Tower and line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing East)



[ALTERNATIVE "A-1"] Intersection of US 250 and Stoney Point Road. Electric Transmission Towers and line crossing US 250 to be impacted. Underground utilities and telecommunications facilities to be impacted (viewing South East)



[ALTERNATIVE "A-1"] Exxon near the intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Paint markings indicate existing electric (in red) telecommunications (in orange) and water (in blue) existing within the project limits. Underground utilities and telecommunications facilities to be impacted (viewing West)



Utility Impact Summary

Alternative A-2

SUMMARY

This alternative includes the construction of a new road that would serve as a connector between Landonia Circle and River Road beginning at the intersection of Belleview Avenue. The existing Belleview Avenue and Landonia Circle would tie-in to the proposed road.

ELECTRIC

- Aerial electric facilities consist of single, three phase and dual three-phase circuits throughout the length of the project along US 250, Landonia Circle, River Road and Belleview Avenue
- There is evidence of underground electric facilities throughout the length of the project
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project on the north side of US 250, at the intersection of Belleview Avenue and River Road, and at the intersection Landonia Circle and US 250
- Major facilities exist underground throughout the entire project on the north side of US 250
- Other fiber companies exist within the project limits but could not be confirmed
- Facilities will be in conflict due to the shift in road alignment as well as proposed tie-in locations
- Assumed footages and units are reflected in PCES

WATER

- Evidence of existing water lines exist throughout the entirety of the project along the north edge of US 250, at the intersection of Belleview Avenue and River Road, and at the intersection Landonia Circle and US 250
- Water lines will be impacted and in conflict with proposed project due to the shift in road alignment as well as proposed tie-in locations
- Assumed footages and units are reflected in PCES

SEWER

- Evidence of existing sewer line exists running along the north edge of US 250, at the intersection of Belleview Avenue and River Road, and at the intersection Landonia Circle and US 250
- Sewer lines will be impacted and in conflict with proposed project due to the shift in road alignment as well as proposed tie-in locations
- Assumed footages and units are reflected in PCES

GAS

- Evidence of existing gas lines exist throughout the entirety of the project along the north edge of US 250 (from Landonia Circle east to Town and Country Lane)
- Gas lines will be impacted and in conflict with proposed project due to their proximity to the proposed bridge pier foundations
- Assumed footages and units are reflected in PCES

PETROLEUM

- No evidence of petroleum lines that will be impacted along the extents of the proposed project limits
- Assumed no conflict



[ALTERNATIVE "A-2"] Near the intersection of River Road and Belleview Avenue. Two Dual Three Phase Electric poles with multiple telecommunications attachments and crossings. Also evidence of existing underground utilities in the area. Fire Hydrant and Water valve indicate that there is an existing water line near the intersection (Viewing West)



[ALTERNATIVE "A-2"] Near the intersection of River Road and Belleview Avenue. Evidence of existing underground utilities in the area. Fire Hydrant and Water valve indicate that there is an existing water line near the intersection. Paint markings indicate an existing gas line in the project limits. Underground utilities to be impacted (Viewing West)



[ALTERNATIVE "A-2"] Along Belleview Avenue just south of the intersection of Belleview Avenue and Coleman Street. Evidence of existing underground utilities in the area. Paint markings indicate an existing gas line in the project limits. Underground utilities to be impacted (Viewing South East)



[ALTERNATIVE "A-2"] Near the intersection of Landonia Circle and Coleman Street. Evidence of existing underground utilities in the area. Paint markings indicate an existing gas, water, and sewer line in the project limits. Underground utilities to be impacted (Viewing East)



[ALTERNATIVE "A-2"] East of the intersection of Landonia Circle and Coleman Street and North of US 250 along Landonia Circle. Three Phase Electric Pole with multiple attachments. Existing pole and underground utilities to be impacted (Viewing South)



[ALTERNATIVE "A-2"] North of US 250 along Landonia Circle. Three Phase Electric Pole with multiple attachments. Paint markings indicate an existing sewer line (in green) running down Landonia Circle and into US 250. Existing pole and underground utilities to be impacted (Viewing North East)



[ALTERNATIVE "A-2"] Near the intersection of US 250 and Landonia Circle. Three Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Paint markings indicate an existing sewer line (in green) running down Landonia Circle and into US 250. Underground utilities to be impacted (viewing East)



[ALTERNATIVE "A-2"] Along US 250 just west of the intersection of River Road and US 250. Three Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted.



Utility Impact Summary

Alternative B

SUMMARY

This alternative includes a new park and ride lot in the vicinity of the US 250/22 (Shadwell) intersection and limited stop transit service from the lot to Martha Jefferson Hospital, Downtown Charlottesville and UVA Grounds. This alternative will also include paving the existing bike/pedestrian trail on the Albemarle County side of the Rivanna River (Old Mills Trail), construct of a bridge crossing in the vicinity of Riverside Avenue (Riverview Park), bike/pedestrian trail access from the park and ride lot to the Old Mills Trail system, and improvements to the Old Mills Trail.

- Proposal is to use the existing rail lines
- Majority of impact will be at the location of the proposed commuter lot and Riverside Park tie-in location

ELECTRIC

- Evidence of an existing single phase electric pole along the south edge of US 250 near the existing Luck Stone
 entrance that will be impacted due to the proposed Park and Ride Lot entrance widening
- Transmissions lines also exist along the east edge of the Rivanna River
- There are two potential crossing of the transmissions line along the proposed project, however evidence shows that there will be adequate clearance between proposed project and the transmissions lines
- No evidence of any other electric utilities (aerial and/or underground) that will be impacted along extents of the proposed project limits
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- Evidence of existing aerial facilities on a single phase electric pole along the south edge of US 250 near the
 existing Luck Stone entrance that will be impacted due to the proposed Park and Ride Lot entrance widening
- No evidence of any other telecommunication facilities (aerial and/or underground) that will be impacted along the extents of the proposed project limits
- Assumed footages and units are reflected in PCES

WATER

- No evidence of water lines that will be impacted along the extents of the proposed project limits
- Assumed no conflict

SEWER

- Evidence of an existing sewer line that running along the west edge of the Rivanna River
- Existing sewer line will be impacted due to the proposed tie-in location at Riverside Park
- No evidence of any other sewer utilities that will be impacted along the extents of the proposed project limits
- Assumed footages and units are reflected in PCES

GAS

- No evidence of gas lines that will be impacted along the extents of the proposed project limits
- Assumed no conflict

PETROLEUM

- No evidence of petroleum lines that will be impacted along the extents of the proposed project limits
- Assumed no conflict



[ALTERNATIVE "B"] Just south of the intersection of Water Street E and 4th Street SE. Existing rail lines running parallel along Water Street E. 4th Street SE underpass crossing perpendicular to Water Street E and existing rail lines (viewing South East)



[ALTERNATIVE "B"] Just east of the intersection of Water Street E and 5th Street SE. Existing rail lines running parallel along Water Street E. 9th Street SE Bridge crossing running perpendicular to Water Street E and existing rail lines (viewing South)



[ALTERNATIVE "B"] Just east of the 9th Street SE Bridge crossing and Water Street E. Existing rail lines running parallel along Water Street E (viewing South)



[ALTERNATIVE "B"] At the intersection/bend of Water Street and 10th Street NE. Existing rail lines running parallel along Water Street E. 10th Street SE running perpendicular to Water Street E and existing rail lines (viewing South East)



[ALTERNATIVE "B"] Intersection of Carlton Road and Meade Avenue. Existing rail lines running perpendicular to Meade Avenue (viewing South East)



[ALTERNATIVE "B"] Intersection of Carlton Road and Meade Avenue. Existing rail lines running perpendicular to Meade Avenue (viewing South East)



[ALTERNATIVE "B"] 61 Franklin Street (viewing North)



[ALTERNATIVE "B"] At the intersection of Marchant Street and Broadway Street. Existing rail line running parallel to East Market Street (viewing South)



[ALTERNATIVE "B"] At the intersection of Marchant Street and Broadway Street. Existing rail line running parallel to East Market Street (viewing East)



[ALTERNATIVE "B"] At the intersection of Marchant Street and Broadway Street. Existing rail line running parallel to East Market Street (viewing North)



[ALTERNATIVE "B"] 1915 East Market Street. Existing rail line running parallel to East Market Street (viewing South East)



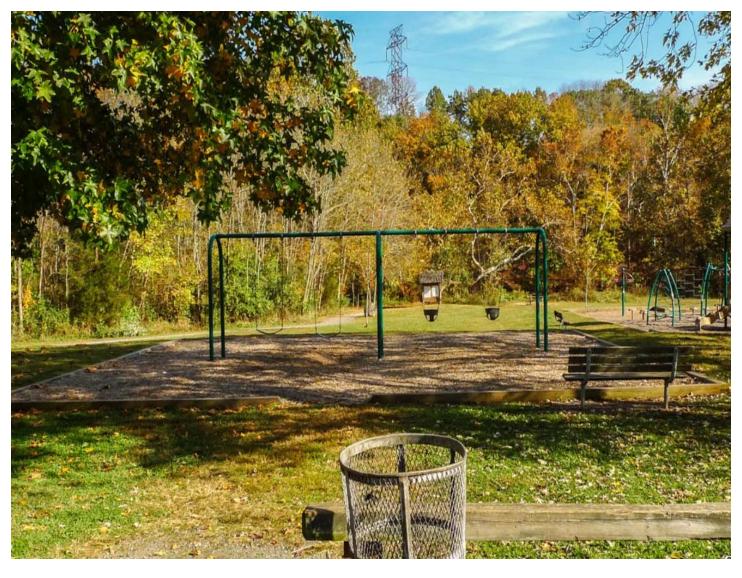
[ALTERNATIVE "B"] 1915 East Market Street. Existing rail line running parallel to East Market Street (viewing South East)



[ALTERNATIVE "B"] Intersection of Chesapeake Street and Riverside Avenue (viewing South East)



[ALTERNATIVE "B"] Intersection of Chesapeake Street and Riverside Avenue. Proposed tie-in location (Aerial viewing South/downstream)



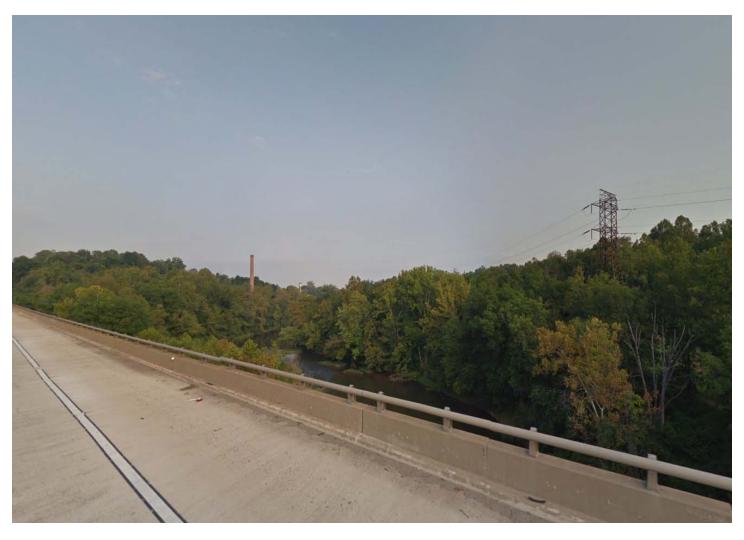
[ALTERNATIVE "B"] Riverview Park. Proposed tie-in location. Transmissions lines along the east edge of the Rivanna River (viewing East)



[ALTERNATIVE "B"] Railroad Bridge crossing Moore'e Creek/Rivanna River at Woolen Mills just south of Riverview Park (viewing North West)



[ALTERNATIVE "B"] Railroad Bridge crossing Moore'e Creek/Rivanna River at Woolen Mills just south of Riverview Park (viewing North West)



[ALTERNATIVE "B"] Interstate 64 westbound crossing the Rivanna River. Transmission lines to the right. Woolen Mills to the left (viewing North West)



[ALTERNATIVE "B"] 500 Peter Jefferson Parkway (Martha Jefferson Hospital) Transmission lines to the left. Proposed tie-in location (viewing South)



[ALTERNATIVE "B"] Existing Luck Stone rock quarry (Aerial viewing South East/downstream)



[ALTERNATIVE "B"] Existing Luck Stone rock quarry entrance along US 250. Single Phase Electric Pole with multiple telecommunications attachment will be impacted due to the proposed Park and Ride entrance widening (viewing South East)



Utility Impact Summary

Alternative D-1

SUMMARY

This alternative includes construction of a new road linking Route 20 with Rio Road. This new road would have two vehicle travel lanes with two bike shoulder lanes (similar to the John Warner Parkway). The intersection with route 20 should be aligned with Albemarle County's extension of Olympia Drive as laid out in the Pantops Master Plan. This alternative also includes improvements to Pen Park Lane, and widening Rio Road to four lanes from Pen Park Lane to the John Warner Parkway intersection.

ELECTRIC

- Electric facilities consist mainly of single and dual three-phase circuits throughout the length of the project
- All poles from the intersection of Rio Road and John Warner Parkway continuing along Rio Road to Towne Lane, all poles along the western most edge of Pen Park between Pen Park (Charlottesville Catholic School/Meadowcreek Golf Course) and Pen Park Lane, all poles along the southern most edge of Darden Towe Park (including those along Free Bridge Lane until Winding River Lane, and those along Stony Point Road near the proposed intersection of Olympia Drive Extension and Stony Point (approximately 700 ft. north of Winding River Lane) are assumed to be in conflict with the project due to their proximity to the road and proposed project
- There is no evidence of underground electric facilities throughout the length of the project
- Transmissions lines also existing crossing Darden Towe Park and continues to the intersection of US 250 and Stoney Point Road. The existing transmissions lines are in close proximity to the proposed project area and will be impacted
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project
- Major facilities exist underground throughout the entire project exist
- Other fiber companies exist within the project limits but could not be confirmed
- All facilities from the intersection of Rio Road and John Warner Parkway continuing along Rio Road to Towne Lane, all poles along the western most edge of Pen Park between Pen Park (Charlottesville Catholic School/Meadowcreek Golf Course) and Pen Park Lane, all poles along the southern most edge of Darden Towe Park (including those along Free Bridge Lane until Winding River Lane, and those along Stony Point Road near the proposed intersection of Olympia Drive Extension and Stony Point (approximately 700 ft. north of Winding River Lane) are assumed to be in conflict with the project due to their proximity to the road and proposed project
- Assumed footages and units are reflected in PCES

WATER

- Evidence of existing water lines exist throughout
- GIS data indicates an existing water lines along Rio Road from John Warner Parkway south to Pen Park Lane, at tie-in location along Stony Point road and Olympia Drive Extension will be impacted
- Water lines will be impacted and are in conflict with proposed project due to their proximity to the proposed project
- Assumed footages and units are reflected in PCES

SEWER

- Evidence of existing sewer lines exist in few locations along the project
- GIS data indicates an existing sewer between the end of Pen Park Lane and the Rivanna River, running parallel to the river. Sewer lines will be impacted and are in conflict with proposed project due to a proposed crossing near the creek before the Rivanna River
- Assumed footages and units are reflected in PCES

GAS

- Evidence of an existing gas line that runs down Pen Park Lane and in a few additional locations along the project
- Existing gas is to be impacted due to proposed alignment shift
- Assumed footages and units are reflected in PCES

PETROLEUM

- No evidence of a petroleum line that will be impacted along the extents of the project
- Assumed no conflict



[ALTERNATIVE "D-1"] Intersection at Rio Road and John Warner Parkway. Three Phase Electric Pole with single telecommunication attachment along south western side of Rio Road (viewing South)



[ALTERNATIVE "D-1"] On Rio Road just south of Dunlora Drive. 8" Water Markings on the western edge of Rio Road and Singe Phase Electric Pole crossing Rio Road to be impacted (viewing South)



[ALTERNATIVE "D-1"] On Rio Road just south of Dunlora Drive. Telecommunications Pedestal and Pole with multiple attachments along the western edge of Rio Road to be impacted (viewing South)



[ALTERNATIVE "D-1"] On Rio Road between Dunlora Drive and Pen Park Road. Telecommunications Pole with multiple attachments along the western edge of Rio Road to be impacted (viewing West)



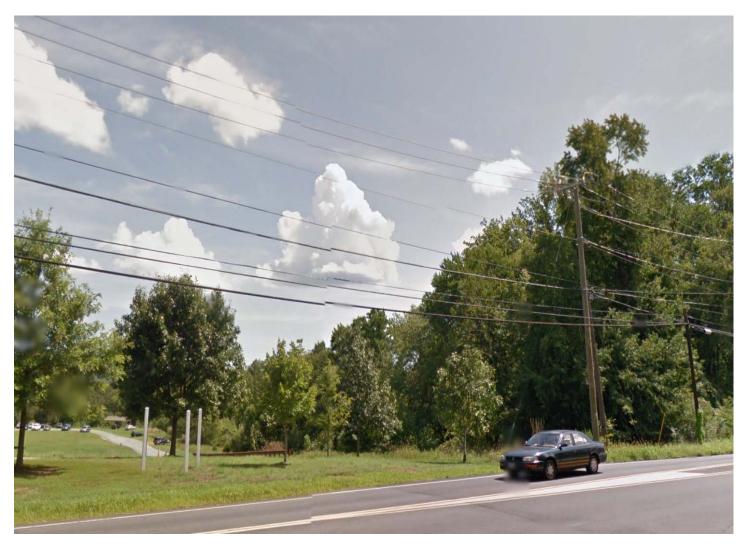
[ALTERNATIVE "D-1"] Intersection of Rio Road and Pen Park Road. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossings to be impacted (viewing South)



[ALTERNATIVE "D-1"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossing and/or service drops to be impacted (viewing South)



[ALTERNATIVE "D-1"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossing and/or service drops to be impacted (viewing South)



[ALTERNATIVE "D-1"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments and a telecommunications pole line along the eastern edge of Rio Road with crossings and/or service drops (viewing East)



[ALTERNATIVE "D-1"] Rio Road just north of the intersection of Rio Road and Pen Park Lane. 3 Phase Electric Pole with multiple Telecommunications attachments and a telecommunications pole line along the eastern edge of Rio Road (viewing North)

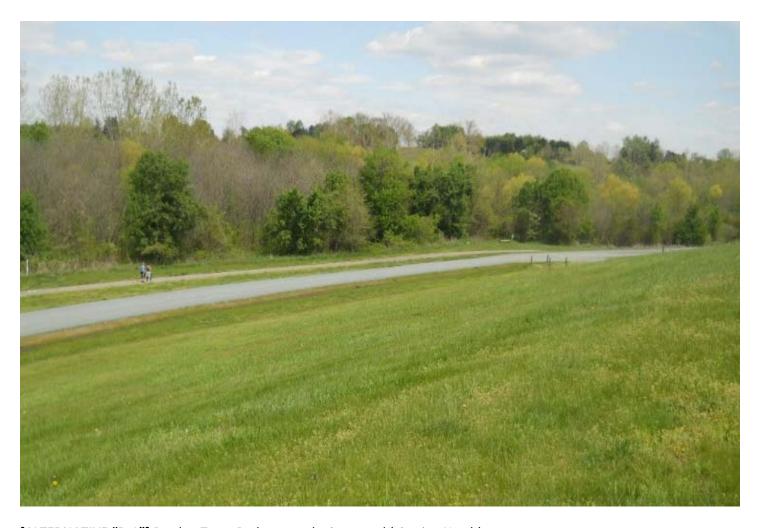




[ALTERNATIVE "D-1"] End of Pen Park Lane at existing construction gate. This area to be impacted (viewing South)



[ALTERNATIVE "D-1"] End of Pen Park Lane at existing construction gate. The area to be impacted (viewing North)



[ALTERNATIVE "D-1"] Darden Towe Park area to be impacted (viewing North)



[ALTERNATIVE "D-1"] Darden Towe Park area to be impacted (viewing West)



[ALTERNATIVE "D-1"] Darden Towe Park area to be impacted (viewing South West)



[ALTERNATIVE "D-1"] Darden Towe Park area to be impacted (viewing South)



[ALTERNATIVE "D-1"] Pond at Darden Towe Park to be impacted (viewing North)



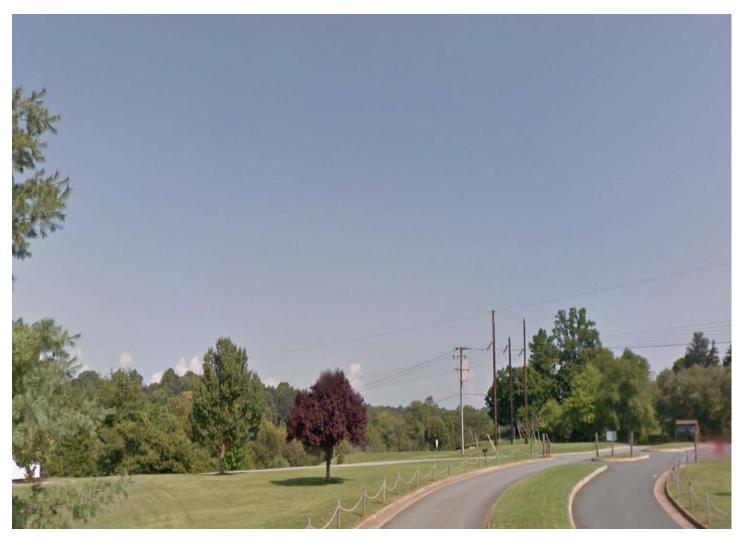
[ALTERNATIVE "D-1"] Pond and baseball fields at Darden Towe Park (viewing North East)



[ALTERNATIVE "D-1"] Aerial image of Transmission Power Line at Darden Towe Park entrance to be impacted.



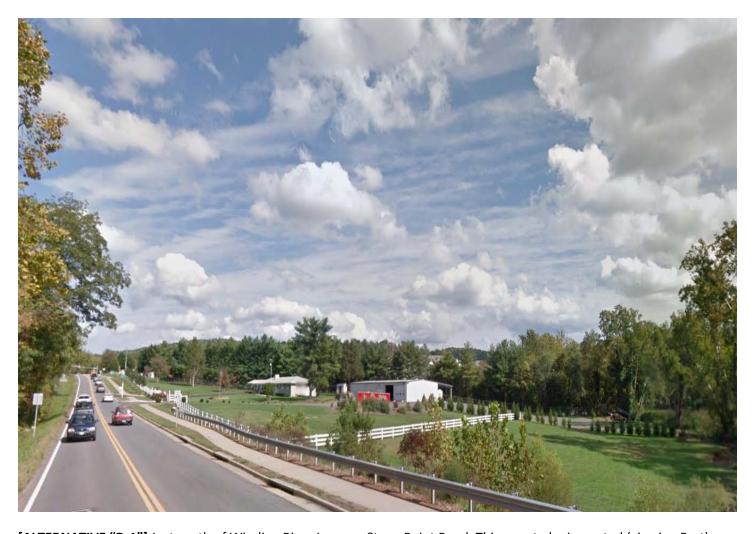
[ALTERNATIVE "D-1"] Transmission Line crossing near Darden Towe Park entrance looking toward Free Bridge Lane. This area to be impacted (viewing South West)



[ALTERNATIVE "D-1"] Transmission Line crossing near Darden Towe Park entrance. This area to be impacted (viewing North)



ALTERNATIVE "D-1"] Transmission Line crossing near Darden Towe Park entrance looking toward Free Bridge Lane. This area to be impacted (viewing South West)



[ALTERNATIVE "D-1"] Just north of Winding River Lane on Stony Point Road. This area to be impacted (viewing East)



[ALTERNATIVE "D-1"] Intersection of Olympia Drive and Town and Country Lane. This area to be impacted (viewing North West)



[ALTERNATIVE "D-1"] Intersection of Olympia Drive and Town and Country Lane. This area to be the tie in point (viewing North West)



Utility Impact Summary

Alternative D-2

SUMMARY

This alternative includes construction of a new road linking Route 20 with Rio Road. This new road would have two vehicle travel lanes with two bike shoulder lanes (similar to the John Warner Parkway). The intersection with Route 20 should be aligned with Albemarle County's extension of Olympia Drive as laid out in the Pantops Master Plan. This alternative also includes improvements to Pen Park Lane, and widening Rio Road to four lanes from Pen Park Lane to the John Warner Parkway intersection. This alternative has been revised from the original Alternative D-1 near the end by revising the road alignment to best follow Elk Drive at Darden Towe Park and ultimately tie into Route 20 (Stoney Point Road)

ELECTRIC

- Electric facilities consist mainly of single and dual three-phase circuits throughout the length of the project
- All poles from the intersection of Rio Road and John Warner Parkway continuing along Rio Road to Towne Lane, all poles along the western most edge of Pen Park between Pen Park (Charlottesville Catholic School/Meadowcreek Golf Course) and Pen Park Lane, all poles along the southern most edge of Darden Towe Park (including those along Elk Drive and those along Stony Point Road near the proposed intersection of Olympia Drive Extension and Stony Point (approximately 700 ft. north of Winding River Lane) are assumed to be in conflict with the project due to their proximity to the road and proposed project
- There is no evidence of underground electric facilities throughout the length of the project
- Transmissions lines also existing crossing Darden Towe Park and continues to the intersection of US 250 and Stoney Point Road. The existing transmissions lines are in close proximity to the proposed project area and will be impacted
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project
- Major facilities exist underground throughout the entire project exist
- Other fiber companies exist within the project limits but could not be confirmed
- All facilities from the intersection of Rio Road and John Warner Parkway continuing along Rio Road to Towne Lane, all poles along the western most edge of Pen Park between Pen Park (Charlottesville Catholic School/Meadowcreek Golf Course) and Pen Park Lane, all poles along the southern most edge of Darden Towe Park (including those along Elk Drive and those along Stony Point Road near the proposed intersection of Olympia Drive Extension and Stony Point (approximately 700 ft. north of Winding River Lane) are assumed to be in conflict with the project due to their proximity to the road and proposed project
- Assumed footages and units are reflected in PCES

WATER

- Evidence of existing water lines exist throughout
- GIS data indicates an existing water lines along Rio Road from John Warner Parkway south to Pen Park Lane, at tie-in location along Stony Point road and Olympia Drive Extension will be impacted
- Water lines will be impacted and are in conflict with proposed project due to their proximity to the proposed project
- Assumed footages and units are reflected in PCES

SEWER

- Evidence of existing sewer lines exist in few locations along the project
- GIS data indicates an existing sewer between the end of Pen Park Lane and the Rivanna River, running parallel to the river. Sewer lines will be impacted and are in conflict with proposed project due to a proposed crossing near the creek before the Rivanna River
- Assumed footages and units are reflected in PCES

GAS

- Evidence of an existing gas line that runs down Pen Park Lane and in a few additional locations along the project
- Existing gas is to be impacted due to proposed alignment shift
- Assumed footages and units are reflected in PCES

PETROLEUM

- No evidence of a petroleum line that will be impacted along the extents of the project
- Assumed no conflict



[ALTERNATIVE "D-2"] Intersection at Rio Road and John Warner Parkway. Three Phase Electric Pole with single telecommunication attachment along south western side of Rio Road (viewing South)



[ALTERNATIVE "D-2"] On Rio Road just south of Dunlora Drive. 8" Water Markings on the western edge of Rio Road and Singe Phase Electric Pole crossing Rio Road to be impacted (viewing South)



[ALTERNATIVE "D-2"] On Rio Road just south of Dunlora Drive. Telecommunications Pedestal and Pole with multiple attachments along the western edge of Rio Road to be impacted (viewing South)



[ALTERNATIVE "D-2"] On Rio Road between Dunlora Drive and Pen Park Road. Telecommunications Pole with multiple attachments along the western edge of Rio Road to be impacted (viewing West)



[ALTERNATIVE "D-2"] Intersection of Rio Road and Pen Park Road. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossings to be impacted (viewing South)



[ALTERNATIVE "D-2"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossing and/or service drops to be impacted (viewing South)



[ALTERNATIVE "D-2"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments along the eastern edge of Rio Road with crossing and/or service drops to be impacted (viewing South)



[ALTERNATIVE "D-2"] Intersection of Rio Road and Towne Lane. 3 Phase Electric Pole with multiple telecommunications attachments and a telecommunications pole line along the eastern edge of Rio Road with crossings and/or service drops (viewing East)



[ALTERNATIVE "D-2"] Rio Road just north of the intersection of Rio Road and Pen Park Lane. 3 Phase Electric Pole with multiple Telecommunications attachments and a telecommunications pole line along the eastern edge of Rio Road (viewing North)





[ALTERNATIVE "D-2"] End of Pen Park Lane at existing construction gate. This area to be impacted (viewing South)



[ALTERNATIVE "D-2"] End of Pen Park Lane at existing construction gate. The area to be impacted (viewing North)



[ALTERNATIVE "D-2"] Darden Towe Park area to be impacted (viewing North)



[ALTERNATIVE "D-2"] Darden Towe Park area to be impacted (viewing West)



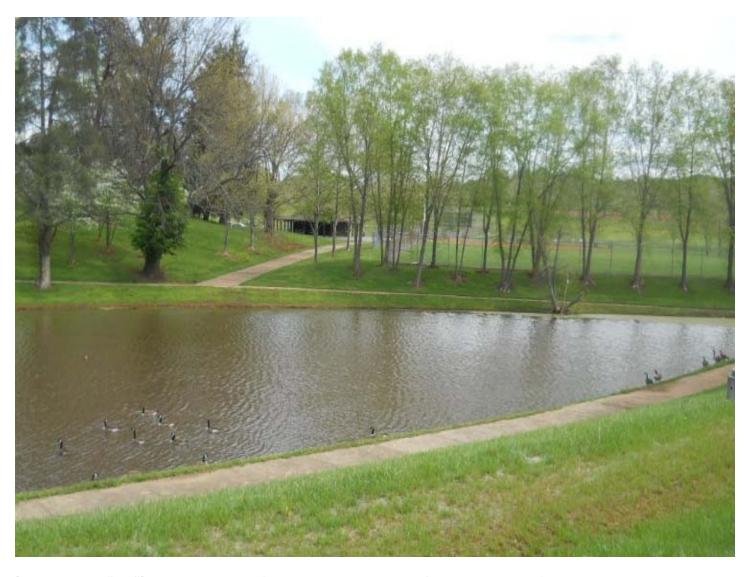
[ALTERNATIVE "D-2"] Darden Towe Park area to be impacted (viewing South West)



[ALTERNATIVE "D-2"] Darden Towe Park area to be impacted (viewing South)



[ALTERNATIVE "D-2"] Pond at Darden Towe Park to be impacted (viewing North)



[ALTERNATIVE "D-2"] Pond and baseball fields at Darden Towe Park (viewing North East)



[ALTERNATIVE "D-2"] Aerial image of Transmission Power Line at Darden Towe Park entrance to be impacted.



[ALTERNATIVE "D-2"] Transmission Line crossing near Darden Towe Park entrance looking toward Free Bridge Lane. This area to be impacted (viewing South West)



[ALTERNATIVE "D-2"] Transmission Line crossing near Darden Towe Park entrance. This area to be impacted (viewing North)



ALTERNATIVE "D-2"] Transmission Line crossing near Darden Towe Park entrance looking toward Free Bridge Lane. This area to be impacted (viewing South West)



[ALTERNATIVE "D-2"] At the intersection of Elk Drive and Stony Point Road. Electric and telecommunication poles running along the northern edge of Elk Drive. This area to be impacted (viewing West)



[ALTERNATIVE "D-2"] Just north of Winding River Lane on Stony Point Road. This area to be impacted (viewing East)



[ALTERNATIVE "D-2"] Intersection of Olympia Drive and Town and Country Lane. This area to be impacted (viewing North West)



[ALTERNATIVE "D-2"] Intersection of Olympia Drive and Town and Country Lane. This area to be the tie in point (viewing North West)



Utility Impact Summary

Alternative F

SUMMARY

This alternative includes an additional east/west vehicle travel lane on the US 250 Free Bridge crossing the Rivanna River. This lane could extend from the Route 20 intersection through the High Street intersection. This alternative has been revised to include an additional through lane for capacity and relocate sidewalks and bike lanes to a parallel bridge.

- Evaluation of this alternative should look at ways of adding the lane without reconstruction of the bridge (e.g. removing a sidewalk and reducing lane widths)

ELECTRIC

- Electric facilities consist mainly of single and dual three-phase circuits throughout the length of the project along the north side of US 250 west of the Rivanna River and along both sides of US 250 east of the Rivanna River
- All poles along the north side of US 250 from approximately the intersection of St. Clair Avenue and US 250 to the Rivanna River (progressing east) will be impacted and are in conflict
- All poles along both sides of US 250 from the Rivanna River to the intersection of Stoney Point Road (Route 20) and US 250 (progressing east) will be impacted and are in conflict
- All poles along the north side of US 250 from Stoney Point Road (Route 20) to approximately the entrance of 1298 Richmond Road/US 250 (progressing east) will be impacted and are in conflict
- There is evidence of underground electric facilities throughout the length of the project and will be impacted along US 250 from approximately the intersection of St. Clair Avenue and US 250 to approximately the entrance of 1298 Richmond Road/US 250 (progressing east)
- Transmissions lines also exist at the intersection of US 250 and Stoney Point Road crossing US 250 running north and south but will not be impact for this alternative
- Assumed footages and units are reflected in the PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project and will be impacted respectively
- Major facilities exist underground throughout the entire project along both sides of US 250 from St. Clair Avenue to approximately the entrance of 1298 Richmond Road/US 250 (progressing east) and will be impacted
- Assumed footages and units are reflected in the PCES

WATER

- Evidence of existing water lines exist throughout the entirety of the project along the north edge of US 250 (from St. Clair Avenue progressing east to approximately the entrance of 1298 Richmond Road/US 250)
- Water lines will be impacted and in conflict with proposed project due to the shift in road alignment and proposed improvements
- Assumed footages and units are reflected in the PCES

SEWER

- Evidence of existing sewer line exists running along the west edge of the Rivanna River and will be impacted due
 to the shift in road alignment and proposed improvements
- Assumed footages and units are reflected in the PCES

GAS

- Evidence of existing gas lines exist throughout the entirety of the project along the north edge of US 250 (from St. Clair Avenue progressing east to approximately the entrance of 1298 Richmond Road/US 250)
- Gas lines will be impacted and in conflict with proposed project due to the shift in road alignment and proposed improvements
- Assumed footages and units are reflected in the PCES

PETROLEUM

- No evidence of petroleum lines that will be impacted along US 250 from approximately the intersection of River Road and US 250 to approximately the intersection of Stony Point Drive and US 250
- Assumed no conflict



[ALTERNATIVE "F"] Intersection of US 250 and River Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted (viewing East)



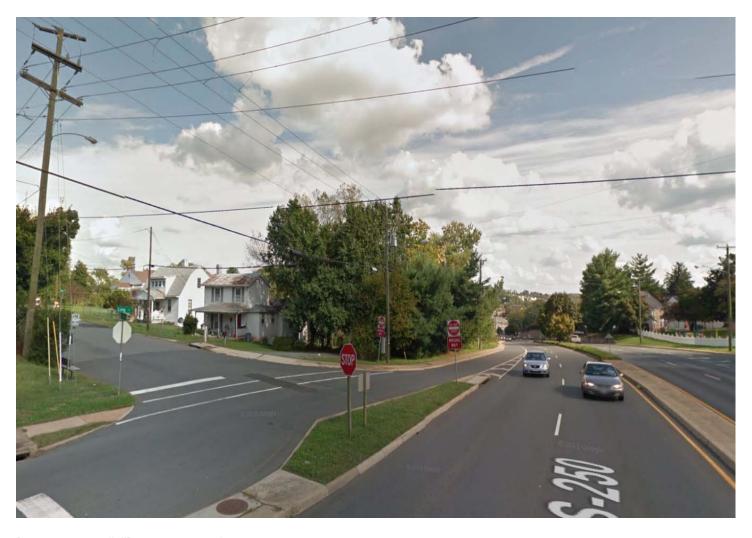
[ALTERNATIVE "F"] Intersection of East High Street and US 250. Dual 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the western edge of East High Street will not be impacted (viewing South West)



[ALTERNATIVE "F"] Intersection of East High Street and US 250. 3 Phase Electric Poles with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted (viewing North East)



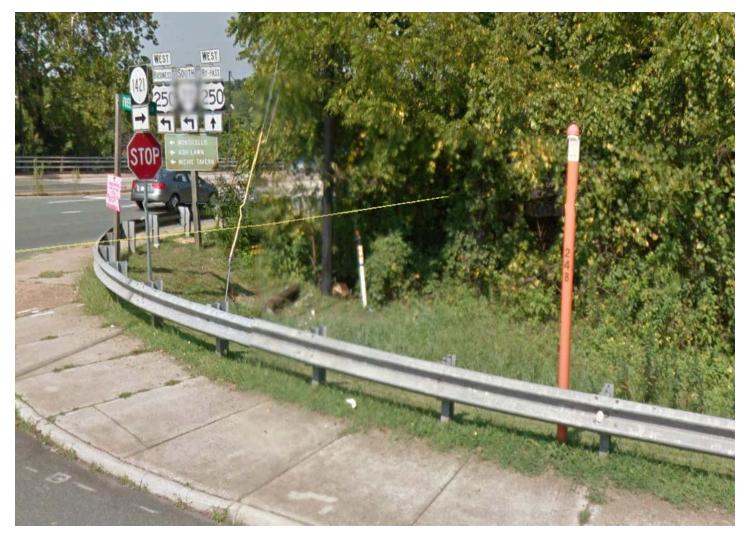
[ALTERNATIVE "F"] Underneath the existing US 250 bridge at the intersection of East High Street and US 250. Sanitary Sewer will not be impacted.



[ALTERNATIVE "F"] Intersection of US 250 and St. Clair Avenue. 3 Phase Electric Pole with telecommunications attachment and crossings along the northern edge of US 250. Facilities will not to be impacted (viewing South East)



[ALTERNATIVE "F"] Intersection of US 250 and Landonia Circle. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the north edge of US 250. Facilities will not be impacted (viewing South East)



[ALTERNATIVE "F"] Intersection of Free Bridge Lane and US 250. Telecommunications post markers locating existing buried handhole and/or splicing location of underground telecommunication. Facilities will not be impacted (viewing West)



[ALTERNATIVE "F"] Intersection of US 250 and Free Bridge Lane. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the north edge of US 250. Aerial and underground utilities will not be impacted (viewing North West)



[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted. Underground utilities and telecommunications facilities will not be impacted. (viewing North East)



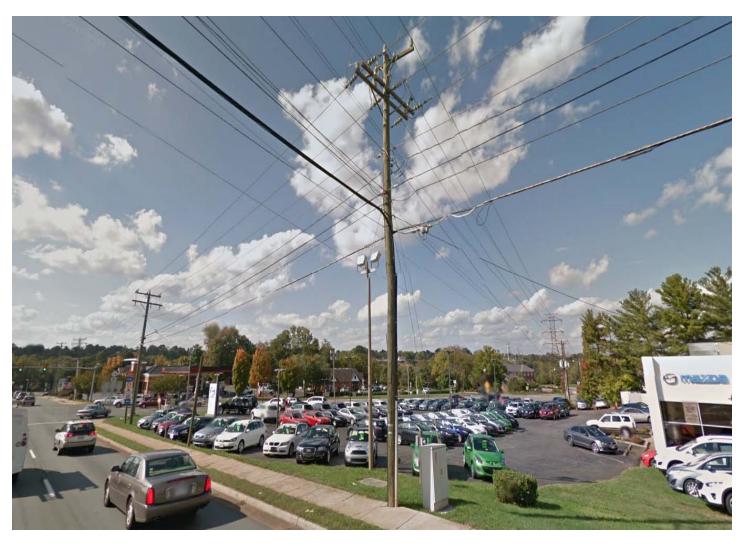
[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted. Underground utilities and telecommunications facilities will not be impacted (viewing South)



[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted. Underground utilities and telecommunications facilities will not be impacted (viewing North East)



[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Underground utilities and telecommunications facilities will not be impacted (viewing East)



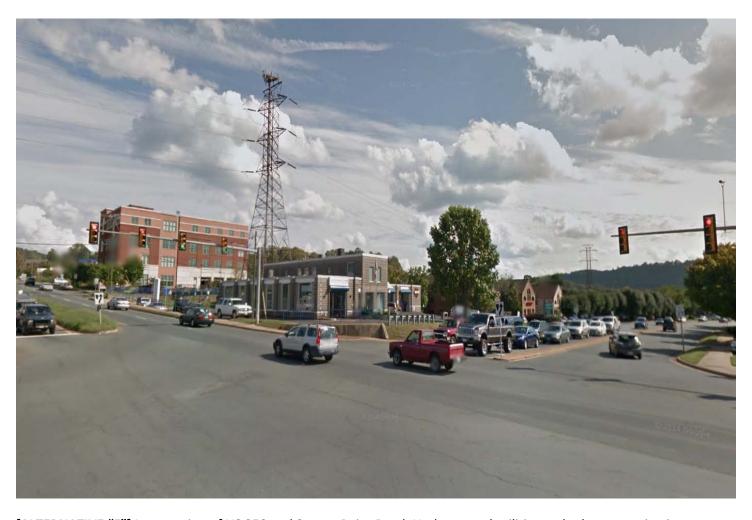
[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted. Paint marking indicate and existing water line running underneath the existing sidewalk along the northern edge of US 250. Telecommunications handhole at the base of existing pole. Underground utilities and telecommunications facilities will not be impacted (viewing North West)



[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 will not be impacted. Underground utilities and telecommunications facilities will not be impacted (viewing West)



[ALTERNATIVE "F"] Just east of the intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along US 250 will not be impacted. Underground utilities and telecommunications facilities will not be impacted (viewing East)



[ALTERNATIVE "F"] Intersection of US 250 and Stoney Point Road. Underground utilities and telecommunications facilities will not be impacted (viewing South East)



[ALTERNATIVE "F"] Exxon near the intersection of US 250 and Stoney Point Road. 3 Phase Electric Pole with multiple telecommunications attachments and crossings along the northern edge of US 250 to be impacted. Paint markings indicate existing electric (in red) telecommunications (in orange) and water (in blue) existing within the project limits. Underground utilities and telecommunications facilities will not be impacted (viewing West)



Utility Impact Summary

Alternative G

SUMMARY

This alternative includes a new bridge connection between New House Drive/South Pantops Drive and East High Street. The bridge would be a two lane urban style bridge with appropriate bike and pedestrian facility accommodations. Additional considerations include a new intersection at High Street and New House Drive/South Pantops Drive.

ELECTRIC

- Electric facilities consist of 3-phase circuits along the west edge of East High Street, along the east edge of New House Drive/South Pantops Drive and to the rear of the Pantops Shopping Center
- Poles that will be impacted include those along New House Drive and to the rear of the Pantops Shopping Center
- Service drops will be the only other aerial electric facilities impacted for both East High Street and New House Drive/South Pantops Drive
- No evidence of underground electric facilities that will be impacted near the intersection of Grace Street and East High Street nor near the intersection New House Drive and South Pantops Drive
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- No major Telephone and CATV facilities exist on the electric pole line along the project. Service drops will be the only electric facilities impacted for both East High Street and New House Drive/South Pantops Drive
- No evidence of major underground facilities exists along the west edge of East High Street near the intersection of Grace Street or along the west edge of New House Drive
- No evidence of major underground facilities running along New House Drive to South Pantops Drive and to the rear of the Pantops Shopping Center that will be impacted due to the proposed South Pantops Drive/East High Street Bridge
- No evidence of major underground facilities running along the Rivanna River between Hazel Street and US 250 will be impacted due to the proposed South Pantops Drive/East High Street Bridge
- Assumed footages and units are reflected in PCES

WATER

- No evidence of water line that will be impacted near the intersection of East High Street and Grace Street
- No evidence of water line that will be impacted near the intersection New House Drive and South Pantops Drive.
- Assumed footages and units are reflected in PCES

SEWER

- Evidence of existing sewer lines running parallel to East High Street and the Rivanna River
- The location of the proposed South Pantops/East High Street Bridge piers and foundation can be adjusted to avoid impacting the existing sewer line
- Assumed footages and units are reflected in PCES

GAS

- No evidence of a gas line that will be impacted near the intersection of Grace Street and East High Street
- Paint markings show evidence of an existing gas line running along South Pantops Drive
- The location of the existing line will be impacted
- Assumed footages and units are reflected in PCES

PETROLEUM

- No evidence of a petroleum line that will be impacted near the intersection of Grace Street and East High Street
- No evidence of a petroleum line that will be impacted near the intersection of New House Drive and South Pantops Drive
- Assumed no conflict



[ALTERNATIVE "G"] East High Street just south of the intersection of East High Street and Grace Street. Dual Three Phase Electric Poles with multiple telecommunications attachments along the western edge of East High Street (viewing North)



[ALTERNATIVE "G"] Intersection of East High Street and Grace Street. Dual Three Phase Electric Poles with multiple telecommunications attachments and water valve along the western edge of East High Street (viewing East)



[ALTERNATIVE "G"] 1526 East High Street (viewing East)



[ALTERNATIVE "G"] Intersection of East High Street and Willow Drive. Dual Three Phase Electric Poles with multiple telecommunications attachments and water valve along the western edge of East High Street (viewing East)



[ALTERNATIVE "G"] Back of 1526 East High Street (viewing West)



[ALTERNATIVE "G"] Intersection of East High Street and Grace Street. Dual Three Phase Electric Poles with multiple telecommunications attachments and water valve along the western edge of East High Street (viewing North)



[ALTERNATIVE "G"] Intersection of US 250 and New House Drive. Three Phase Electric Pole with multiple attachments with crossings and/or service drops (viewing South West)



[ALTERNATIVE "G"] Intersection of US 250 and New House Drive. Three Phase Electric Pole with multiple attachments with crossings and/or service drops (viewing South West)



[ALTERNATIVE "G"] Intersection of US 250 and New House Drive. Three Phase Electric Pole with multiple attachments with crossings and/or service drops (viewing South West)



[ALTERNATIVE "G"] Intersection of US 250 and New House Drive. Three Phase Electric Pole with multiple attachments (viewing North)



[ALTERNATIVE "G"] Intersection of US 250 and New House Drive. Three Phase Electric Pole with multiple attachments (viewing South)



Utility Impact Summary

Alternative I

SUMMARY

This alternative consists of intersection improvements to improve right turns from US 250 onto East High Street, left turns from Riverbend Drive onto US 250, left and right turns from Stony Point Road onto US 250, left turns along Stony Point Road at the McDonalds entrance, and right turn from US 250 Westbound onto Route 20.

ELECTRIC

- Electric facilities consist mainly of single and dual three-phase circuits along both sides of US 250, Route 20, and East High Street
- All poles along the west edge of East High Street from Riverdale Drive to US 250 will be impacted due to the widening of the road and proposed sidewalk
- All poles along the west edge of Stony Point Road from the McDonalds entrance to the Exxon Gas Station entrance will be impacted due to the widening of the road and proposed sidewalk improvements
- Poles along the north edge of US 250 from Stony Point Parkway progressing east to approximately People Place will be impacted due to the proposed road widening and sidewalk improvements
- Evidence of underground electric facilities throughout the length of the project and will be impacted due to the widening of the road and proposed sidewalk at the two locations.
- Possible grade cuts may affect underground utilities at all three locations
- A transmission line also existing at the intersection of US 250 and Stoney Point Road but is out of the project limit for Alternative I and will not be impact by the project
- Assumed footages and units are reflected in PCES

TELECOMMUNICATIONS

- Major Telephone and CATV facilities exist on the electric pole line along the project along both sides of US 250,
 Route 20, and East High Street
- Major facilities exist underground throughout the entire project along both sides of US 250, Route 20, and East High Street
- Other underground telecommunications facilities likely exist within the project limits but could not be confirmed
- All aerial facilities along the west edge of East High Street from Riverdale Drive to US 250 will be impacted due to the widening of the road and proposed sidewalk
- All aerial facilities along the west edge of Stony Point Road from the McDonalds entrance to the Exxon Gas Station entrance will be impacted due to the widening of the road and proposed sidewalk improvements
- All underground facilities along the west edge of US 250 and East High Street are assumed to be in conflict due to the widening of the road and proposed sidewalk
- All underground facilities along the west edge of US 250 and Stony Point Road are assumed to be in conflict due to the widening of the road and proposed sidewalk improvements
- Locater paint markings show the existing lines underneath the existing sidewalk along the north edge of US 250 and will be impacted due to the proposed road widening and sidewalk improvements
- Other underground telecommunications facilities likely exist within the project limits but could not be confirmed

- Possible grade cut may affect underground facilities at all three locations
- Assumed footages and units are reflected in PCES

WATER

- Evidence of existing water lines exist throughout
- GIS data indicates an existing water line at the intersection of US 250 and East High Street running along the
 west edge of East High Street. This line will be impacted due to the widening of the road and proposed sidewalk
 improvements
- Locater paint markings indicate an existing water line at the intersection of US 250 and Stony Point Road running along the north of US 250 underneath the existing sidewalk. This line will be impacted due to the widening of the road and proposed sidewalk improvements
- Water line and structure (fire hydrant) at these discussed locations will be impacted due to the widening of the road and proposed sidewalk improvements
- Assumed footages and units are reflected in PCES

SEWER

- No evidence of a sewer line that will be impacted at the intersection of US 250 and East High Street
- No evidence of a sewer line that will be impacted at the intersection of US 250 and Stony Point Road
- Assumed no conflict

GAS

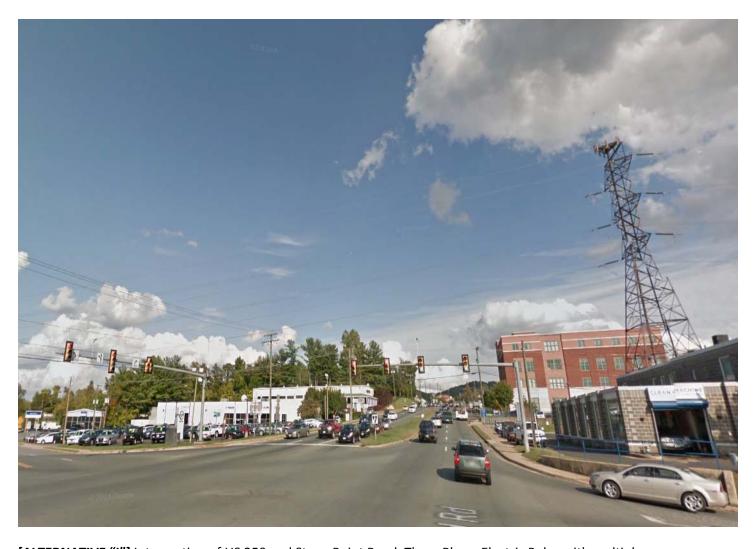
- No evidence of a gas line that will be impacted at the intersection of US 250 and East High Street
- Locate paint markings indicate an existing gas line that will be impacted at the intersection of US 250 and Stony
 Point Road due to the widening of the road and sidewalk improvements. Gas appears to exist along the west
 edge of Stony Point Road and crosses US 250
- Assumed no conflict

PETROLEUM

- No evidence of a petroleum line that will be impacted at the intersection of US 250 and East High Street
- No evidence of a petroleum line that will be impacted at the intersection of US 250 and Stony Point Road
- Assumed no conflict



[ALTERNATIVE "I"] US 250 just east of the intersection of US 250 and Stony Point Road. Three Phase Electric Poles with multiple telecommunications attachments (viewing North West)



[ALTERNATIVE "I"] Intersection of US 250 and Stony Point Road. Three Phase Electric Poles with multiple telecommunications attachments **Notice Transmission Line crossing US 250** (viewing North East)



[ALTERNATIVE "I"] Stony Point Road just north of the intersection of US 250 and Stony Point Road. Three Phase Electric Poles with multiple telecommunications attachments **Notice Transmission Line crossing US 250** (viewing South)



[ALTERNATIVE "I"] At the intersection of US 250 and Stoney Point Road. Three Phase Electric Poles with multiple telecommunications attachments. Paint markings along sidewalk show underground telecommunications and water (viewing East)



[ALTERNATIVE "I"] Just east of the intersection of US 250 and Stoney Point Road. Three Phase Electric Poles with multiple telecommunications attachments and a handhole at the base of the pole (viewing North West)



[ALTERNATIVE "I"] Just east of the intersection of US 250 and Stoney Point Road. Three Phase Electric Poles with multiple telecommunications attachments crossing US 250 **Notice Transmission Line crossing US 250** (viewing West)



[ALTERNATIVE "I"] At the intersection East High Street and Riverdale Drive. Dual 3 Phase Electric Poles with multiple telecommunications attachments running along the west edge of East High Street. US 250 running parallel to Riverdale Drive and perpendicular to East High Street (viewing North)



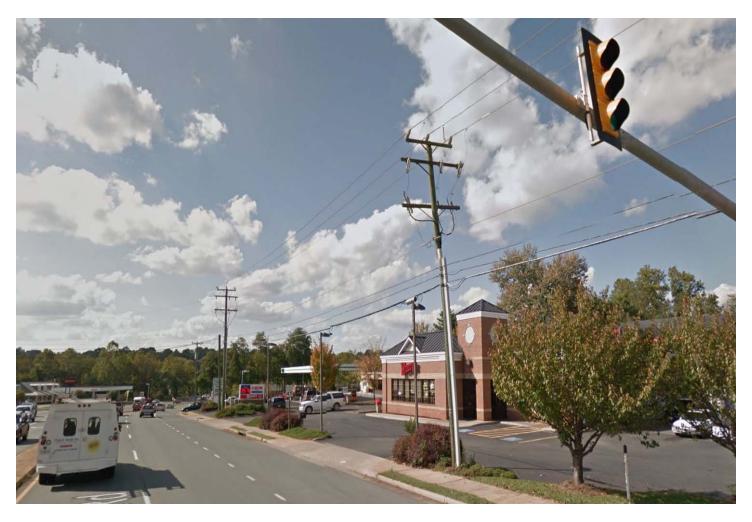
[ALTERNATIVE "I"] At the intersection of US 250 and East High Street. Dual 3 Phase Electric Poles with multiple telecommunications attachments running along the west edge of East High Street and crossing US 250 (viewing West)



[ALTERNATIVE "I"] At the intersection of US 250 and Route 20/Stony Point Road/Riverbend Drive. Dual 3 Phase Electric Poles with multiple telecommunications attachments running along the north edge of US 250 (viewing North West)



[ALTERNATIVE "I"] At the McDonald's entrance, just north of the intersection of US 250 and Stony Point Road. (viewing South)



[ALTERNATIVE "I"] At the intersection of US 250 and Route 20/Stony Point Road/Riverbend Drive. Dual 3 Phase Electric Poles with multiple telecommunications attachments running along the north edge of US 250 (viewing West)



[ALTERNATIVE "I"] At the intersection of US 250 and Riverbend Drive (viewing South West)