



① METHOD OF PIPE INSTALLATION (FLEXIBLE PIPE)

N.T.S **② METHOD OF PIPE INSTALLATION (RIGID PIPE)**

N.T.S

FLEXIBLE PIPE									
Round Corrugated Steel Pipe 2 2/3 x 3/8 corrugation **									
Diameter (inches)	Minimum cover (inches)	Maximum Height of Cover (feet)							
		(Ga)	10	14	12	10	8		
12	12	102	256						
15	12	162	204						
18	12	135	169	239					
21	12	115	145	204					
24	12	100	126	178					
30	12	79	100	142					
36	12	65	83	117	152				
42	12	55	70	100	130	160			
48	12	48	61	87	113	139			
54	12		54	77	100	123			
60	12			69	90	111			
66	12				81	100			
72	12				74	91			
78	12								
84	12					69			
Round Corrugated Aluminum Pipe 2 2/3 x 3/8 corrugation **									
Diameter (inches)	Minimum cover (inches)	Maximum Height of Cover (feet)							
		(Ga)	16	14	12	10	8		
12	12	123	155	216	281	344			
15	12	98	123	174	224	275			
18	12	81	102	144	187	228			
21	12	68	87	123	160	195			
24	12	60	76	108	139	171			
27	12	67	95	123	151				
30	12	60	85	111	136				
36	12	50	71	92	113				
42	12	60	78	96					
48	12	52	68	84					
54	12	46	50	74					
60	12	50	62						
66	12		51						
72	12		41						

** FOR DIFFERENT CORRUGATIONS AND ARCH PIPES REFER TO ROADWAY DESIGN MANUAL OR MANUFACTURERS SPECIFICATION.

REFER TO THE FOLLOWING FOR PIPE SPECIFICATIONS

CSP - AASHTO M36
CAAP - AASHTO M196
HDPE - AASHTO M294
PVC - ASTM F949 or AASHTO M304

NOTES: FILL HEIGHTS SHOWN WERE CALCULATED USING AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS

1' MINIMUM COVER FOR ALL SIDE DRAIN PIPE
IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS

RIGID PIPE									
RCP - * (Minimum fill) 1' for Class IV & CLASS V 2' for Class III & Class II									
* (Maximum fill) 10' - Class II pipe 20' - Class III pipe 30' - Class IV pipe 40' - Class V pipe									
(For fills > 40' & < 80' use LRFD Direct Design Method)									
* FILL HEIGHT IS MEASURED FROM THE TOP OF THE PIPE TO THE BOTTOM OF THE PAVEMENT STRUCTURE									
REFER TO THE FOLLOWING FOR PIPE SPECIFICATIONS									
RCP - AASHTO M170									
NOTES: FILL HEIGHTS SHOWN WERE CALCULATED USING AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS									
1' MINIMUM COVER FOR ALL SIDE DRAIN PIPE IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS									

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METHOD OF PIPE INSTALLATION TABLES

STATE OF NORTH CAROLINA
DEPT. OF TRANSPORTATION
DIVISION OF HIGHWAYS
RALEIGH, N.C.

1-18

ROADWAY STANDARD DRAWING FOR
METHOD OF PIPE INSTALLATION
FILL HEIGHT TABLES

SHEET 3 OF 3

300.01

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PIPE DETAILS

Modular Office Relocation for
NCDOT Highway Division 5
Bridge Maintenance Office

STATE CONSTRUCTION
ID.# 22-24690-01A

EQUIPMENT NUMBER:
1320-0008-3222

REVISIONS

NO.	DATE

DATE ISSUED: 9/5/2023
DRAWN BY: DJM
CHECKED BY: HWD

SHEET NO.

C-6.4

