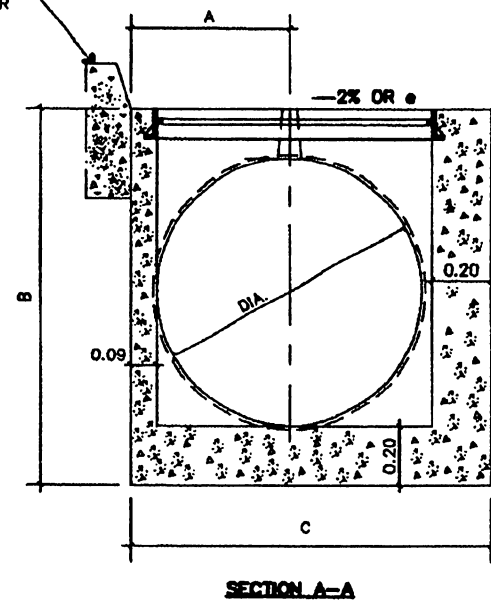


MANHOLE DIMENSIONS FOR 18", 24", 30" AND 36" FOR SLOTTED AND OUTLET PIPES

| DIA | 18" | 24" | 30" | 36" |
|-----|---------|-------------|-------------|---------|
| A | 0.32 | 0.39 | 0.47 | 0.55 |
| B | 0.81 | 0.96 | 1.11 | 1.26 |
| C | 0.75 | 0.90 | 1.05 | 1.20 |
| D | 0.46 | 0.61 | 0.76 | 0.91 |
| E | 18" SQ. | 22" SQ. | 30" SQ. | 36" SQ. |
| F | 24" SQ. | 28" SQ. | 36" SQ. | 42" SQ. |
| G | 20" SQ. | 23-3/4" SQ. | 31-3/4" SQ. | 37" SQ. |

EXISTING CURB OR CONCRETE BARRIER



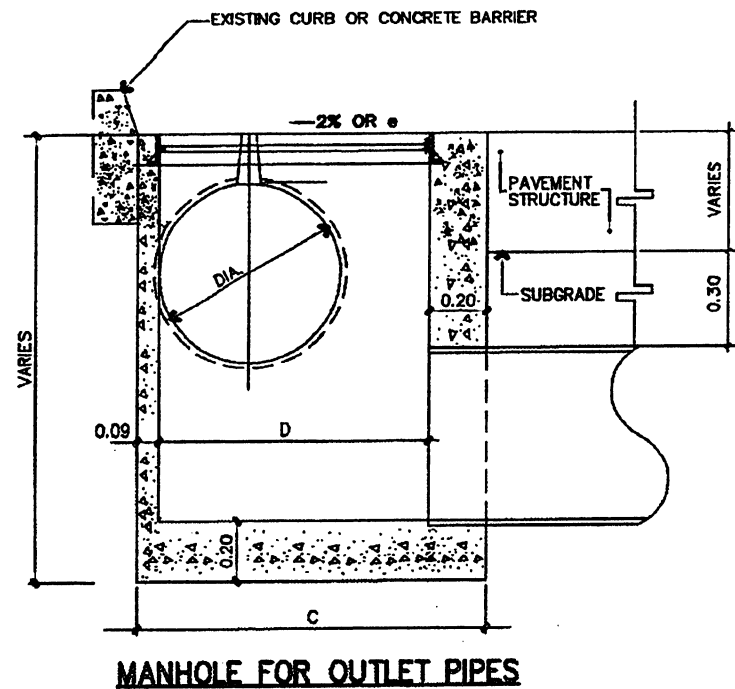
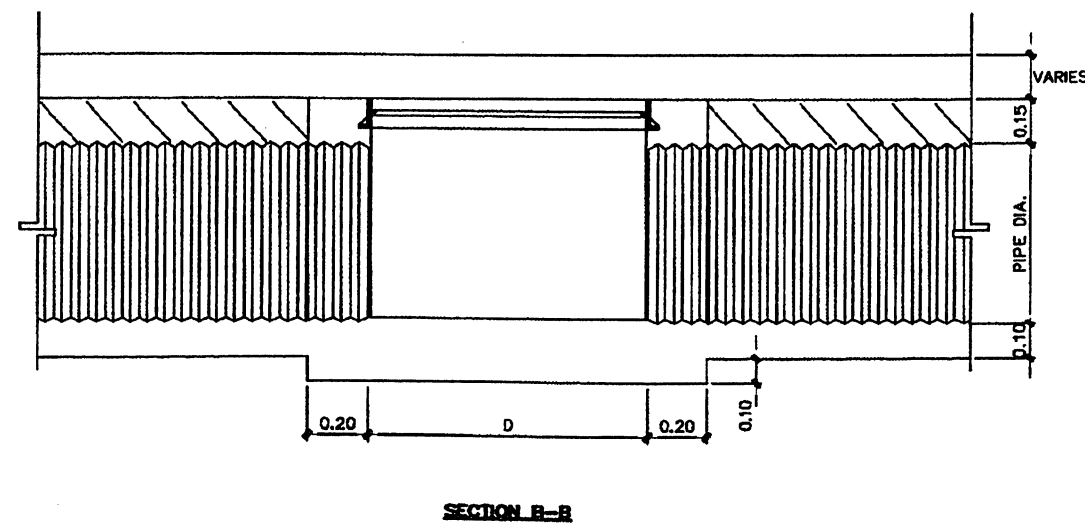
CAST IRON COVER AND FRAME FOR MANHOLE
NOT TO SCALE

LEGEND:

e = % SUPER ELEVATION

GENERAL NOTES:

- STRUCTURAL CONCRETE SHALL BE CLASS A.
- REINFORCING STEEL SHALL BE # 4 AT 0.30 EACH WAY ALL FACES, GRADE 60, AASHTO M-31 OR M-31M.
- MINIMUM COVER FOR OUTLET PIPES FROM SUBGRADE ELEVATION SHALL BE 0.30.
- IF AN INCREASE OF PIPE DIAMETER IS REQUIRED IN THE LINE, THE DIMENSION B SHALL CONFORM TO THAT OF THE LARGER DIAMETER PIPE.
- CONVERSION FACTOR 2.54 CENTIMETERS = 1 INCH.
- ITEMS MANUFACTURED WITH DIMENSIONS IN ENGLISH UNIT EQUIVALENTS WILL BE ACCEPTED.
- ALL GRAY CAST IRON PRODUCTS USED IN THE "DR" SERIES OF THE STANDARD DRAWINGS MUST BE FROM APPROVED MANUFACTURERS AND THE APPROVED PRODUCTS IDENTIFIED BY PRODUCT NUMBER OR CATALOG NUMBER LISTED IN THE APPROVED LIST OF MANUFACTURERS AND PRODUCTS CONTAINED IN THE FIRST PAGE OF THE "DR" SERIES.



EFFECTIVE DATE: DECEMBER 1998

COMMONWEALTH OF PUERTO RICO
DEPARTMENT OF TRANSPORTATION
AND PUBLIC WORKS
HIGHWAY AND TRANSPORTATION AUTHORITY

**DRAINAGE
MANHOLE FOR SLOTTED
PIPE ON EXISTING
CONDITIONS**
FROM 18"Ø TO 36"Ø

RECOMMENDED BY: *[Signature]*
DESIGN AREA DIRECTOR
DATE: 12-7-98

APPROVED BY: *[Signature]*
EXECUTIVE DIRECTOR
DATE: 12-7-98

APPROVED BY: *[Signature]*
DIV. ADM. FHWA-PR DIVISION
DATE: 12-7-98

| DATE | REVISION | BY |
|---------|--------------------------|-----|
| 12-1998 | DELETE NOTES, ADD NOTE 7 | LV. |

STD. DR
DWG. 5 OF 40