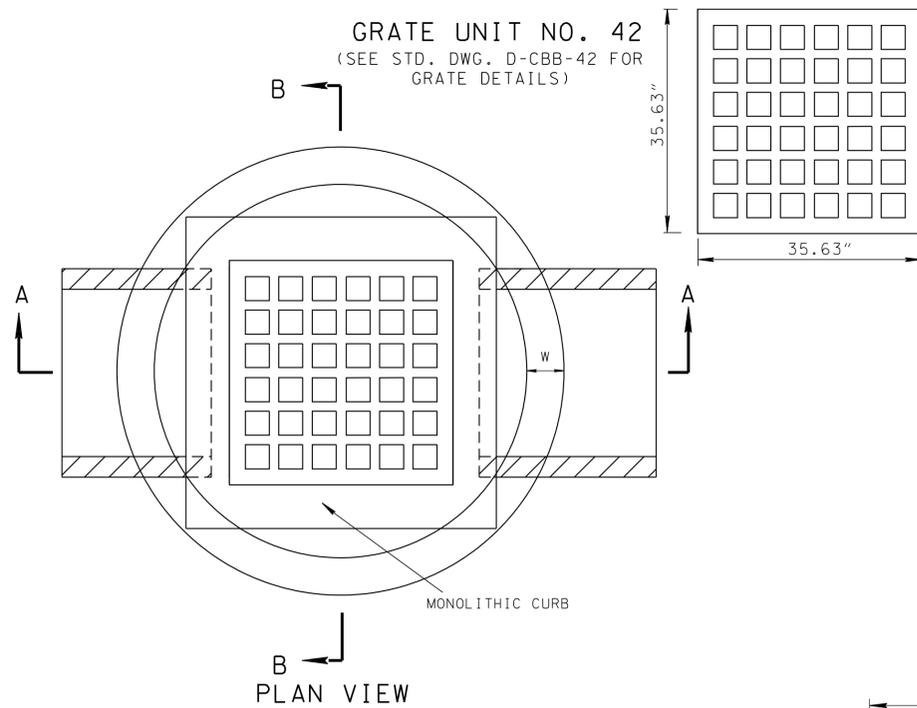


GRATE UNIT NO. 42  
(SEE STD. DWG. D-CBB-42 FOR  
GRATE DETAILS)



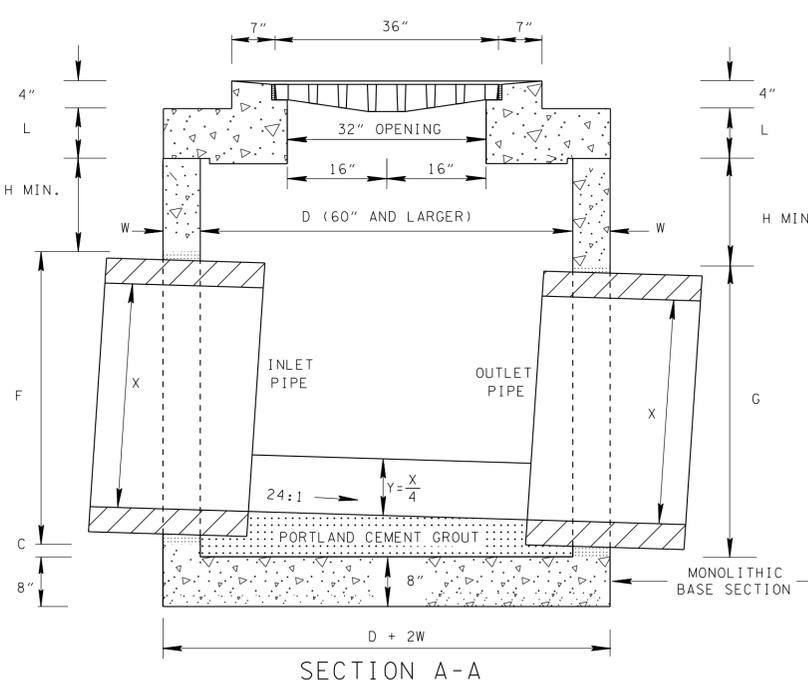
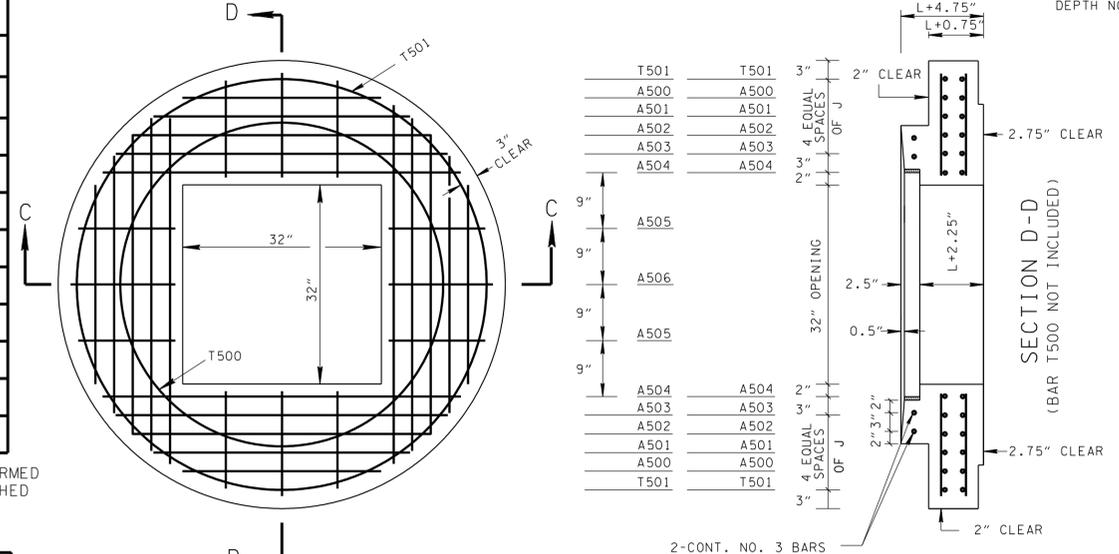
PLAN VIEW

INSIDE DIAMETER (X) OF PIPE (INCHES)	DIAMETER OF CUT-OUT HOLES F & G - (INCHES)		
	CONCRETE PIPE	CORRUGATED METAL PIPE	POLYETHYLENE PIPE
18	26	21	24
24	32	27	31
30	40	33	39
36	47	40	45
42	54	46	50
48	61	52	56
54	68	58	—
60	75	64	—
66	82	70	—

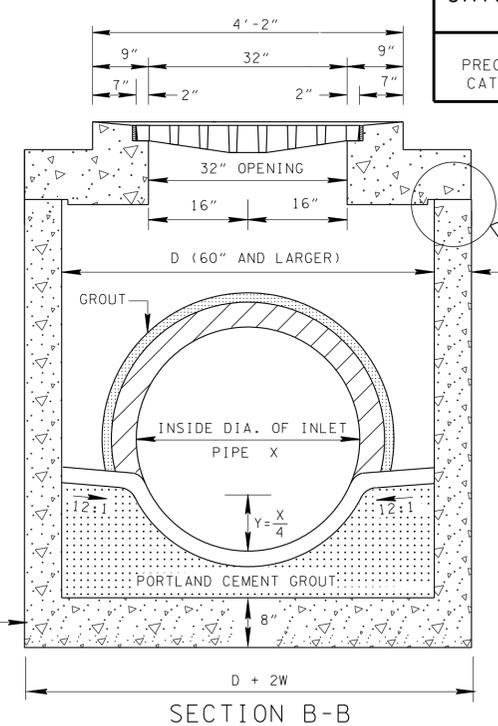
CUT-OUT HOLES FOR PRECAST STRUCTURES TO BE CORED OR FORMED IN ORDER TO OBTAIN A SMOOTH EDGED HOLE. SCORED OR ETCHED HOLES WITH REINFORCING STEEL LEFT UNCUT WILL NOT BE PERMITTED.

**CATCH BASIN MAXIMUM DEPTH NOTE**  
MAXIMUM DEPTH FOR PRECAST CONCRETE CIRCULAR CATCH BASINS IS 40.00'.

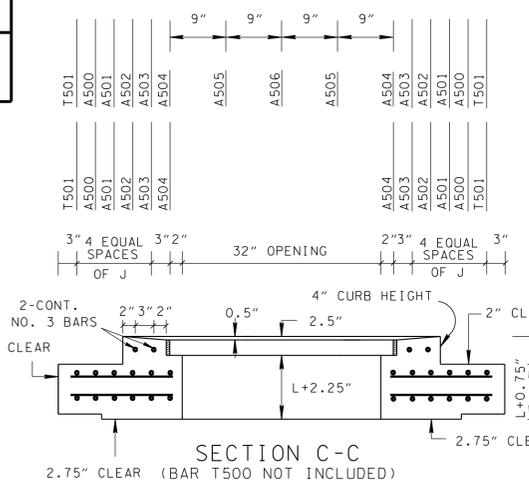
LID REINFORCING



SECTION A-A



SECTION B-B



SECTION C-C  
2.75" CLEAR (BAR T500 NOT INCLUDED)

INSIDE DIAMETER (X) OF PIPE (INCHES)	MINIMUM DEPTH - (FEET)		
	CONCRETE PIPE	CORRUGATED METAL PIPE	POLYETHYLENE PIPE
18	3.71	3.50	3.63
24	4.21	4.00	4.17
30	4.79	4.50	4.75
36	5.33	5.04	5.25
42	5.88	5.54	5.71
48	6.42	6.04	6.21
54	6.96	6.54	—
60	7.50	7.04	—
66	8.04	7.54	—

CATCH BASIN MINIMUM DEPTH TABLE FOR 60" INSIDE DIAMETER CATCH BASIN

INSIDE DIA. OF CATCH BASIN (INCHES)	OUTSIDE DIA. OF LID (INCHES)	DIMENSION J (INCHES)
60	72	3.00
72	86	4.75
84	100	6.50
96	114	8.25

DIAMETER FOR T500 REINFORCING BARS EQUAL 52 INCHES.  
DIAMETER FOR T501 REINFORCING BARS EQUAL OUTSIDE DIAMETER OF LID MINUS 6 INCHES.

INSIDE DIA. OF CATCH BASIN D (INCHES)	WALL THICKNESS W (INCHES)	LID THICKNESS L (INCHES)	OUTSIDE DIA. OF CATCH BASIN D + 2W (INCHES)	MAX. INLET OR OUTLET CONC. PIPE SIZE - STR. (INCHES)	MAX. INLET OR OUTLET CONC. PIPE SIZE - 90° (INCHES)	DIMENSION	
						C (INCHES)	H (INCHES)
60	6	8	72	36	24	2.5	8
72	7	9	86	48	30	3.0	8
84	8	9	100	60	36	3.5	12
96	9	10	114	66	42	4.0	12

CATCH BASIN DIMENSIONS

- GENERAL NOTES**
- (A) ALL PRECAST ELEMENTS TO MEET ASTM C478 (CURRENT EDITION) AND AASHTO M199 (CURRENT EDITION) UNLESS SUPERSEDED BY THIS DRAWING.  
CONCRETE:  $F_c = 4,000$  POUNDS PER SQUARE INCH AT 28 DAYS  
REINFORCING STEEL: ASTM A615,  $F_y = 60,000$  POUNDS PER SQUARE INCH  
ALL REINFORCING IS TO BE INSTALLED AS DETAILED ON THIS DRAWING.
  - (B) PRECAST CATCH BASIN UNITS WHICH ARE DAMAGED DURING SHIPMENT OR INSTALLATION WILL BE REJECTED. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO REPLACE DAMAGED CATCH BASIN UNITS AT HIS OWN EXPENSE.
  - (C) ADDITIONAL REINFORCING STEEL NECESSARY ABOVE THE CORED OR FORMED CUT-OUT HOLES TO MAINTAIN THE INTEGRITY OF THE STRUCTURE DURING HANDLING AND PLACEMENT SHALL BE THE RESPONSIBILITY OF THE FABRICATOR.
  - (D) APPROPRIATE SIZING AND LOCATION OF LIFTING DEVICES SHALL BE THE RESPONSIBILITY OF THE FABRICATOR TO ASSURE BALANCED HANDLING DURING INSTALLATION OF THE PRECAST CATCH BASIN.
  - (E) THE CONTRACTOR IS TO PATCH ALL LIFTING DEVICE HOLES AND PLACE A MINIMUM OF ONE (1) INCH OF COVER OVER THE HARDWARE OF THESE DEVICES ON BOTH TOP AND BOTTOM SURFACES.
  - (F) INVERT ELEVATIONS ARE TO BE ADJUSTED AS DIRECTED BY THE ENGINEER IN ORDER TO ACCOMMODATE INLET AND OUTLET PIPES.
  - (G) SEE STANDARD DRAWING D-CBB-42 FOR DETAILS REGARDING CAST IRON GRATE.
  - (H) PAYMENT FOR CATCH BASIN WILL BE MADE UNDER ITEM NUMBERS 611-42.02 CATCH BASINS, TYPE 42, > 4'-8" DEPTH THROUGH 611-42.07, CATCH BASINS, TYPE 42, > 24'-28' DEPTH PER EACH. PAYMENT FOR CATCH BASINS DEEPER THAN 28' WILL BE MADE UNDER ITEM NUMBER 611-42.08, CATCH BASINS, TYPE 42, \_\_\_' - \_\_\_' DEPTH PER EACH.

- ① DEPTH MEASUREMENT MADE FROM TOP OF CURB TO OUTLET FLOW ELEVATION BASED ON INLET AND OUTLET PIPES BEING THE SAME DIAMETER, IF OUTLET PIPE IS GREATER ADJUSTMENT IN DEPTHS MUST BE MADE TO ACCOMMODATE THIS SITUATION.
- ② MINIMUM DEPTH TO BE REDUCED BY DIMENSION "C" WHERE ONLY OUTLET PIPE EXISTS.
- ③ TO DETERMINE FLOOR OF CATCH BASIN ELEVATION, WHEN INLET AND OUTLET PIPES ARE THE SAME SIZE, ADD PIPE WALL THICKNESS PLUS 1.5" TO THE ABOVE MINIMUM DEPTHS.
- ④ IF 72" INSIDE DIAMETER CATCH BASIN IS USED, ADD 0.13' TO ALL THE ABOVE MINIMUM DEPTHS. IF 84" INSIDE DIAMETER CATCH BASIN IS USED, ADD 0.50' TO ALL THE ABOVE MINIMUM DEPTHS. IF 96" INSIDE DIAMETER CATCH BASIN IS USED, ADD 0.63' TO ALL THE ABOVE MINIMUM DEPTHS.

MINOR REVISION -- FHWA APPROVAL NOT REQUIRED.

STATE OF TENNESSEE  
DEPARTMENT OF TRANSPORTATION  
**STANDARD PRECAST CIRCULAR NO. 42 CATCH BASIN**  
10-26-97 D-CB-42RB