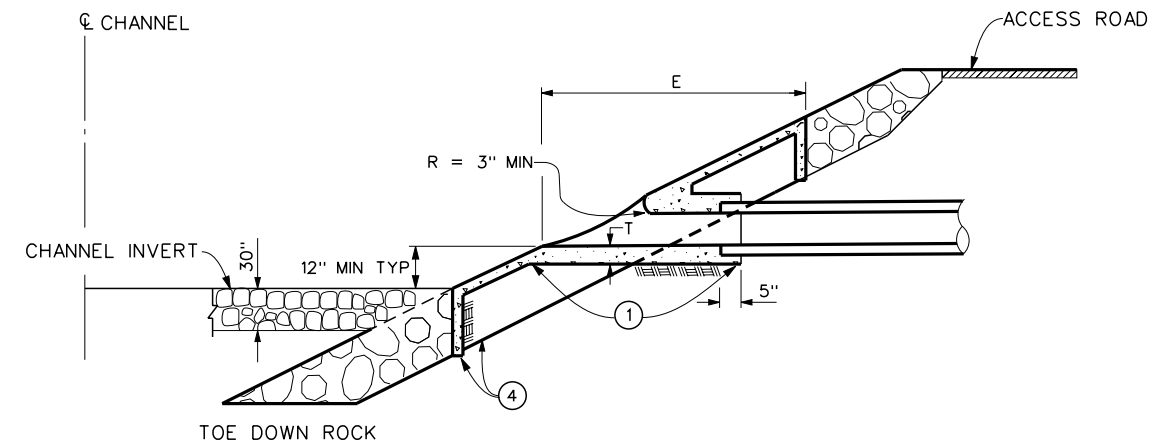
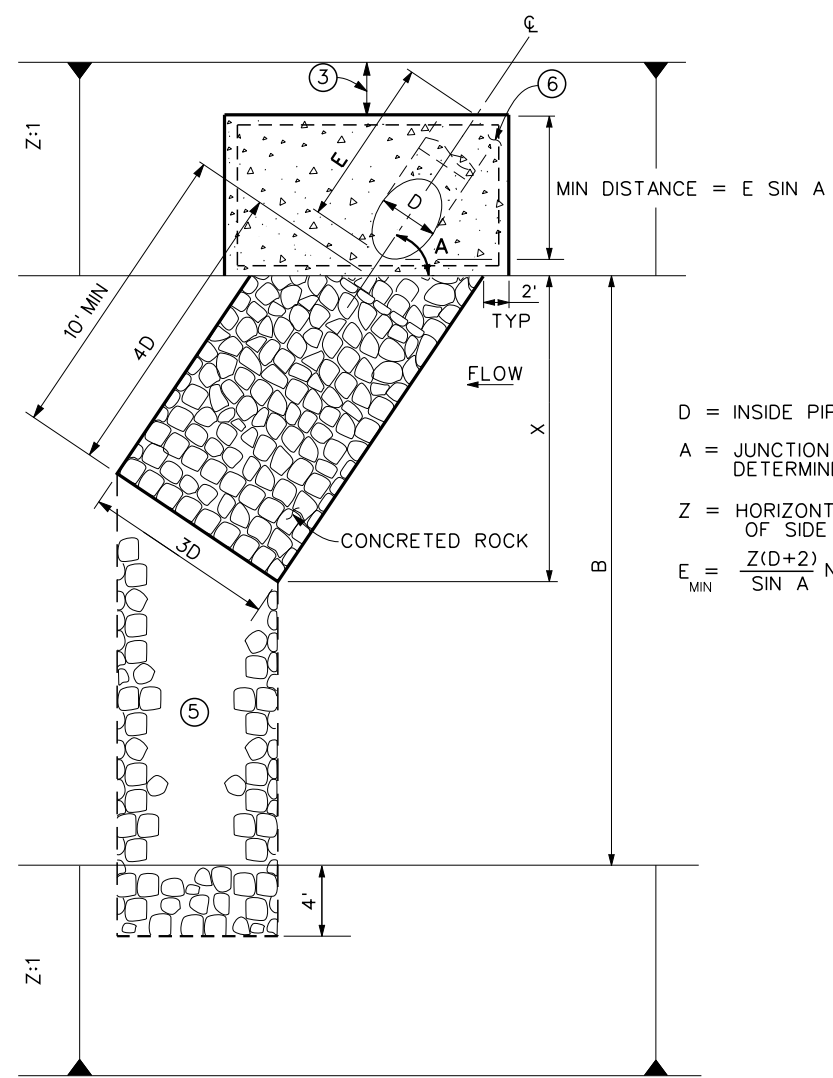


UNLINED CHANNEL CONDITION
NTS

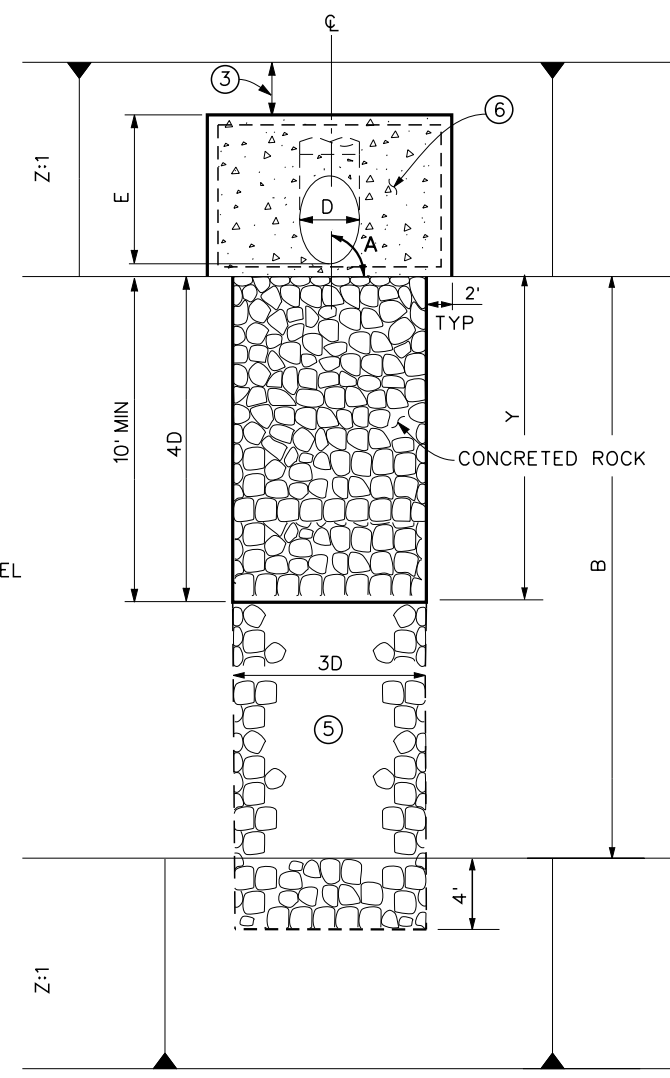


ROCK LINED CHANNEL CONDITION
NTS



ROCK ENERGY DISSIPATOR
NTS

D = INSIDE PIPE DIAMETER (FT)
 A = JUNCTION ANGLE TO BE DETERMINED BY ENGINEER
 Z = HORIZONTAL COMPONENT OF SIDE SLOPE RATIO
 $E_{MIN} = \frac{Z(D+2)}{\sin A}$ NOT TO EXCEED TOP OF CHANNEL



ROCK ENERGY DISSIPATOR
(RIGHT ANGLE JUNCTION)
NTS

NOTES:

- ① JUNCTION STRUCTURE NO. 8 PER STD DWG JS231 OR JS232 AND MODIFIED AS SHOWN HEREON BY ADDING CUT-OFF WALLS AROUND THE ENTIRE PERIMETER OF THE SIDE SLOPE CONCRETE. ALL REQUIRED VALUES FOR DATA (D, L, C, ELEV "R", ELEV "S", ANGLE "A", STA "X") SHALL BE SHOWN ON THE PLAN AND PROFILE.
- ② ROCK ENERGY DISSIPATOR SHALL BE 30 INCH THICK, 1/4 TON CONCRETED (GROUTED) ROCK PER SECTION 72 OF THE STATE STANDARD SPECIFICATIONS, EXCEPT THAT TOTAL PENETRATION OF THE ROCK BY THE CONCRETE IS REQUIRED AND THE ROCK SURFACE SHALL PROJECT 9 TO 12 INCHES FROM THE CONCRETE SURFACE. NO ROCK ENERGY DISSIPATOR REQUIRED WHEN LATERAL Q < 10 CFS.
- ③ MAY EXTEND CONCRETE TO TOP OF SLOPE FOR ROCK LINED CHANNEL.
- ④ CUT-OFF WALL DEPTH TO MATCH ADJACENT ROCK THICKNESS - 24 INCH MIN.
- ⑤ FOR UNLINED CHANNELS, IF "X" OR "Y" IS GREATER THAN OR EQUAL TO B/2, EXTEND CONCRETED ROCK ACROSS ENTIRE BASE WIDTH OF CHANNEL AND 4- FEET UP THE OPPOSITE SLOPE, OR AS APPROVED BY THE ENGINEER.
- ⑥ SLOPE PAVING AND CUT-OFF WALL STRUCTURAL CONCRETE PER STD DWG CH326.

RIVERSIDE COUNTY FLOOD CONTROL AND WATER CONSERVATION DISTRICT	
RECOMMENDED FOR APPROVAL BY: <i>[Signature]</i> CHIEF, DESIGN & CONSTRUCTION DATE: OCTOBER 2009	APPROVED BY: <i>[Signature]</i> CHIEF ENGINEER DATE: OCTOBER 2009
R.E. No. 44684	R.C.E. No. 32336

JUNCTION STRUCTURE
NO. 8
(SOFT-BOTTOM CHANNEL)
STANDARD DRAWING NUMBER JS233