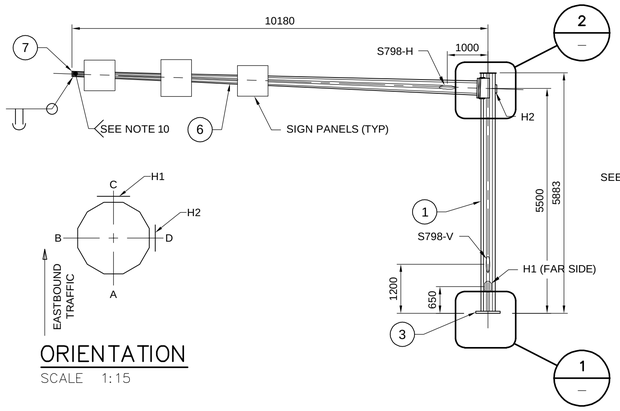
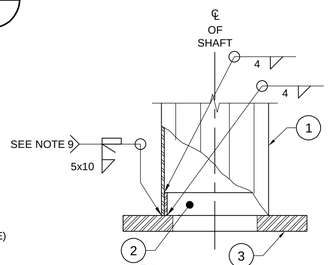
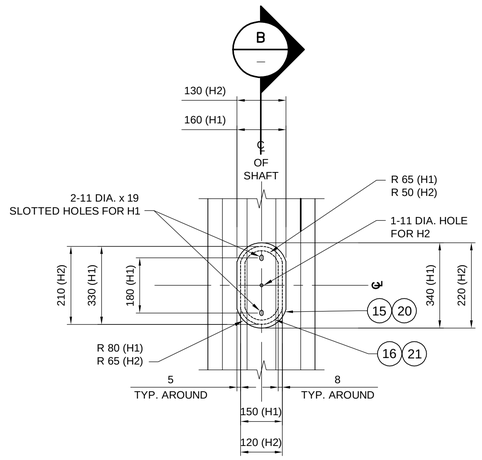


ELEVATION
SCALE 1:75

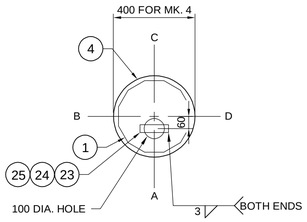
ORIENTATION
SCALE 1:15



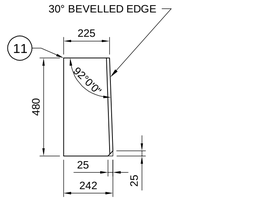
1 DETAIL
SCALE 1:10



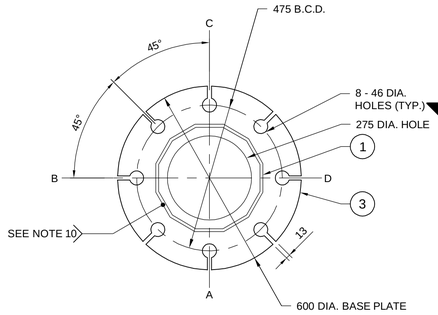
FRONT ELEVATION
SCALE 1:10



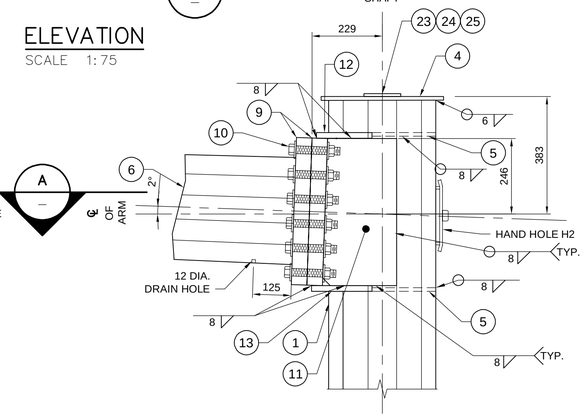
END PLATE DETAIL
SCALE 1:15



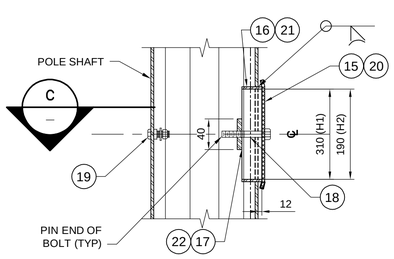
SIDE GUSSET PLATE DETAIL
SCALE 1:15



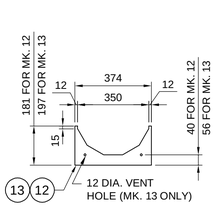
BASE PLATE DETAIL
SCALE 1:10



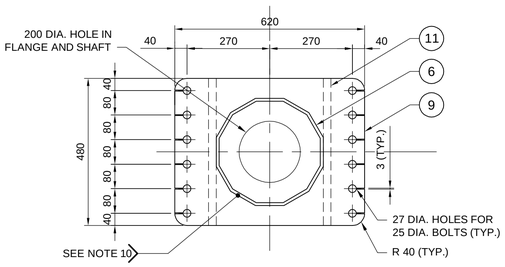
2 DETAIL
SCALE 1:10



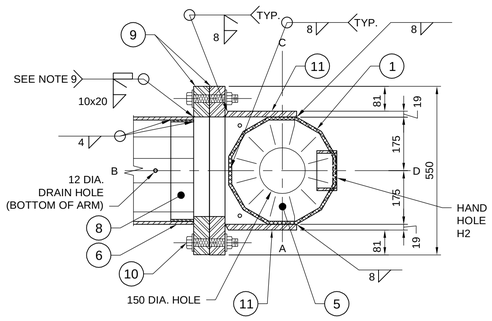
B SECTION
SCALE 1:10



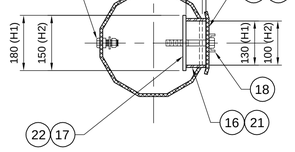
GUSSET PLATE DETAIL
SCALE 1:15



FLANGE PLATE DETAIL
SCALE 1:10



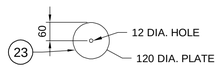
A SECTION
SCALE 1:10



C SECTION
SCALE 1:10

NOTE: REFER TO ORIENTATION DETAIL
FOR LOCATION OF HANDHOLES.
WELDED JOINTS TO COMPLETE REINFORCING RING
SHALL BE 100% PENETRATION.

HANDHOLE – MK. H1 & H2
SCALE 1:10



CAP PLATE DETAIL
SCALE 1:10

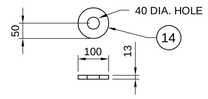
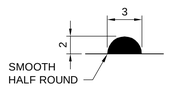


PLATE WASHER DETAIL
SCALE 1:10

STRUCTURE IDENTIFICATION NUMBER SIZE
SCALE NTS



D SECTION
SCALE NTS

BILL OF MATERIALS

	MK.	QTY.	DESCRIPTION
	1	1	DODECAGONAL SHAFT 350 A/F x 6.4 THICK PLATE
	2	1	BACK-UP STRIP 50 x 4.763 (FOR SHAFT)
	3	1	BASE PLATE 600 DIA. x 51 THICK
	4	1	SHAFT END PLATE 400 DIA. x 12 THICK
	5	2	DODECAGONAL GUSSET PLATE 12 THICK
	6	1	DODECAGONAL ARM 350 A/F TO 125 A/F x 6.4 THICK PLATE
	7	1	DODECAGONAL END PLATE 125 A/F x 4.763 THICK
	8	1	BACK-UP STRIP 50 x 4.763 (FOR ARM)
	9	2	FLANGE PLATE 51 THICK
	10	12	25 DIA. BOLTS C/W NUT & 2 WASHERS (ASTM A325, TYPE 1, GALV.)
	11	2	SIDE GUSSET PLATE 19 THICK
	12	1	GUSSET PLATE 19 THICK
	13	1	GUSSET PLATE 19 THICK
	14	16	PLATE WASHER 13 THICK
			HANDHOLE MARK H1
	15	1	COVER PLATE 11 GA. x 160x 340 (ASTM A569)
	16	1	REINFORCING RING 8 x 65 x 830
*	17	2	CLAMP BAR 6 x 40 x 180
*	18	2	10 DIA. x 140 BOLT S/S (TYPE 316)
*	19	1	GROUND STUD ASSEMBLY 10 DIA. x 40
			HANDHOLE MARK H2
*	18	1	10 DIA. x 140 BOLT S/S (TYPE 316)
*	19	1	GROUND STUD ASSEMBLY 10 DIA. x 40
	20	1	COVER PLATE 11 GA. x 130 x 220 (ASTM A569)
	21	1	REINFORCING RING 8 x 65 x 555
*	22	1	CLAMP BAR 6 x 40 x 150
	23	1	CAP PLATE, 120 DIA. x 3 THICK
	24	1	CAP RETAINER BACKING BAR 140 x 38 x 6, C/W THREADED HOLE AT CENTER FOR MK. 31
	25	1	10 DIA S/S BOLT C/W FLAT S/S WASHER

*NOTES:

1. MARK NO. 17 & 22 C/W 8-DIA. PUNCHED 10 N.C. TAPPED AT THE CENTER OF PLATE.
2. MARK NO. 18 C/W CUP WASHER.
3. MARK NO. 19 C/W 2-10 DIA. HEX NUT, 2-TERMINAL WASHER & 1-LOCKWASHER.

GENERAL NOTES

1. DESIGN DATA
   - AASHTO LRFD SPECIFICATIONS FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINAIRES, AND TRAFFIC SIGNALS, 1TH EDITION, INCLUDES 2022 INTERIM REVISIONS.
   - DESIGN WIND LOAD ON SIGN = 1.8 kPa
   - DESIGN WIND LOAD ON POST = 1.2 kPa
   - DESIGN ICE LOAD = 0.15 kPa
   - FATIGUE CATEGORY I CONSIDERING NATURAL WIND GUSTS, TRUCK INDUCED GUSTS, AND GALLOPING.
2. ALL PLATE MATERIALS SHALL BE CSA G40.21 - 300W STRUCTURAL STEEL.
3. ALL MATERIALS EXCEPT STAINLESS STEEL AND ALUMINUM SHALL BE HOT-DIP GALVANIZED IN ACCORDANCE WITH ASTM A123 TO A MIN. NET RETENTION OF 610 g/m² UNLESS INDICATED OTHERWISE.
4. ALL AREAS OF DAMAGED GALVANIZING SHALL BE REPAIRED WITH SPRAY-ON COATING CALLED "ZINGA" OR APPROVED EQUIVALENT, HAVING A MINIMUM 96% ZINC CONTENT IN THE DRY FILM.
5. SIGNS
   - 3 SIGN PANELS, LANE DESIGNATION SIGNS 750x750mm AND ROUTE 42 SIGN 750x900mm AS SHOWN ON SHEET 6. SUPPLIED AND INSTALLED BY THE CITY.
   - MOUNTING BRACKET FOR SIGNS PROVIDED AND INSTALLED BY THE CITY.
   - SIGN PANELS SHALL BE INSTALLED ON THE SIGN SUPPORT STRUCTURE IMMEDIATELY FOLLOWING ERECTION OF THE SUPPORT STRUCTURE (SAME DAY).
6. INSTALL HOLES IN THE GUSSET PLATES FOR DRAINAGE DURING GALVANIZING AS DETAILED.
7. PROVIDE "RAISED" IDENTIFICATION NO. WITH WELDING ELECTRODE FOR THE SIGN STRUCTURE.
8. GRIND ALL SHARP POINTS AND EDGES.
9. EXTERIOR WELD JOINING SHAFT TO TRANSVERSE PLATE SHALL BE AN UNEQUAL LEG COMPLETE PENETRATION WELD WITH THE LONG LEG OF THE WELD ALONG THE SHAFT TERMINATING AT 30° FROM THE SHAFT SURFACE.
10. SEAM WELDS SHALL BE 100% PENETRATION WITHIN 200mm OF BOTH ENDS OF THE VERTICAL AND ARM SHAFTS.
11. STRUCTURAL BOLTS FOR FLANGE AND SPLICE CONNECTIONS SHALL BE TIGHTENED IN ACCORDANCE WITH THE TURN-OF-NUT METHOD.

METRIC
WHOLE NUMBERS INDICATE MILLIMETRES
DECIMALIZED NUMBERS INDICATE METRES

ENGINEERS GEOSCIENTISTS MANITOBA
Certificate of Authorization
AECOM Canada Ltd.
No. 4671 Date: 23/05/23

NO.	REVISIONS	DATE	BY
0	ISSUED FOR TENDER	23/05/23	FT
A	ISSUED FOR REVIEW	23/05/12	FT

B.M. ELEV.

AECOM

DESIGNED BY	CC	CHECKED BY	FT
DRAWN BY	KC	APPROVED BY	EBL
HOR. SCALE: / VERTICAL:	AS NOTED	RELEASED FOR CONSTRUCTION BY:	-
DATE	2023-05-12	DATE	-

ENGINEER'S SEAL
PROVINCE OF MANITOBA
F. TABET
Member 33659
REGISTERED PROFESSIONAL ENGINEER
MAY 25, 2023

CONSULTANT DRAWING NO.
CS-02

Winnipeg
THE CITY OF WINNIPEG
PUBLIC WORKS DEPARTMENT
ENGINEERING DIVISION

2023 REGIONAL STREET RENEWAL PROGRAM
LOGAN AVENUE PAVEMENT RECONSTRUCTION

CITY DRAWING NUMBER: S-798-23-02
SHEET 7 OF 7

S-798 EASTBOUND LOGAN
OVERHEAD SIGN SUPPORT STRUCTURE
FABRICATION DETAILS

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