MOORECO

COMPUTED BY: C.MOORE DATE: 9/1/2016

CHECKED BY: S. BONDOR DATE: 9/1/2016

NORTH CAROLINA DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

PROJECT NO.	SHEET NO.
U-3440	3D-13

Note: Invert Elevations indicated are for Bid Purposes only and shall not be used for project construction stakeout. See "Standard Specifications For Roads and Structures, Section 300-5".

LIST OF PIPES, ENDWALLS, ETC. (FOR PIPES 48 INCHES & UNDER)

LINE & STATION (SIZE / THICKNESS OR GAUGE)	OFFSET	STRUCTURE NUMBER FROM	STRUCTURE NUMBER TO	TOP ELEVATION (FT.)	INVERT ELEVATION (FT.)	INVERT ELEVATION (FT.)	MINIMUM REQUIRED SLOPE (%)	Drainage Pipe (RCP, CSP, CAAP, HDPE, or PVC) 12	15	18	24	30	36	42	48	DO NOT USE RCP	DO NOT USE CSP	DO NOT USE CAAP	DO NOT USE HDPE	DO NOT USE PVC	C. S. PIPE 12 (.064)	15 (.064)	18 (.064)	24 (.064)	30 (.079)	36 (.079)	42 (.109)	48 (.109)
L 119+88	108 LT	1261	1262																									
L89+76	147 LT																											
L90+58	51 LT																											
Project area																												
L69+50	32 LT																											
SHEET 3D-14 Totals																												
SHEET TOTALS																												
PROJECT TOTALS									6684	2540	4156	904	2484	80	476							872	180	260	60	56		56

LINE & STATION	R. C. PIPE CLASS III 12	15	18	24	30	R. C. PIPE CLASS IV 12	15	48	54	60	42" WELDED STEEL PIPE 0.1094" THICK GRADE B NOT IN SOIL	42" WELDED STEEL PIPE 0.1094" THICK GRADE B IN SOIL	36" WELDED STEEL PIPE 0.1094" THICK, GRADE B NOT IN SOIL	36" WELDED STEEL PIPE 0.1094" THICK, GRADE B IN SOIL	15" SIDE DRAIN PIPE	ENDWALLS STD. 838.01 OR STD. 838.11 (UNLESS NOTED OTHERWISE) (CY)	DRAINAGE STRUCTURE MASONRY (FT)	QUANTITIES FOR DRAINAGE STRUCTURES (NOTE: TOTAL LIN. FT. FOR PAY QUANTITY SHALL BE A + (1.3 X B)) 0' THRU 5' (EACH)	A 5' THRU 10' (LIN. FT.)	B 10' AND ABOVE (LIN. FT.)	C.B. STD. 840.01 OR STD. 840.02	FRAME, GRATES, AND HOOD STD. 840.03 GRATE TYPE E	F	G		CONCRETE TRANSITIONAL SECTION D.I. DETAIL 2C-10 OR 2C-14	C.B. STD. 852.05	OPEN THROAT C.B. STD. 840.04 OR STD. 840.05	CONCRETE BRIDGE APPROACH D.I. STD. 840.13	D.I. STD. 840.14 OR STD. 840.15
L 119+88															24															
L89+76																														
L90+58																														
Project area																														
L69+50																			5.0	3.0										
SHEET 3D-14 Totals																														
SHEET TOTALS															24				5.0	3.0										
PROJECT TOTALS	8			8			192	60			96	96	112	112	324	21.700		259	184.6		138	14	54	70		35	4	7		56

LINE & STATION	D.I. FRAME AND GRATES STD. 840.16	G.D.I. TYPE "A" STD. 840.17 OR STD. 840.26	G.D.I. TYPE "B" STD. 840.18 OR STD. 840.27	G.D.I. TYPE "D" STD. 840.19 OR STD. 840.28	G.D.I. (W.S. FLAT) FRAME WITH GRATE STD. 840.20	G.D.I. (W.S. FLAT) FRAME W/ 2 GRATES STD. 840.20	G.D.I. (W.S. SAG) FRAME W/ 2 GRATE STD. 840.22	G.D.I. (W.S. SAG) FRAME W/ GRATE STD. 840.22	G.D.I. (N.S. SAG) FRAME W/ GRATE STD. 840.24	G.D.I. (N.S. SAG) FRAME W/ 2 GRATES STD. 840.24	G.D.I. (N.S. FLAT) FRAME W/ GRATE STD. 840.29	G.D.I. (N.S. FLAT) FRAME W/ 2 GRATES STD. 840.29	DRIVEWAY D.I. STD. 840.30	J.B. STD. 840.31 OR STD. 840.32	T.B.J.B. STD. 840.34	T.B.D.I. STD. 840.35	M.H. FRAME AND COVER STD. 840.54	ADJUST MH	15" C.S. ELBOW	18" C.S. ELBOW	24" C.S. ELBOW	30" C.S. ELBOW	36" C.S. ELBOW	48" C.S. ELBOW	FLOWABLE FILL (CY)	CONCRETE COLLARS CL. "B" STD. 840.72 (CY)	CONCRETE AND BRICK PIPE PLUG STD. 840.71 (CY)	PIPE REMOVAL (LIN. FT.)	REMARKS
L 119+88																													
L89+76																											0.116		PLUG
L90+58																											0.029		PLUG
Project area																									164				Total Project Flowable Fill
L69+50																		1											42" RCP Sanitary Sewer Manhole
SHEET 3D-14 Totals														4			2												
SHEET TOTALS														4			2	1							164		0.145		
PROJECT TOTALS	56	4	10			31				14				11	6	31	7	1	7	1	4	1	1	1	164	1.2920	0.145	3924	

ABBREVIATIONS

- C.A.A. CORRUGATED ALUMINIUM ALLOY
- C.B. CATCH BASIN
- C.S. CORRUGATED STEEL
- D.I. DROP INLET
- G.D.I. GRATED DROP INLET
- H.D.P.E. HIGH DENSITY POLYETHYLENE
- J.B. JUNCTION BOX
- M.H. MANHOLE
- N.S. NARROW SLOT
- P.V.C. POLYVINYL CHLORIDE
- R.C. REINFORCED CONCRETE
- T.B.D.I. TRAFFIC BEARING DROP INLET
- T.B.J.B. TRAFFIC BEARING JUNCTION BOX
- W.S. WIDE SLOT