

5680 Cloverland Drive Culvert Rehabilitation

Existing Conditions

Description:

The culvert is located approximately 100' north of the featured address, 5680 Cloverland Drive. The culvert consists of a two (2) 48" CMP(s) with stone headwalls. The inlet and outlet embankment slopes are approximately equal to 2:1 with vegetative cover. The CMP(s) have separated from the inlet and outlet headwalls. There is 100% section loss throughout the south CMP's invert and minor seam separation near the north CMP's outlet. There are several areas of potholing over the culvert that has since been patched. The potholing appears to be related to the section loss and seam separation.

Spans: 2

Length: 27.25'

Width: 48"

Rise: 48"

Reasons for Rehabilitation:

- ✓ Roadway Failure
- ✓ Headwall Destabilization
- ✓ Pipe Seam Separation
- ✓ 100% Section Loss along Inverts



Roadway Failure w/ Steel Plate



100% Section Loss



Inlet Headwall w/ Mortar Loss & Pipe Separation

5680 Cloverland Drive Culvert Rehabilitation

Proposed Conditions

Description:

The proposed culvert rehabilitation will include isolating the upstream and downstream channels. Clean all debris and sediment buildup from the pipe. Pave the invert with high strength grout. Install a cementitious lining through the 27.25' long double barrel 48" CMP(s). Repair the inlet and outlet headwalls by repointing the stone masonry units. Fill all voids around the CMP(s) and headwall with high strength grout. Excavate the area of roadway failure to remove all loose material down to the CMP(s) and fill all voids around the culvert with flowable fill to a min. of two feet above the CMP(s). Then backfill and repair the roadway in accordance with Metro Detail DR-180 "Trench Backfill".

Spans: 2

Length: 27.25'

Width: 48"

Rise: 48"

Opinion of Probable Cost: \$370,000

Anticipated Construction Duration: 2 Weeks

Anticipated Schedule w/ Intermittent Lane Closures - Phase 1 Headwall Restoration:

September 26th through September 30th

Anticipated Schedule w/ Intermittent Lane Closure - Phase 2 Pipe Restoration:

October 24th through October 28th

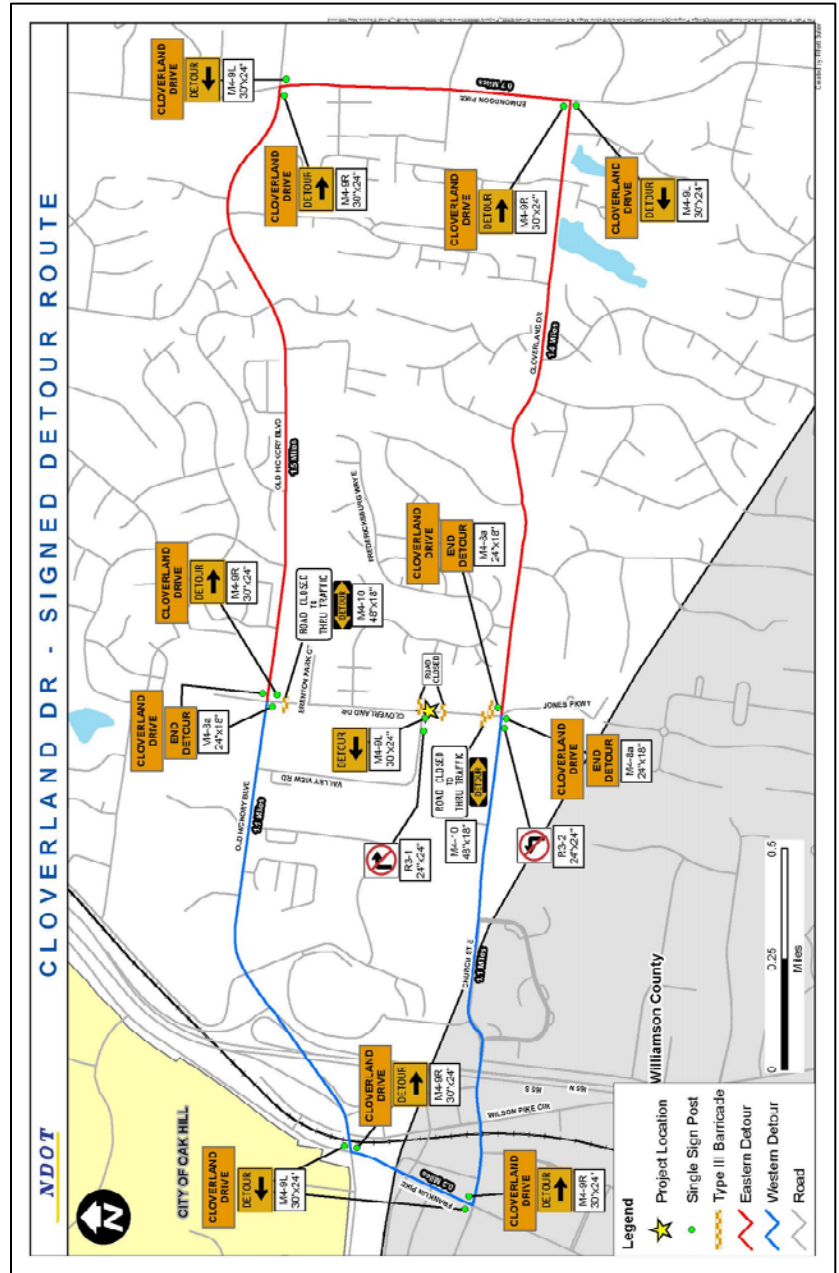
Anticipated Schedule - Phase 3 Roadway Restoration w/ Road Closure:

October 28th through October 30th

Project Status: Ready for construction

Construction Challenges:

- ✓ Depth of Excavation
- ✓ Site Maintenance
- ✓ Stormwater Management



Detour Map