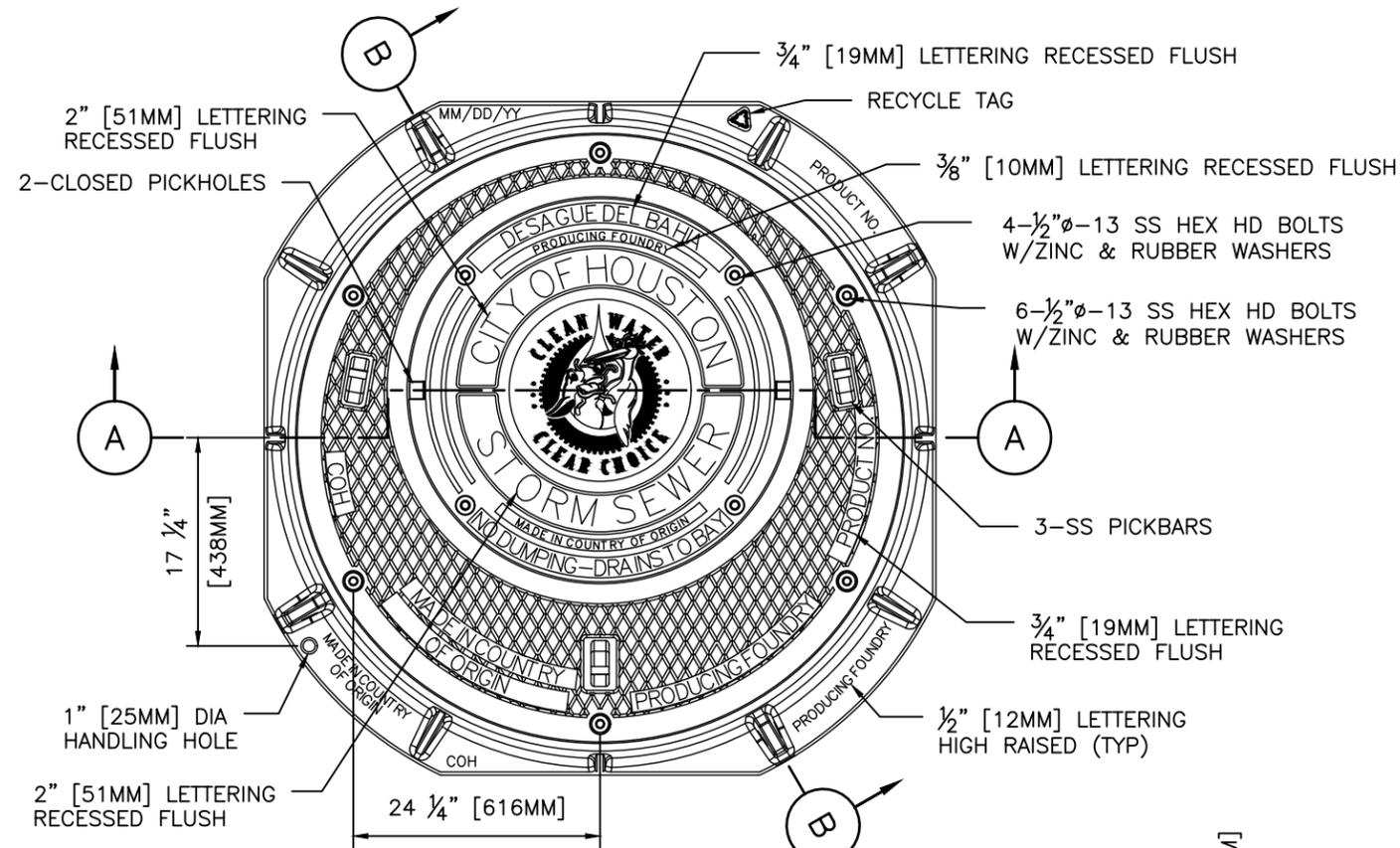
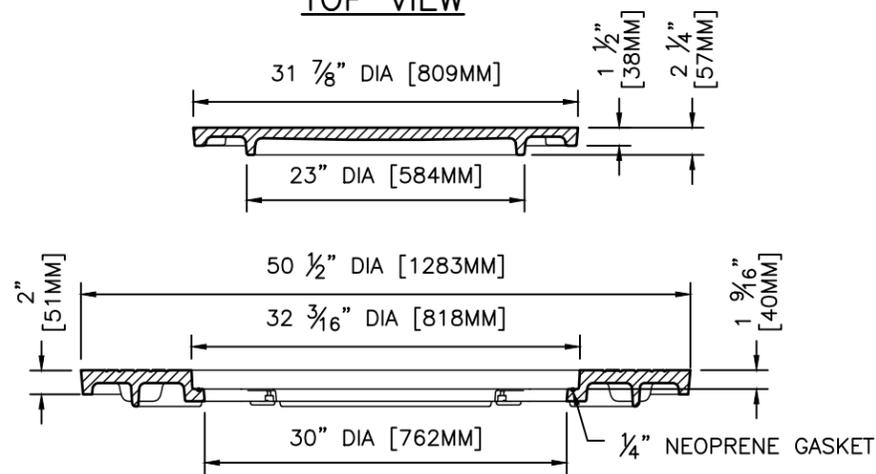


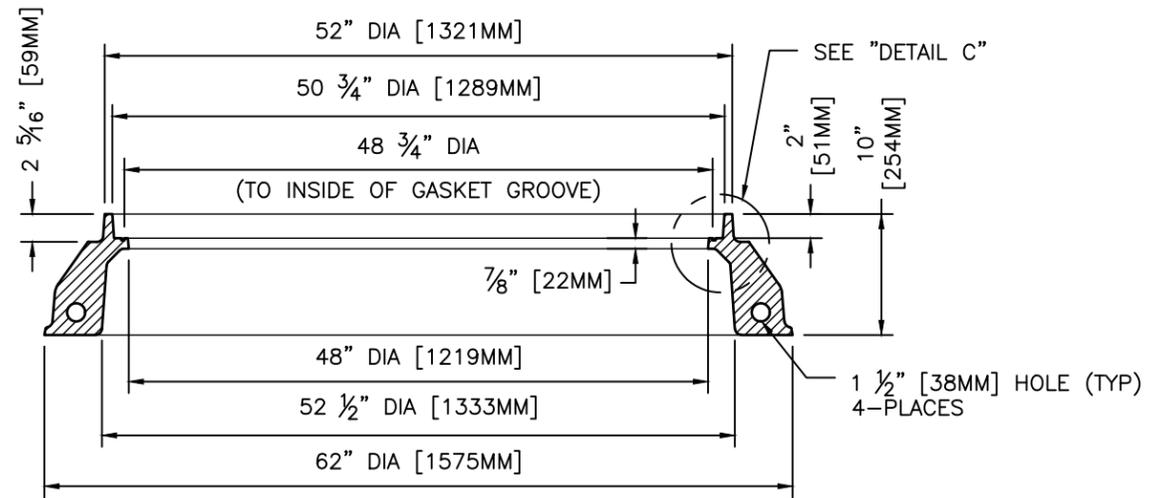
DISCLAIMER: THE USE OF THIS STANDARD IS GOVERNED BY THE TEXAS ENGINEERING PRACTICE ACT. THE DESIGN REQUIREMENTS ON THIS STANDARD DO NOT PURPORT TO ADDRESS ALL OF THE SAFETY CONCERNS ASSOCIATED WITH THEIR USE. THE ENGINEER OF RECORD (EOR) IS TO REVIEW THESE DESIGN REQUIREMENTS AND BY AUTHORIZING THEIR USE, ACCEPTS RESPONSIBILITY FOR THEIR APPLICABILITY, ADEQUACY AND SAFETY. NO WARRANTY OF ANY KIND IS MADE BY THE CITY OF HOUSTON FOR ANY PURPOSES WHATSOEVER. THE CITY OF HOUSTON ASSUMES NO RESPONSIBILITY FOR INCORRECT RESULTS OR DAMAGES RESULTING FROM ITS USE.



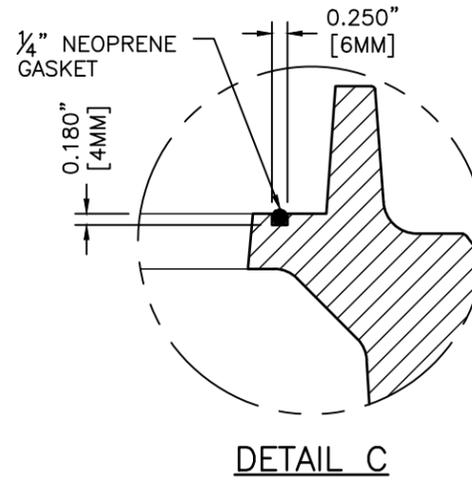
TOP VIEW



SECTION A-A



SECTION B-B



DETAIL C

NOTES:

1. APPROXIMATE WEIGHTS:

- OUTER COVER – 463 LBS (210KGS)
- INNER COVER – 203 LBS (92KGS)
- FRAME – 516 LBS (234KGS)
- UNIT – 1182 LBS (536KGS)

2. MATERIALS:

- COVER: GRAY IRON ASTM A48 CL35B.
- COVER: DUCTILE IRON (70-50-05).
- FRAME: GRAY IRON ASTM A48 CL35B.

3. CASTINGS MUST BE MANUFACTURED AND PROOF TESTED IN ACCORDANCE WITH AASHTO M306.

4. EJ V7048, V1430 & V7049 ASY OR APPROVED EQUAL.

5. IDENTIFICATION MARKINGS MUST COMPLY WITH CITY SPECIFICATIONS. MARKINGS NOT SHOWN ON THIS DETAIL MUST BE PLACED ON THE CASTING:

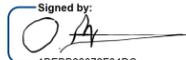
- A. PROVIDE ALL FRAME MARKINGS ON THE TOP SIDE OF THE FRAME.
- B. PROVIDE GRATE AND COVER MARKINGS ON EITHER TOP OR BOTTOM OF CASTING.

CITY OF HOUSTON
HOUSTON PUBLIC WORKS STANDARD

48" STORM SEWER MANHOLE
FRAME AND COVER

(SCALE: NOT TO SCALE)

APPROVED BY:

Signed by: 
18EBB22072F84DC...

CITY ENGINEER

Signed by: 
BE463E0DF454EB...

DIRECTOR OF HPW

EFF DATE: MAR-02-2026 DWG NO: 02090-11