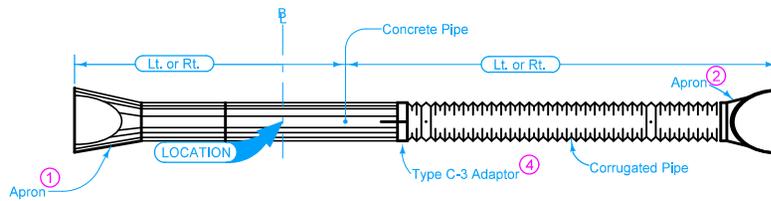


SECTION

A= Concrete Pipe Length  
 B+C+E= C.M.P. or P.E.P. Length



PLAN

$\bar{Q}$  is  $\bar{C}$  of roadway, dike survey or other as detailed on the plans.

Skew angle is the angle which one end of the pipe is ahead (by stationing) of a line perpendicular to the  $\bar{Q}$ . (Example: Skew Rt. ahead 30 degrees)

Standard type joint couplings are required. See [Materials I.M. 441](#).

- ① See [DR-201](#).
- ② See [DR-203](#).
- ③ See [DR-121](#) and [DR-122](#).
- ④ Optional "D" section only when specified in the tabulation.

Possible Tabulation:  
 104-3

<b>IOWA DOT</b>	REVISION
	New   04-21-15
<b>STANDARD ROAD PLAN</b>	<b>DR-641</b>
SHEET 1 of 1	
REVISIONS: New. Replaces Detail 1501.	
 <small>APPROVED BY DESIGN METHODS ENGINEER</small>	
<b>CONCRETE/CORRUGATED PIPE        CULVERT LETDOWN STRUCTURE        WITH METAL APRON</b>	