## (ADDITIONAL PCDIP TH PER VERTICAL FOOT) SEE NOTE 2 SEE NOTE 2 (TYP. MÍN. CLR. (TYP.) ΑV <u>AV</u> INVERT SEE NOTE 13 SEE NOTE 10, SEE NOTE 10 SECTION A-A SECTION B-B RISER OPTION RISER OPTION CLR. MÍN. CLR. INVERT SEE NOTE 13 ΔV SEE NOTE 10 SEE NOTE SECTION B-B SECTION A-A STANDARD DEPTH INLET STANDARD DEPTH INLET REINFORCING STEEL VALUES LISTED IN "SCHEDULE OF DIMENSIONS AND REINFORCING STEEL" ARE MINIMUM VALUES. STRUCTURES THAT PROVIDE VALUES LARGER THAN THOSE

SHOWN WILL BE CONSIDERED ACCEPTABLE.

## **DESIGN DATA**

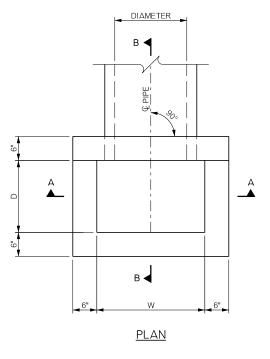
MATERIAL:

CLASS A CONCRETE REINFORCING STEEL f'c = 4 KSIfy = 60 KSI

LOADING: HL-93

DESIGN:

AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS, 7TH EDITION ASTM C890



## **GENERAL NOTES**

- 1. ALL CONSTRUCTION AND MATERIAL REQUIREMENTS SHALL BE IN ACCORDANCE WITH THE 2019 ODOT STANDARD SPECIFICATIONS.
- 2. FOR DETAILS OF GRATES SEE ROADWAY STANDARD CDIP-2. COST OF GRATE SHALL BE INCLUDED IN THE COST OF THE STRUCTURE.
- 3. THERE SHALL BE A MINIMUM VERTICAL DISTANCE OF 6 INCHES BETWEEN AN
- 4. PROVIDE LIFTING DEVICES IN CONFORMANCE WITH THE MANUFACTURER'S
- 5. PROVIDE GRADE 60 REINFORCING STEEL CONFORMING TO ASTM A615 OR EQUIVALENT AREA OF WELDED WIRE REINFORCING CONFORMING TO ASTM A1064.
- 6. PROVIDE A MINIMUM CLEAR COVER OF 11/2 INCHES TO REINFORCING STEEL.
- 7. IF THE MANUFACTURER ELECTS TO USE WALLS OR SLABS WITH A THICKNESS OF 8 INCHES OR GREATER, THE WALLS OR SLABS WILL REQUIRE A SECONDARY LAYER OF REINFORCING STEEL. PROVIDE AN AREA OF REINFORCING STEEL EQUAL TO 0.11 IN<sup>2</sup>/FT EACH WAY IN THE SECONDARY LAYER.
- 8. MAXIMUM OPENING DIAMETER SHALL BE 4 INCHES LARGER THAN OUTSIDE
- 9. DO NOT GROUT RUBBER GASKET JOINTS WITHOUT THE MANUFACTURER'S
- 10. THE FOUNDATION SHALL BE STABILIZED OR REMOVED AND REPLACED WITH FIRM AND STABLE FOUNDATION MATERIAL. A MINIMUM 3 INCH THICK LEVELING COURSE SHALL BE PROVIDED BELOW THE BASE AREA OF THE INLET AND EXTEND 6 INCHES BEYOND THE BASE AREA. THE LEVELING COURSE SHALL BE CONSTRUCTED WITH AGGREGATE BASE TYPE A. COSTS ASSOCIATED WITH THE FOUNDATION AND LEVELING COURSE SHALL BE INCLUDED IN THE PRICE BID OF THE STRUCTURE
- 11. FLEXURAL REINFORCING STEEL SHALL NOT EXCEED SPACING OF 6 INCHES, CENTER TO CENTER.
- 12. ARCH PIPES AND HORIZONTAL ELLIPTICAL PIPES MAY BE USED INSTEAD OF ROUND PIPES AT THE DISCRETION OF THE ENGINEER.
- 13. THE INVERT SHALL BE PLACED AS A SECONDARY POUR TO A HEIGHT OF ONE-QUARTER THE PIPE DIAMETER. PROVIDE A MINIMUM SLOPE OF 4% WITH POSITIVE DRAINAGE TO THE OUTLET. ALL COST OF THE INVERT SHALL BE INCLUDED IN THE COST OF THE STRUCTURE. INVERT IS TYPICALLY CLASS C CONCRETE.
- 14. SEAL JOINTS BETWEEN SUBASSEMBLIES AND AT EACH ENTRANCE OR EXIT CONDUIT WITH PREFORMED OR BULK MASTIC IN CONFORMANCE WITH THE MANUFACTURER'S RECOMMENDATIONS. PROVIDE A SOIL-TIGHT CONNECTION AND SEAL IN ACCORDANCE WITH SECTION 611 OF THE STANDARD SPECIFICATIONS. JOINT SEALING SHALL BE INCLUDED IN THE COST OF THE INLET.
- 15. MAXIMUM DEPTH OF DROP INLETS IS 15 FEET. ANY DROP INLET WHICH IS GREATER THAN 15 FEET IN DEPTH SHALL BE A SPECIAL DESIGN AS SHOWN IN THE PLANS AND SHOULD NOT FOLLOW THIS STANDARD.
- 16. ALL MATERIALS AND LABOR INCLUDED IN COST OF PRECAST INLET.
- 17. EACH INLET DESIGN NUMBER HAS A STANDARD DEPTH, TO WHICH THEY SHOULD BE MADE. ANY ADDITIONAL DEPTH ABOVE THE STANDARD DEPTH SHALL BE PAID AS "ADD'L DEPTH IN PRECAST INLET (CDI RCP DES. ▲)".

|               | SCHEDULE OF DIMENSIONS AND REINFORCING STEEL |                   |       |       |                              |        |         |                               |       |       |       |       |       |        |         |         |         |         |                                  |                         |
|---------------|--|-------------------|-------|-------|------------------------------|--------|---------|-------------------------------|-------|-------|-------|-------|-------|--------|---------|---------|---------|---------|----------------------------------|-------------------------|
| DESIGN<br>NO. | DIAMETER                                     | STANDARD<br>DEPTH | D     | w     | A BARS (IN <sup>2</sup> /FT) |        |         | AH BARS (IN <sup>2</sup> /FT) |       |       |       |       |       |        |         |         |         |         | AV BARS<br>(IN <sup>2</sup> /FT) |                         |
|               |  |                   |       |       | DEPTH                        |        |         | DEPTH                         |       |       |       |       |       |        |         |         |         |         | ALL                              |                         |
|               |  |                   |       |       | UP TO                        | 6'-10' | 11'-15' | UP TO                         | 4'-5' | 5'-6' | 6'-7' | 7'-8' | 8'-9' | 9'-10' | 10'-11' | 11'-12' | 12'-13' | 13'-14' | 14'-15'                          | ALL<br>DEPTHS<br>TO 15' |
| 1A            | 18"  | 3'-10"            | 2'-0" | 3'-0" | 0.16                         | 0.19   | 0.22    | 0.11                          | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11   | 0.11    | 0.11    | 0.12    | 0.12    | 0.13                             | 0.11                    |
| 1B            | 10   |                   | 3'-0" | 3'-0" | 0.17                         | 0.20   | 0.25    | 0.11                          | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11   | 0.11    | 0.11    | 0.12    | 0.12    | 0.13                             | 0.11                    |
| 2             | 24"  | 3'-10"            | 2'-0" | 4'-0" | 0.16                         | 0.18   | 0.22    | 0.11                          | 0.11  | 0.11  | 0.12  | 0.13  | 0.14  | 0.15   | 0.17    | 0.18    | 0.19    | 0.21    | 0.22                             | 0.11                    |
| 3             | 30"  | 4'-5"             | 3'-0" | 5'-0" | 0.19                         | 0.23   | 0.30    | 0.12                          | 0.13  | 0.15  | 0.17  | 0.19  | 0.21  | 0.23   | 0.25    | 0.27    | 0.29    | 0.31    | 0.33                             | 0.11                    |
| 4             | 36"  | 5'-0"             | 3'-0" | 5'-0" | 0.19                         | 0.23   | 0.30    | 0.12                          | 0.13  | 0.15  | 0.17  | 0.19  | 0.21  | 0.23   | 0.25    | 0.27    | 0.29    | 0.31    | 0.33                             | 0.11                    |

| BASIS OF PAYMENT |   |      |  |  |  |  |  |
|------------------|---|------|--|--|--|--|--|
| ITEM NO.         | ITEM  | UNIT |  |  |  |  |  |
| 611(G)           | PRECAST INLET (CDI RCP DES. 🛦 )                             | EA.  |  |  |  |  |  |
| 611(H)           | ADD'L DEPTH IN PRECAST INLET (CDI RCP DES. $lacktriangle$ ) | VF   |  |  |  |  |  |

▲ SPECIFY INLET DESIGN NUMBER.

APPROVED BY ROADWAY ENGINEER

\_DATE: 4/1/2025

ROADWAY DESIGN DIVISION STANDARD



2019 SPECIFICATIONS PCDIP

R-55