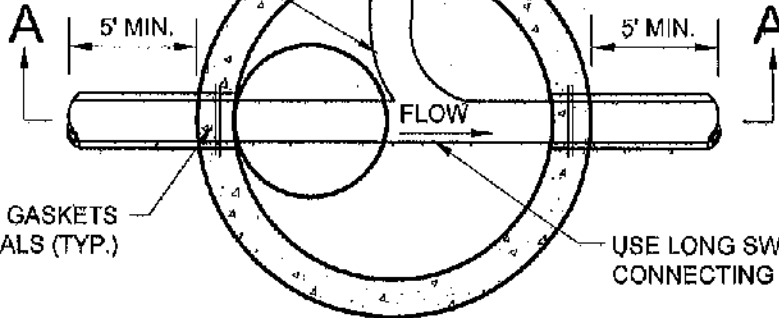


CITY OF SAN BUENAVENTURA		PUBLIC WORKS DEPARTMENT ENGINEERING DIVISION	
STANDARD MANHOLE NO. 1 DEPTH LESS THAN 5 FEET			STD. DET. NO. 201
APPROVED BY: <i>[Signature]</i> WASTEWATER MANAGER	APPROVED BY: <i>[Signature]</i> CITY ENGINEER R.C.E. 37084	DATE <u>7-19-12</u>	SHEET 1 of 4

SEE TYPICAL TROUGH SECTION SHEET 4.

EXTEND SEWER MAIN PIPE CONTINUOUS THROUGH CHANNEL 5' BEYOND MANHOLE TYP. ALL. NO MECHANICAL FITTINGS WITHIN 5' FROM M.H.



INSTALL WATER STOPS, GASKETS OR RUBBER RING SEALS (TYP.)

USE LONG SWEEP WYE FOR CONNECTING LATERAL TO MAIN

PLAN

24" FRAME AND COVER.

ASPHALT AROUND MANHOLE TO ACHIEVE 2" ASPHALT CONCRETE MIN. OVER 10" MIN. CLASS 560-C-3250 CONCRETE COLLAR

GRADE RINGS AS REQUIRED, 12" MAX.

NOTES:

1. FOR PIPE CONNECTIONS 12" OR LARGER, USE 60" MANHOLE.
2. FOR GENERAL NOTES, SEE SHEET 4.

CLASS C MORTAR JOINT

24" MIN

36"

SEE NOTE 1
48" OR 60"

5' MIN. TO 10' MAX.

VARIES PER PLAN

EXTEND BASE 24" BEYOND SHAFT. FOR MH DEPTH > 8' & 12" BEYOND FOR MH DEPTH < 8', TYP.

INSTALL WATER STOPS, GASKETS, OR RUBBER RING SEALS, TYP.

4 BARS IN BASE SLAB 12" O.C. EACH WAY

CLASS 560-C-3250 CONCRETE BASE

OVEREXCAVATE MIN. 24". REPLACE WITH 1" MIN. CRUSHED ROCK.

3" CLEARANCE

24" MIN DEPTH FOR MH 8' DEEP & OVER. 12" MIN FOR MH < 8' DEEP. EXTEND CONCRETE 24" BEYOND MANHOLE OUTSIDE WALL.

SECTION A-A

CITY OF SAN BUENAVENTURA

PUBLIC WORKS DEPARTMENT
ENGINEERING DIVISION

STANDARD MANHOLE NO. 2

DEPTH 5 FEET TO 10 FEET

STD. DET. NO.

201

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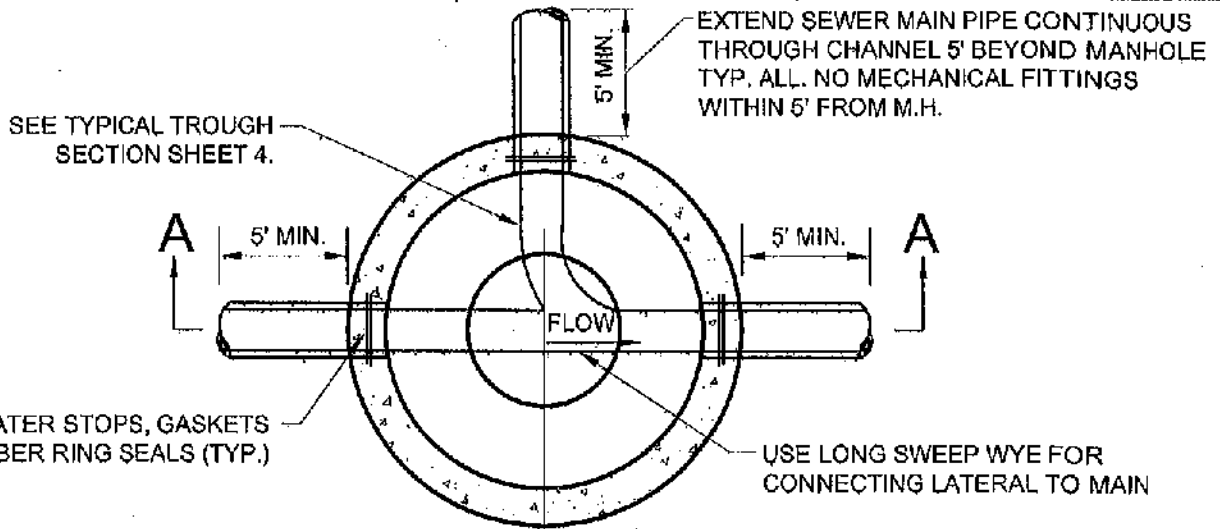
WASTEWATER MANAGER

APPROVED BY:

CITY ENGINEER R.C.E. 37084

DATE 7-19-12

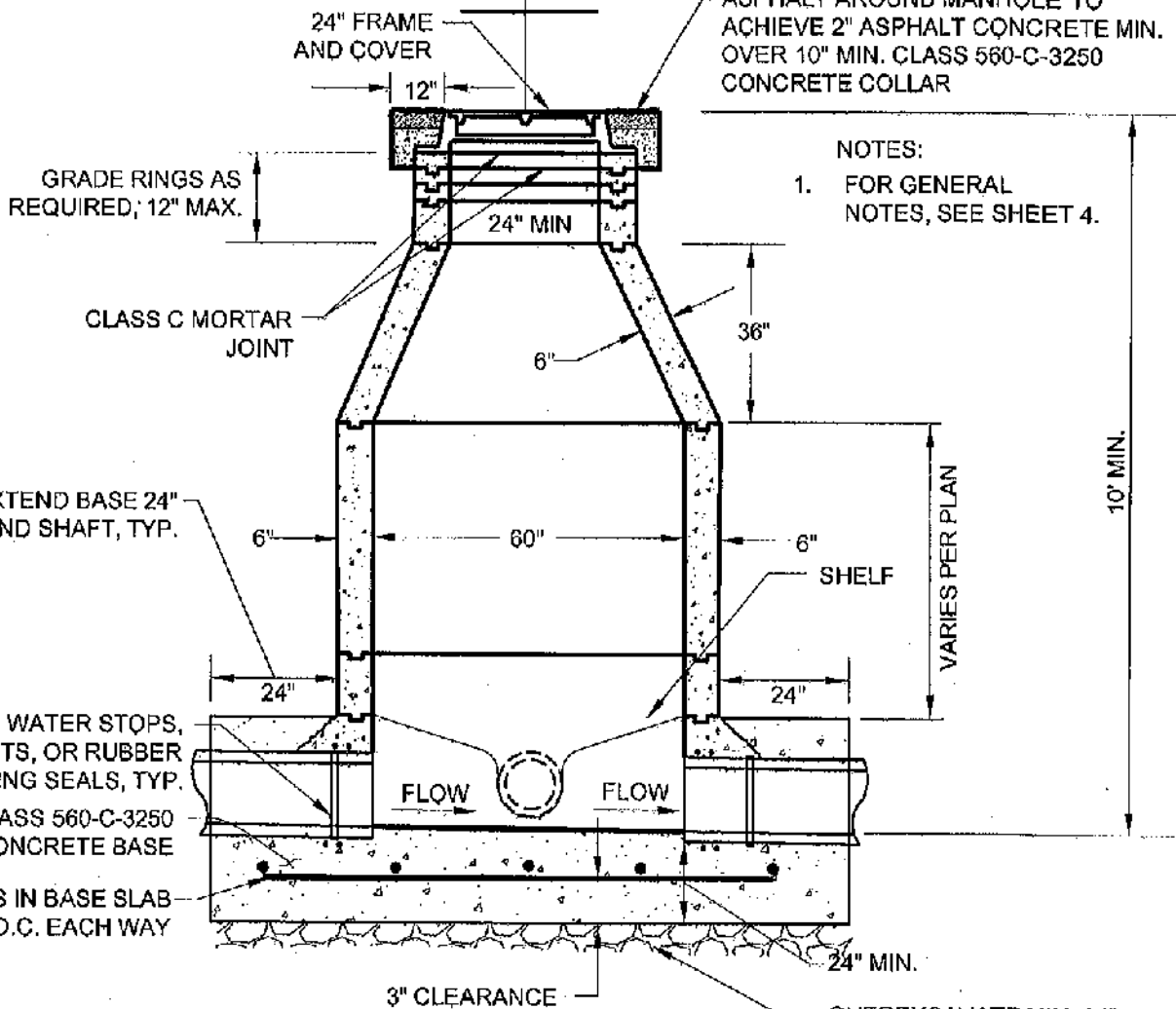
SHEET
2 of 4



PLAN

INSTALL WATER STOPS, GASKETS OR RUBBER RING SEALS (TYP.)

USE LONG SWEEP WYE FOR CONNECTING LATERAL TO MAIN



- NOTES:
1. FOR GENERAL NOTES, SEE SHEET 4.

SECTION A-A

CITY OF SAN BUENAVENTURA

PUBLIC WORKS DEPARTMENT
ENGINEERING DIVISION

STANDARD MANHOLE NO. 3
DEPTH GREATER THAN 10 FEET

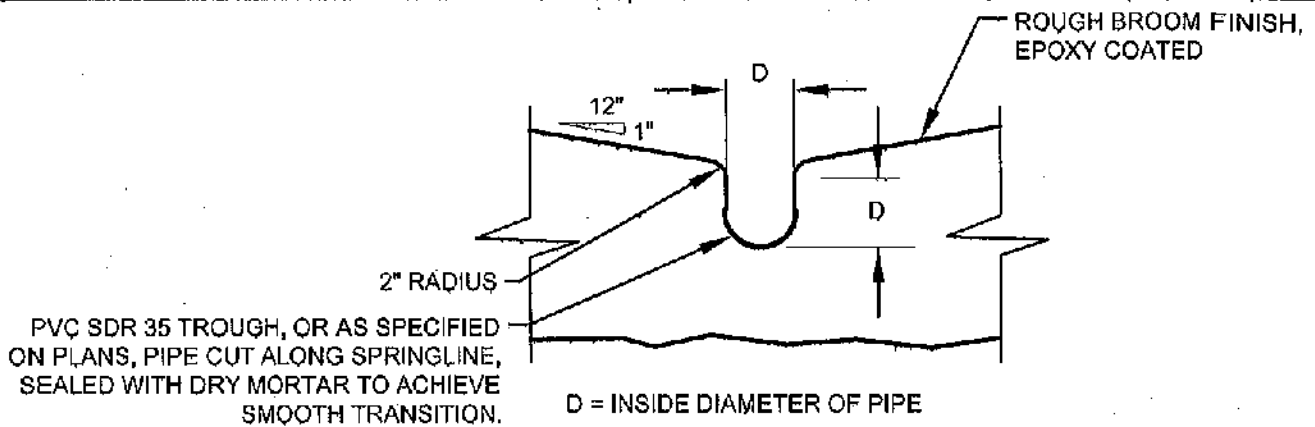
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201

APPROVED BY: *[Signature]*
WASTEWATER MANAGER

APPROVED BY: *[Signature]*
CITY ENGINEER R.C.E. 37064

DATE 7-19-12

SHEET
3 of 4



TYPICAL TROUGH SECTION

GENERAL MANHOLE NOTES

1. MANHOLE SECTIONS SHALL BE PRECAST UNREINFORCED CONCRETE HAVING A MINIMUM THICKNESS OF 8".
2. REINFORCING STEEL SHALL BE #4 CONFORMING TO ASTM A615, GRADE 40. PLACE 3" CLEAR FROM FACE OF CONCRETE.
3. CONE SHALL BE RAISED WHEN GRADE RINGS EXCEED 12".
4. JOINTS SHALL CONSIST OF CLASS C CEMENT MORTAR.
5. ALL CONCRETE SHALL BE 560-C-3250.
6. "JIFFY" RINGS SHALL NOT BE ALLOWED.
7. ALL MANHOLE INTERIOR SURFACES SHALL BE LINED WITH PVC (T-LOCK), INCLUDING BARREL, CONE, AND GRADE RINGS. CHANNELS SHALL BE PVC, UNLESS OTHERWISE APPROVED BY THE CITY ENGINEER. THE SHELF SHALL BE COATED WITH AN APPROVED EPOXY COATING.
8. MANHOLE BOTTOMS SHALL BE CONSTRUCTED WITH THE TOP OF PIPE CUT OUT THROUGH THE INSIDE OF THE MANHOLE TO PROVIDE AN OPEN SPACE FOR THE CCTV CAMERA.
9. ALL MANHOLE FRAMES AND COVERS SHALL BE PAMREX-24 WITH STAINLESS STEEL LOCKING ASSEMBLY (MH LOCK) OR EQUAL APPROVED IN ADVANCE BY THE CITY ENGINEER. IN PEDESTRIAN AREAS AND CROSSWALKS, MANHOLE FRAMES AND COVERS SHALL BE ALHAMBRA #1170 OR APPROVED EQUAL BY THE CITY ENGINEER. ALL SEWER MANHOLE COVERS SHALL HAVE A 1-1/2 INCH "S" CAST IN THE CENTER. AN INNER PAN COVER SHALL BE INSTALLED WHERE SHOWN ON THE PLANS.

CITY OF SAN BUENAVENTURA

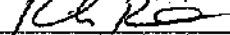
PUBLIC WORKS DEPARTMENT
ENGINEERING DIVISION

STANDARD MANHOLE DETAILS & NOTES

STD. DET. NO.

201

APPROVED BY: 
WASTEWATER MANAGER

APPROVED BY: 
CITY ENGINEER R.C.E. 37064

DATE 7-19-12

SHEET
4 of 4