

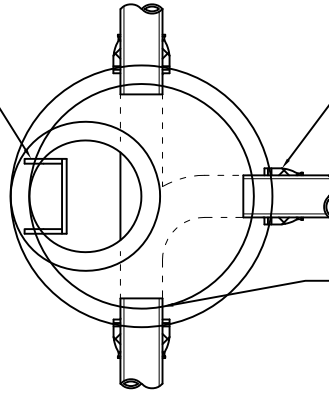
PLASTIC MANHOLE STEPS 1'-4" O.C.  
M.A. INDUSTRIES CAT. NO. M.A. PS IPF  
OR APPROVED EQUAL.

THE WORDS "SANITARY" OR THE  
APPLICABLE CITY/VILLAGE NAME  
SHALL BE CAST IN THE LID.

CAST IRON MANHOLE FRAME AND SOLID LID  
WITH CONCEALED PICKHOLE AND WATERTIGHT  
GASKET. NEENAH F.D.Y. CO. CAT. #R-1712-B,  
EAST JORDAN IRON WORKS CO. CAT. #1051-3  
(EXTRA HEAVY DUTY COVER) OR APPROVED  
EQUAL IN PAVED AREAS. IN NON-PAVED  
AREAS, USE R-1772-B (NEENAH), 1022-1 (MED.  
DUTY COVER) (EAST JORDAN). SET FRAME IN  
BUTYL ROPE.

8" MAX. (2 RINGS TOTAL) PRECAST CONCRETE OR  
EXPANDED POLYPROPYLENE ADJUSTING RINGS SET  
IN BUTYL ROPE.

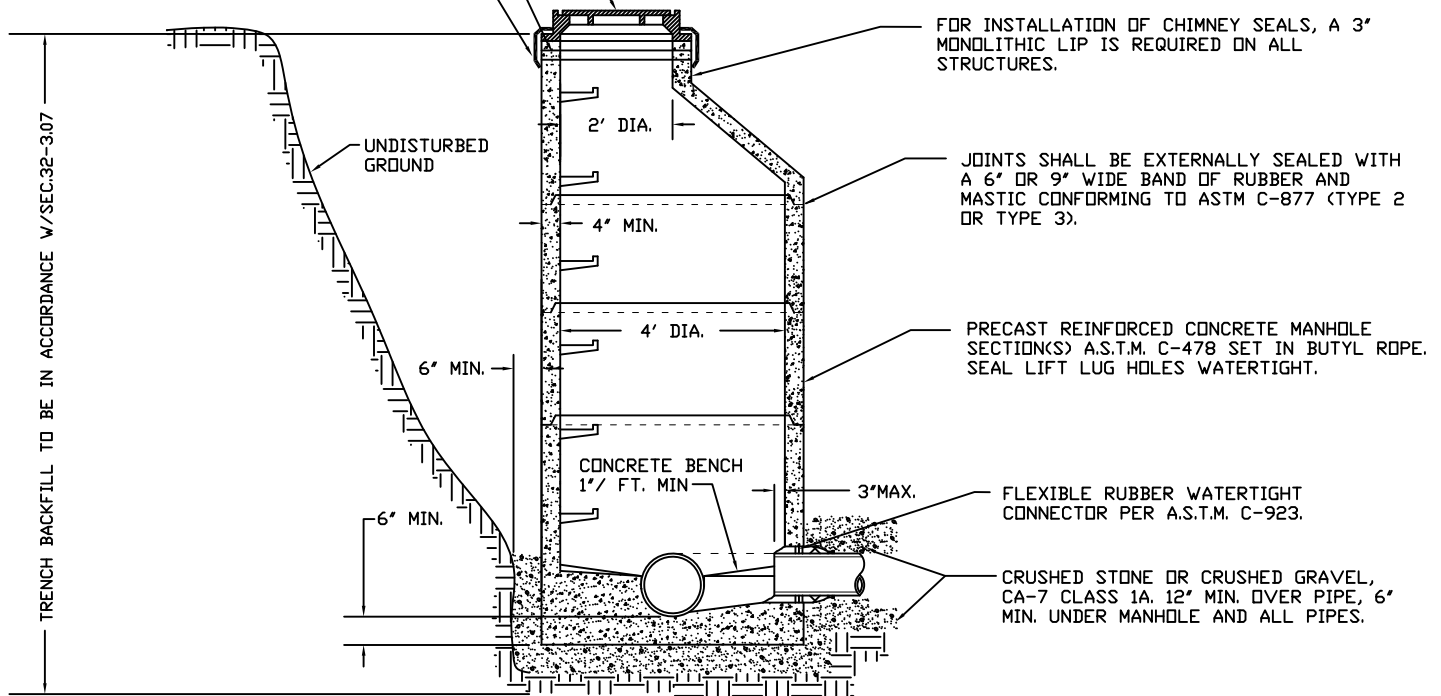
ADAPTOR-SEAL, INFI-SHIELD, CANUSA (WRAPID  
SEAL) CHIMNEY SEALS OR APPROVED EQUAL ARE  
REQUIRED FOR ALL FRAMES AND ADJUSTING RINGS.



FLEXIBLE WATERTIGHT CONNECTOR PER  
A.S.T.M. C-923.

THE SPACE BETWEEN ALL PIPES AND THE  
WALL OF THE MANHOLE TO BE COMPLETELY  
FILLED WITH NON-SHRINKING GROUT.

ANY MANHOLE, WHICH HAS BEEN DISTURBED IN  
ANY WAY, INCLUDING BEING RAISED OR  
LOWERED, SHOULD BE CLEANED AND DRIED  
BEFORE RE-SEALING. AN APPROVED CHIMNEY  
SEAL IS REQUIRED. EACH FULLY EXPOSED  
JOINT SHALL BE SEALED WITH A DOUBLE  
LAYER OF BUTYL ROPE AND EXTERNALLY  
SEALED PER THE NOTE JUST BELOW.



FOR INSTALLATION OF CHIMNEY SEALS, A 3"  
MONOLITHIC LIP IS REQUIRED ON ALL  
STRUCTURES.

JOINTS SHALL BE EXTERNALLY SEALED WITH  
A 6" OR 9" WIDE BAND OF RUBBER AND  
MASTIC CONFORMING TO ASTM C-877 (TYPE 2  
OR TYPE 3).

PRECAST REINFORCED CONCRETE MANHOLE  
SECTION(S) A.S.T.M. C-478 SET IN BUTYL ROPE.  
SEAL LIFT LUG HOLES WATERTIGHT.

FLEXIBLE RUBBER WATERTIGHT  
CONNECTOR PER A.S.T.M. C-923.

CRUSHED STONE OR CRUSHED GRAVEL,  
CA-7 CLASS 1A. 12" MIN. OVER PIPE, 6"  
MIN. UNDER MANHOLE AND ALL PIPES.

### NOTE

WHERE EXISTING SEWERS ARE 14" AND LESS, THE INVERT(S) OF  
NEW PIPE(S) SHALL BE DETERMINED BY MATCHING THE PROPOSED  
ELEVATION(S) TO THE TOP OF THE DOWNSTREAM PIPE. FOR SEWERS  
15" OR GREATER, SEE APPROVED PLANS FOR INVERT INFORMATION.  
ALL FLOW CHANNELS SHALL BE PRECAST INTO THE BENCH.

### TYPE " A " MANHOLE

**Fox Metro**  
Water Reclamation District

DESIGNED FMWRD	REVISION	2023
DRAWN KZ	HMisc. Note Revisions	
APPROVED KZ, MF	I "NOTE" Revision-determine inv.	03/09/17
DATE 05-12-00	J Expanded Polypropylene adj. rings	01/26/2021
SCALE NTS		
SHEET 1	CAD DWG.	REVISION
OF 1	JOB NO.	