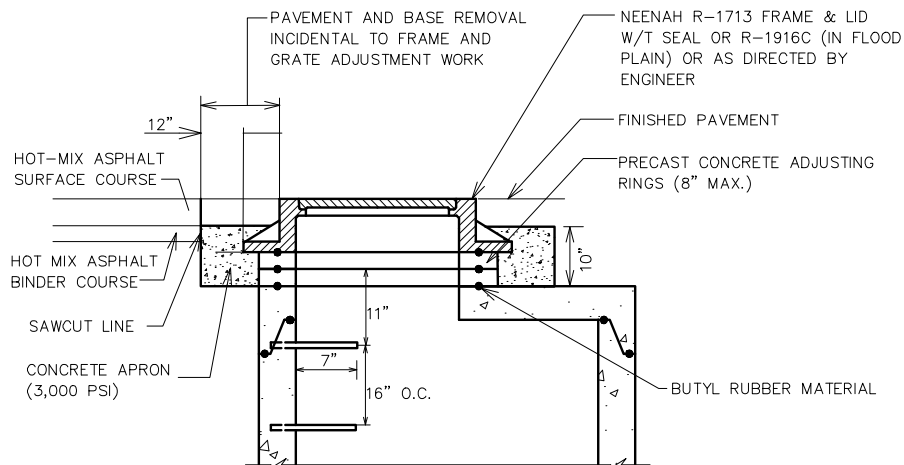


TYPE A (CONE)



TYPE B (FLAT TOP)

NOTE:

THE REQUIRED MANHOLE FRAME AND GRATE ADJUSTMENTS, INCLUDING POURING OF CONCRETE APRON, SHALL BE PERFORMED BEFORE PLACING HOT-MIX ASPHALT SURFACE COURSE.

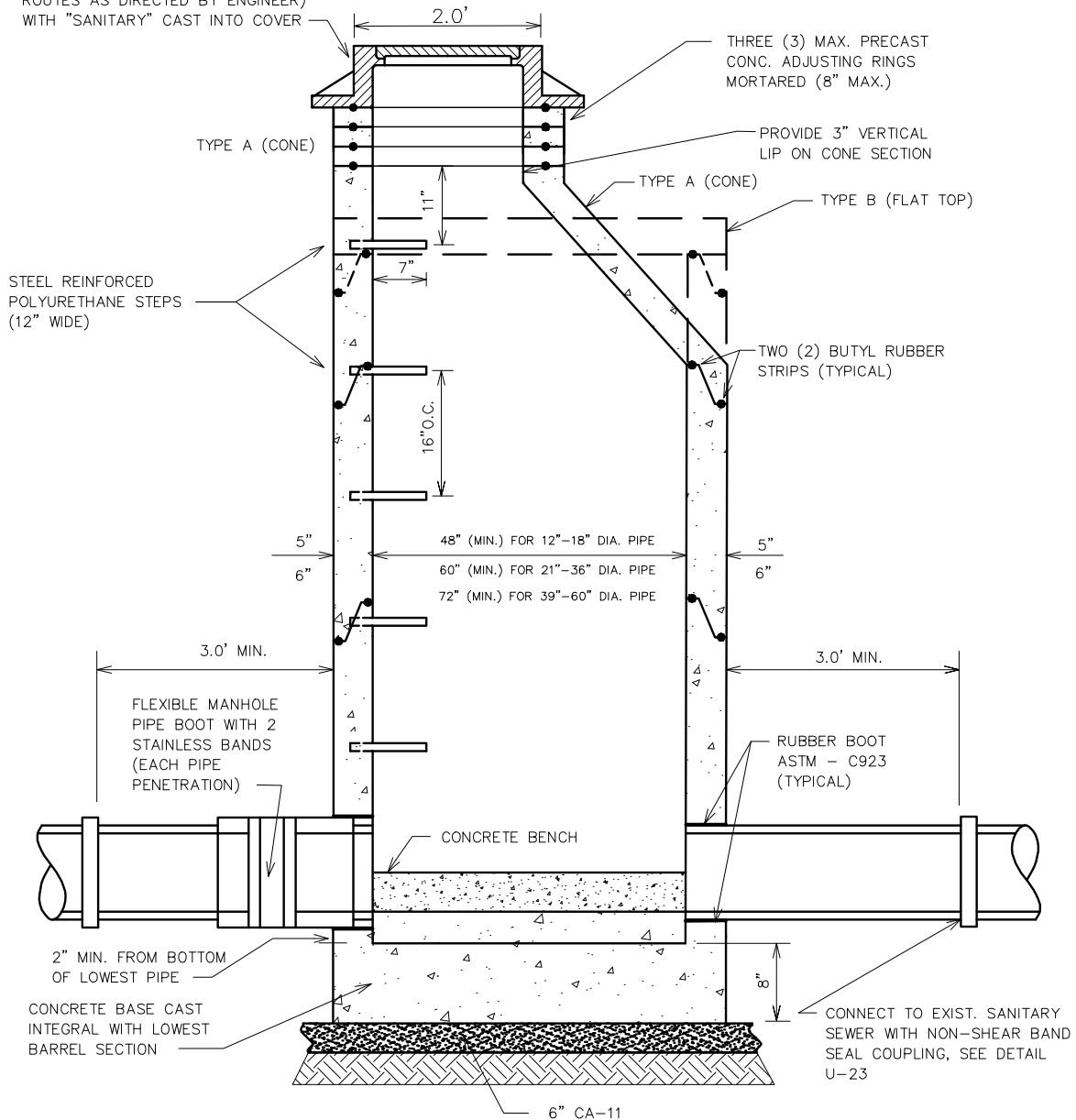
NOT TO SCALE

STRUCTURE FRAME & GRATE ADJUSTMENT

Village of Wilmette
 Engineering Department
 847.853.7660

REVISED: 01-03-08

NEENAH R-1713 FRAME & LID
 W/T-SEAL (OR R-1916C IN FLOOD
 PLAIN OR OVERLAND FLOOD
 ROUTES AS DIRECTED BY ENGINEER)
 WITH "SANITARY" CAST INTO COVER



NOTES:

1. MANHOLES MUST CONFORM TO ASTM C-478.
2. MANHOLE SECTIONS TO BE TONGUE AND GROOVED.
3. BENCHES MUST BE PROVIDED IN ALL SANITARY SEWER MANHOLES
4. USE EXTERNAL LIFTING "HOLES" ONLY, BUT NOT FULL PENETRATION.
5. ALL PIPE PENETRATIONS AND ALL NON-PRECAST OPENINGS SHALL BE CORED, RUBBER BOOTED AND INTERIOR MORTARED AROUND PIPE.*
6. USE ECCENTRIC CONE ONLY.

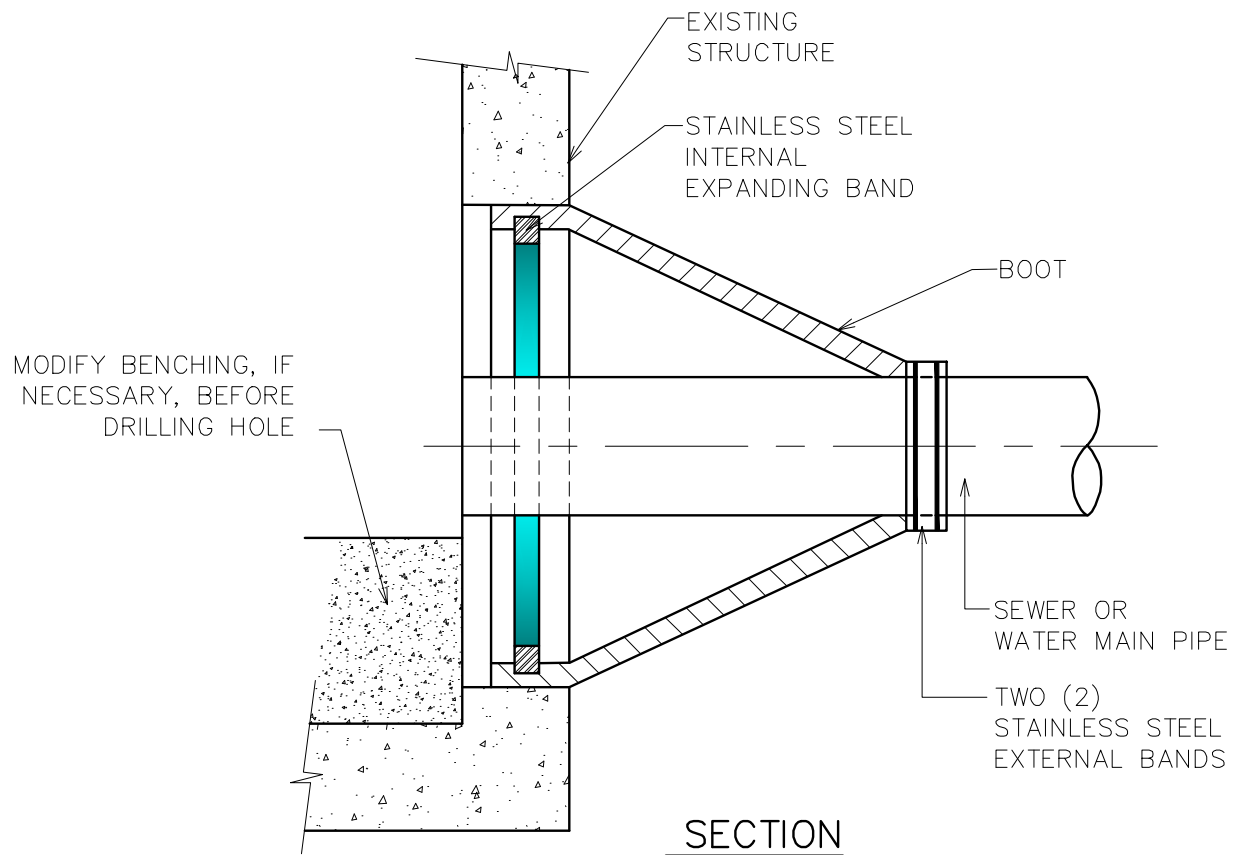
* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

Not To Scale

SANITARY MANHOLE

Village of Wilmette
 Engineering Department
 847.853.7660

REVISED:2008



NOTES:

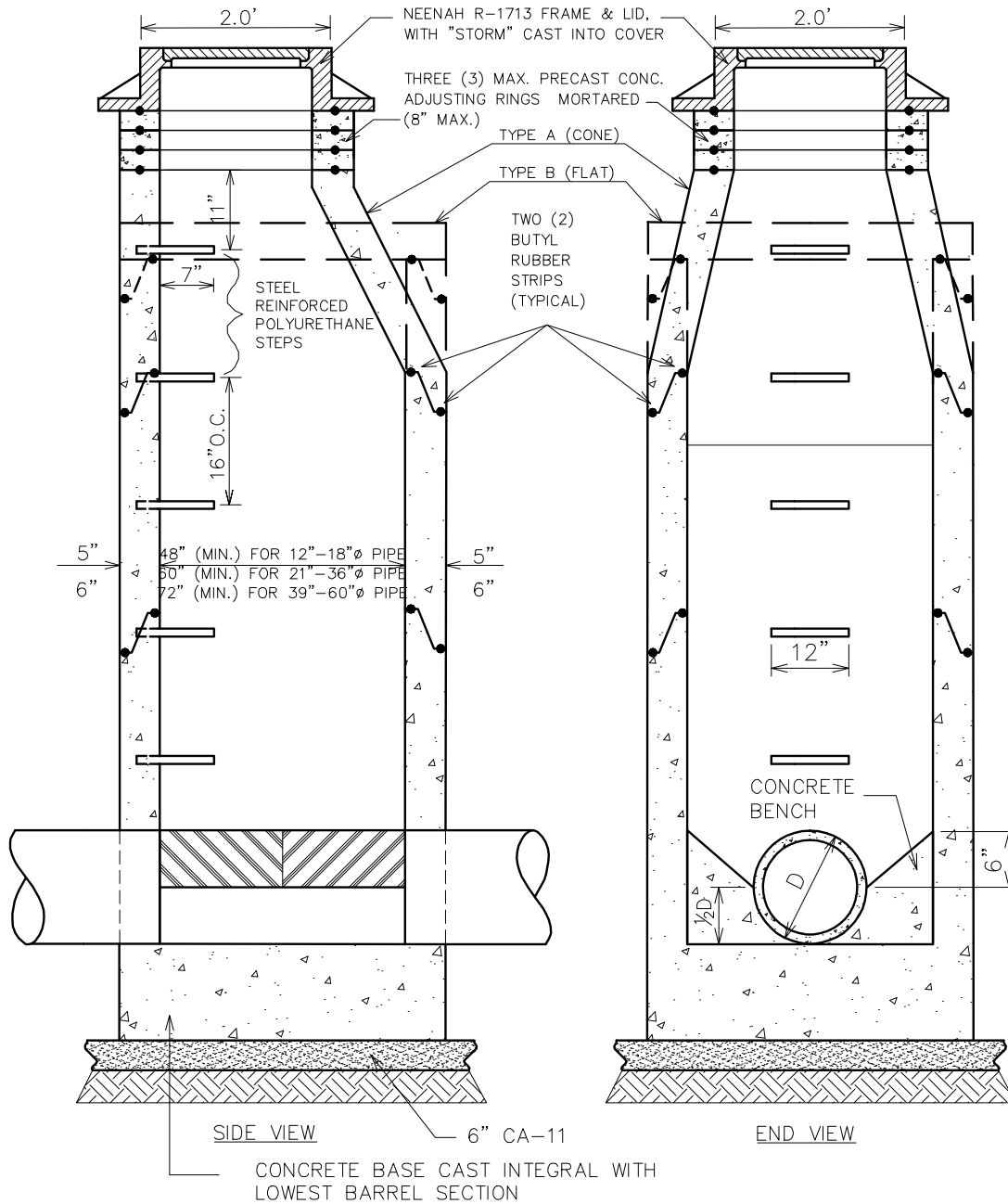
1. CORE-DRILL CIRCULAR OPENING IN STRUCTURE WALL OF DIAMETER TO FIT THE REQUIRED BOOT SIZE.
2. KOR-N SEAL FLEXIBLE RUBBER BOOT (MANUFACTURED BY NATIONAL POLLUTION CONTROL SYSTEMS, INC. OR AS APPROVED BY VILLAGE ENGINEERING SHALL BE USED FOR WATERTIGHT CONNECTION.
3. CUT, SHAPE AND SLOPE NEW INVERT CHANNEL IN THE EXISTING CONCRETE BENCH FOR SMOOTH FLOW FROM NEW CONNECTION.
4. CLEAN EXISTING STRUCTURE AND SEWER PIPE OF ANY DIRT, CONCRETE OR DEBRIS WHICH MAY ACCUMULATE DURING THE CONSTRUCTION PROCESS.

NOT TO SCALE

PIPE CONNECTION TO STRUCTURE

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 02-28-07



NOTES:

1. MANHOLES MUST CONFORM TO ASTM C-478.
2. MANHOLE SECTIONS TO BE TONGUE AND GROOVED.
3. BENCHES MUST BE PROVIDED IN ALL STORM SEWER MANHOLES.
4. ALL PIPE PENETRATIONS OCCURING WITHIN (OR BELOW) GROUNDWATER TABLE AND ALL NON-PRECAST OPENINGS SHALL BE CORED, RUBBER BOOTED AND INTERIOR MORTARED AROUND PIPE.*
5. USE ECCENTRIC CONE ONLY.

* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

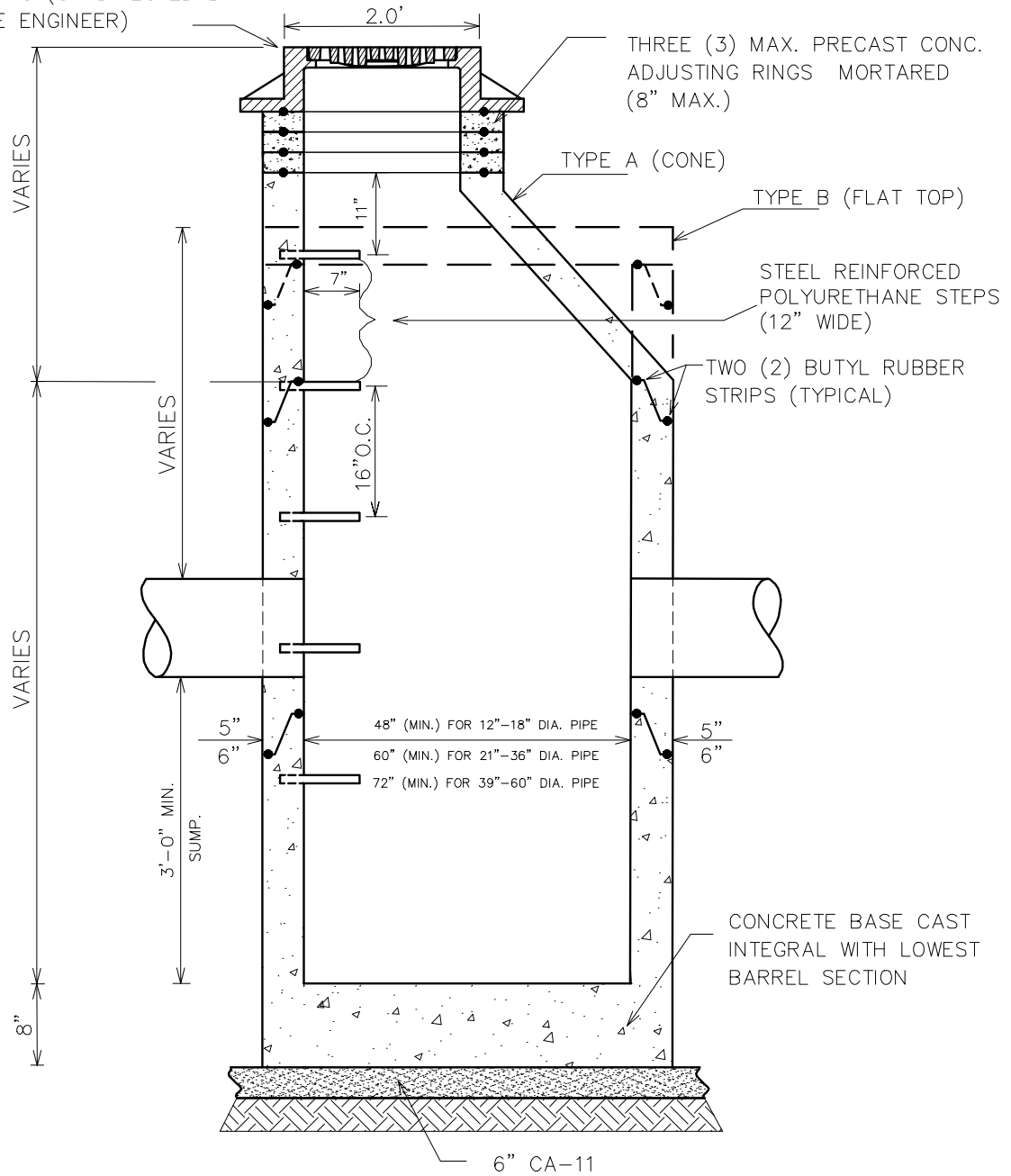
NOT TO SCALE

**STORM
MANHOLE**

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 01-08-08

NEENAH R-1713 FRAME & LID
 WITH TYPE D GRATE AS INDICATED
 ON PLANS (OR DIRECTED BY
 VILLAGE ENGINEER)



NOTES:

1. MANHOLES MUST CONFORM TO ASTM C-478.
2. MANHOLE SECTIONS TO BE TONGUE AND GROOVED.
3. NON-PRECAST OPENINGS SHALL BE CORED, RUBBER BOOTED AND INTERIOR MORTARED AROUND PIPE.*
4. USE ECCENTRIC CONE ONLY.

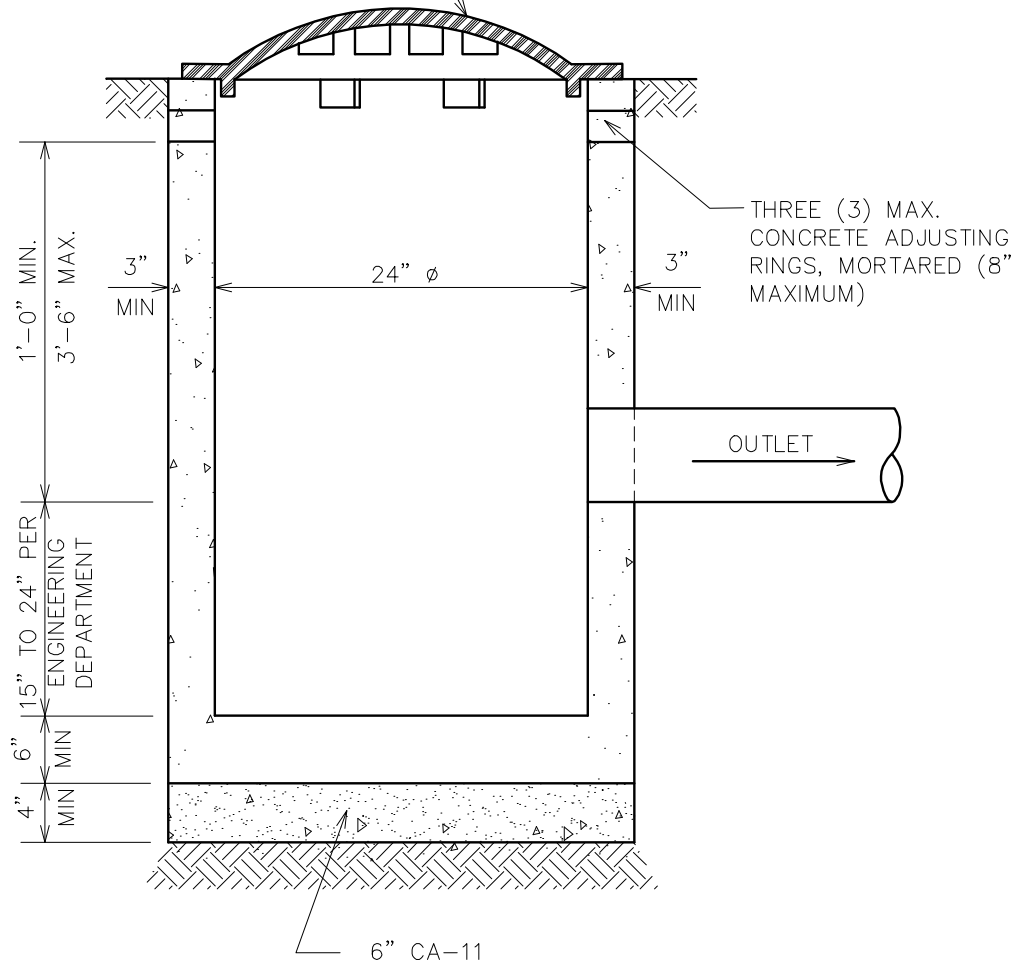
* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

NOT TO SCALE

CATCH BASIN

Village of Wilmette
 Engineering Department
 847.853.7660

USE NEENAH R-4340-B IN
GRASSED AREAS. IN PAVED AREAS
USE NEENAH R-1713 FRAME & LID
WITH TYPE D GRATE.



NOTE:

1. CATCH BASIN TO BE CONSTRUCTED OF PRECAST REINFORCED CONCRETE.
2. CATCH BASIN MUST CONFORM TO ASTM C-478.
3. NON-PRECAST OPENINGS SHALL BE CORED, RUBBER BOOTED AND INTERIOR MORTARED AROUND PIPE.*
4. MAXIMUM DEPTH FROM INVERT OF OUTLET PIPE TO TOP OF FRAME SHALL NOT EXCEED 42 INCHES. IF DESIGN OR CONSTRUCTION REQUIRES DEPTH BEYOND 42 INCHES, STRUCTURE SHALL BE REVISED TO A 48 INCH DIAMETER CATCH BASIN.

* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

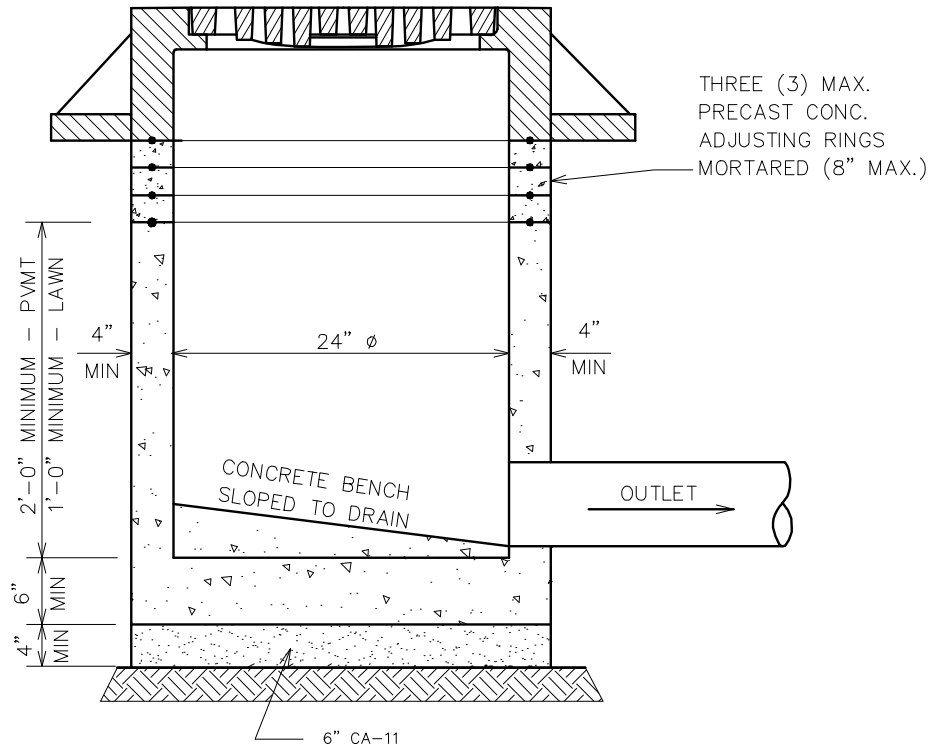
NOT TO SCALE

TYPE C CATCH BASIN

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 01-08-08

NEENAH R-1713 FRAME & LID
WITH TYPE D GRATE AS INDICATED
ON PLANS (OR DIRECTED BY
VILLAGE ENGINEER)



NOTES:

1. INLET MUST CONFORM TO ASTM C-478.
2. NON-PRECAST OPENINGS SHALL BE CORED RUBBER BOOTED, AND INTERIOR MORTARED AROUND PIPE.*
3. MAXIMUM DEPTH FROM INVERT OF OUTLET PIPE TO TOP OF FRAME SHALL NOT EXCEED 42 INCHES. IF DESIGN OR CONSTRUCTION REQUIRES DEPTH BEYOND 42 INCHES, STRUCTURE SHALL BE REVISED TO A 48 INCH DIAMETER MANHOLE.
4. BENCHES MUST BE PROVIDED IN ALL INLETS.

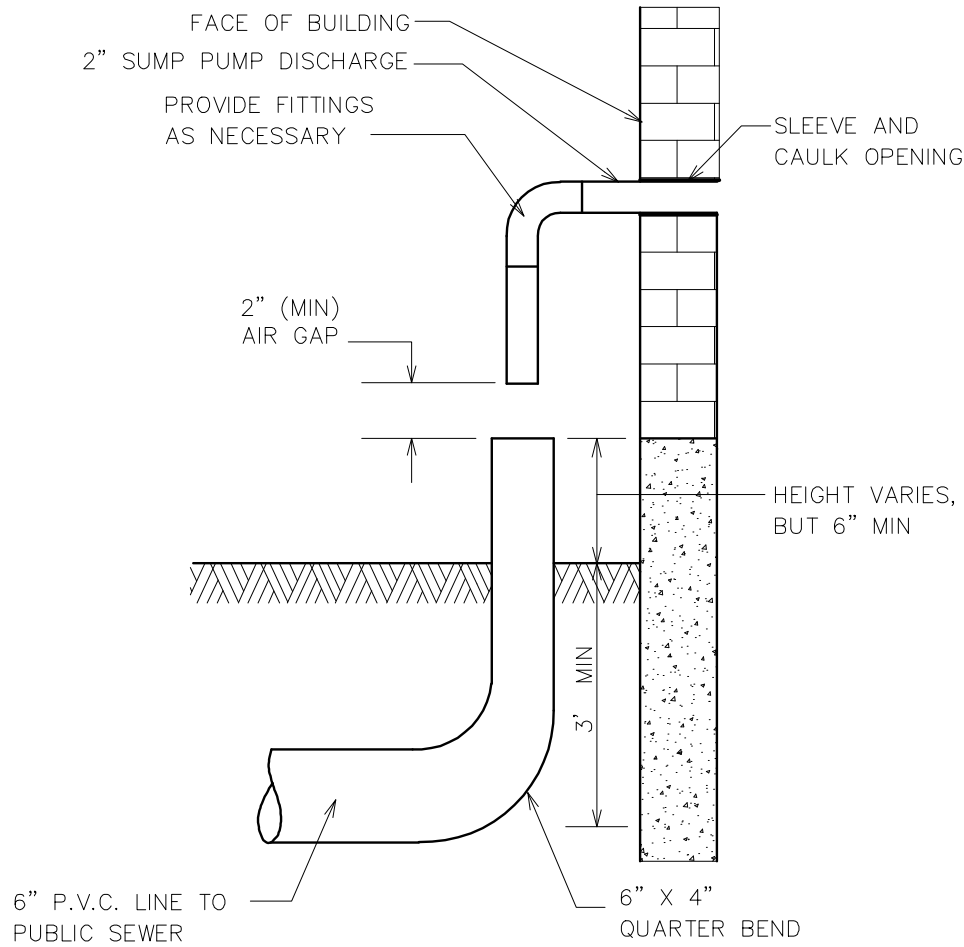
* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

NOT TO SCALE

INLET TYPE "C"

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 01-08-08



NOTES:

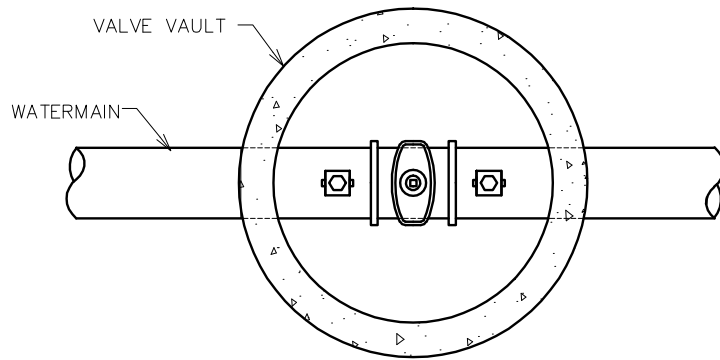
1. SUMP PUMPS SHALL BE DESIGNED WITH A MINIMUM 2" AIR GAP. A RIGID FOUR-INCH (4") DIAMETER PVC PIPE CAN BE USED TO CONNECT THE INDIVIDUAL SUMP PUMP SERVICE TO THE STORM SEWER. IN NO EVENT SHALL THE SUMP PUMP DISCHARGE INTO THE SANITARY SEWER SYSTEM.
2. A PLUMBING PERMIT IS REQUIRED PRIOR TO ANY SEWER CONNECTION.

NOT TO SCALE

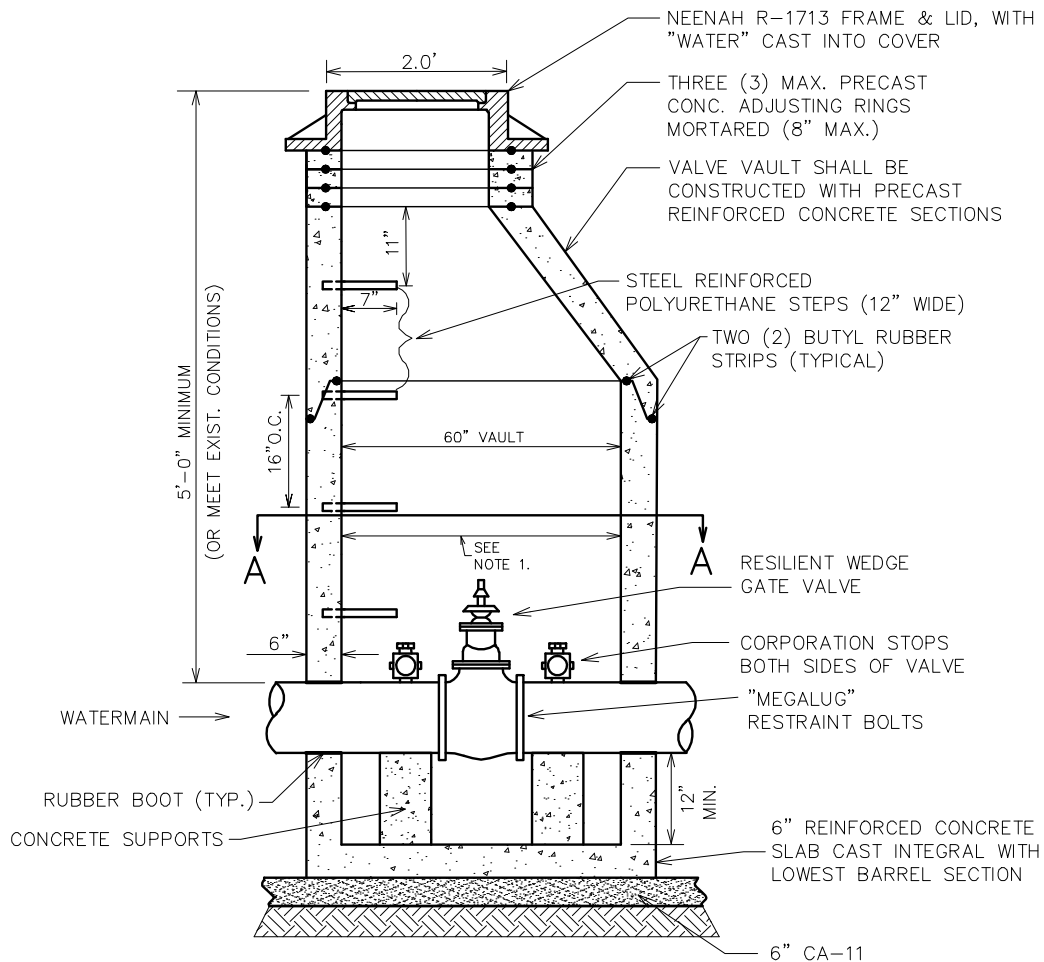
SUMP PUMP DISCHARGE CONNECTION

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 01-08-08



SECTION A-A



NOTES:

1. 60" (MIN) INSIDE DIA. FOR ALL VALVE VAULTS.
2. VALVE VAULT MUST CONFORM TO ASTM C-478.
3. USE ECCENTRIC CONE ONLY.
4. VAULT SECTIONS TO BE TONGUE AND GROOVED.
5. NON-PRECAST OPENINGS SHALL BE CORED AND RUBBER BOOTED.*
6. BACKFILL MATERIAL SHALL BE IDOT CA 7 STONE.
7. BOLTS AND NUTS
 - a. MECHANICAL JOINT BOLTS & NUTS SHALL BE COMPOSED OF "COR-TEN"
 - b. ALL OTHER HEXAGONAL BOLTS & NUTS SHALL BE COMPOSED OF STAINLESS STEEL.
8. GATE VALVES SHALL HAVE REPLACEABLE RESILIENT SEATS OR WEDGES MANUFACTURED BY WATEROUS OR AMERICAN FLOW CONTROL.

* SEE PIPE CONNECTION TO STRUCTURE DETAIL U-4.

NOT TO SCALE

VALVE VAULT

Village of Wilmette
Engineering Department
847.853.7660

REVISED: 01-09-08