

HAMPTON ROADS SANITATION DISTRICT



PROJECT TITLE

(LOCATION: CITY/COUNTY & STATE)

DATE (MONTH & YEAR)

LEGEND  
(ON SEPARATE PAGE FOR  
LARGE PROJECTS)

VICINITY  
MAP

MAP SCALE

LOCATION  
MAP

MAP SCALE

INDEX TO DRAWINGS  
(ON SEPARATE PAGE FOR  
LARGE PROJECTS)

ENGINEER'S NAME/LOGO/CONTACT

RESERVE SPACE FOR DRAWING  
ADDITION OF: CONTRACTOR, NAME &  
OTHER INFORMATION AS REQUIRED  
(PIPE MANUFACTURER, ETC.)

VERTICAL DATUM:

ENGINEER'S  
SEAL



STANDARD DESIGN DETAIL

STANDARD COVER SHEET

DRAWING NO.  
100

SHEET  
1 OF 1

DATE  
9/2018



STANDARD DESIGN DETAIL

EASEMENT PLAT

DRAWING NO.  
101  
SHEET  
1 OF 1  
DATE  
9/2018

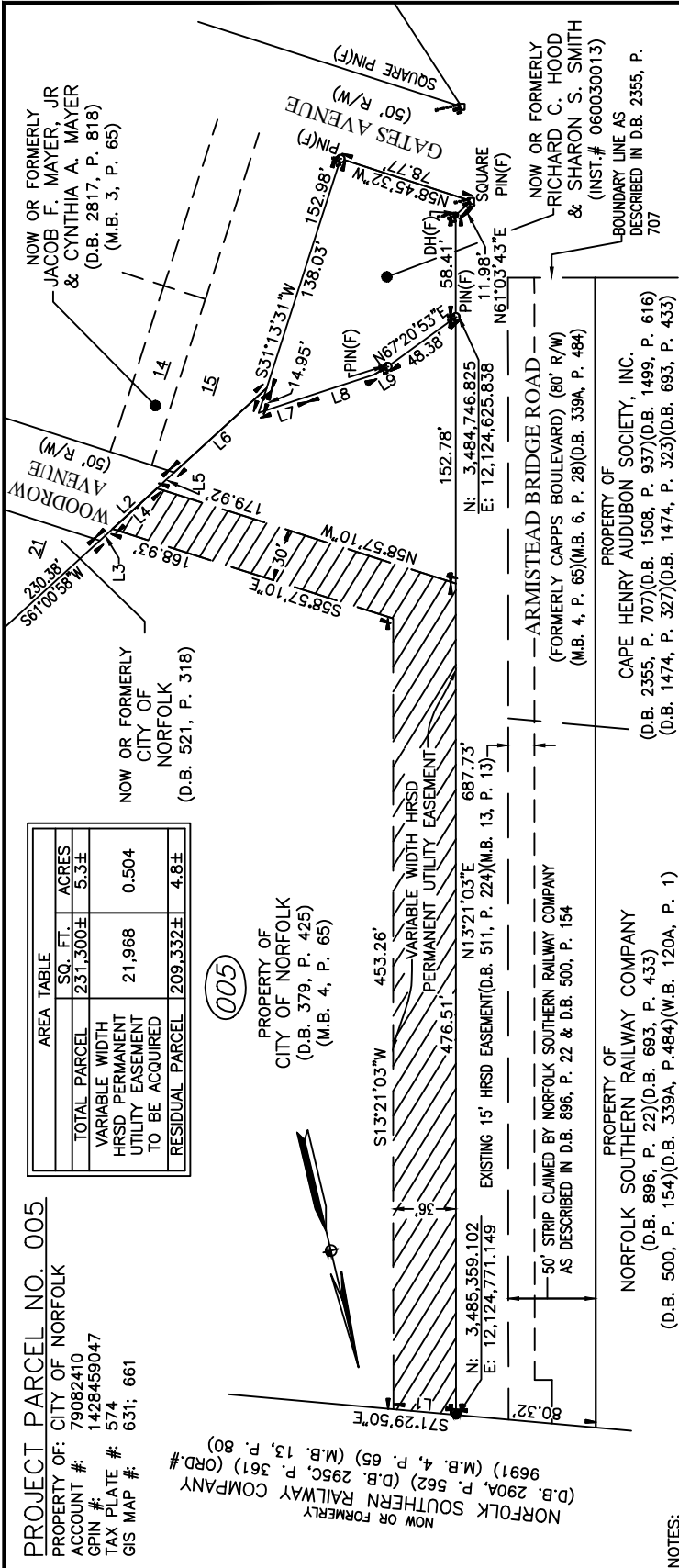
PROJECT PARCEL NO. 005

PROPERTY OF: CITY OF NORFOLK  
ACCOUNT #: 79082410  
GPN #: 1428459047  
TAX PLATE #: 574  
GIS MAP #: 631; 661

AREA TABLE		
	SQ. FT.	ACRES
TOTAL PARCEL	231,300±	5.3±
VARIABLE WIDTH HRSD PERMANENT UTILITY EASEMENT TO BE ACQUIRED	21,968	0.504
RESIDUAL PARCEL	209,332±	4.8±

NORFOLK SOUTHERN RAILWAY COMPANY (D.B. 290A, P. 562) (D.B. 295C, P. 361) (ORD # 9691) (M.B. 4, P. 65) (M.B. 13, P. 80)

PROPERTY OF CITY OF NORFOLK (D.B. 379, P. 425) (M.B. 4, P. 65)



NOTES:

1. THIS PLAT WAS PREPARED WITHOUT BENEFIT OF A TITLE REPORT AND THEREFORE MAY NOT SHOW ALL EASEMENTS OR PROPERTY REFERENCES THAT AFFECT THIS PROPERTY.
2. MERIDIAN SOURCE: VIRGINIA COORDINATE SYSTEM OF 1983 (SOUTH ZONE) NAD83 (1993) HARN. COORDINATE VALUES ARE SHOWN IN U.S. SURVEY FEET.
3. THIS SURVEY DOES NOT CONSTITUTE A BOUNDARY SURVEY AND THEREFORE PARCEL AREAS SHOWN ARE APPROXIMATE AND TAKEN FROM PLATS AND DEEDS OF RECORD.

LINE TABLE			
LINE NO.	BEARING	DISTANCE	BEARING
L1	S71°29'50"E	36.15'	S60°58'26"W
L2	S60°54'34"W	57.74'	S84°46'04"W
L3	S60°54'34"W	9.86'	S85°11'37"E
L4	S60°54'34"W	34.59'	S73°12'17"W
L5	S60°54'34"W	13.29'	

12/08/10	02/16/11
CLIENT COMMENT REVISIONS	ADDED 50' NS STRIP & HRSD EASEMENT
2	3



- DENOTES AREA OF VARIABLE WIDTH HRSD PERMANENT UTILITY EASEMENT TO BE ACQUIRED



PLAT SHOWING  
VARIABLE WIDTH PERMANENT UTILITY EASEMENT  
TO BE ACQUIRED FROM  
CITY OF NORFOLK  
BY  
FOR  
HAMPTON ROADS SANITATION DISTRICT  
SOUTH TRUNK SEWER SECTIONS B&C  
REPLACEMENT  
NORFOLK, VIRGINIA  
SEPTEMBER 23, 2010  
SCALE: 1"=60'



SHEET 1 OF 1

PAINT SAFETY YELLOW  
TYP. ALL BOLLARDS

6"  $\phi$ , SCHEDULE 80  
STEEL PIPE FILLED  
WITH CONCRETE

FINISHED GRADE

POURED CONCRETE  
(3,500 P.S.I.)

#5 BAR, 12" LONG  
THROUGH PIPE

1" ROUNDING OF CONCRETE

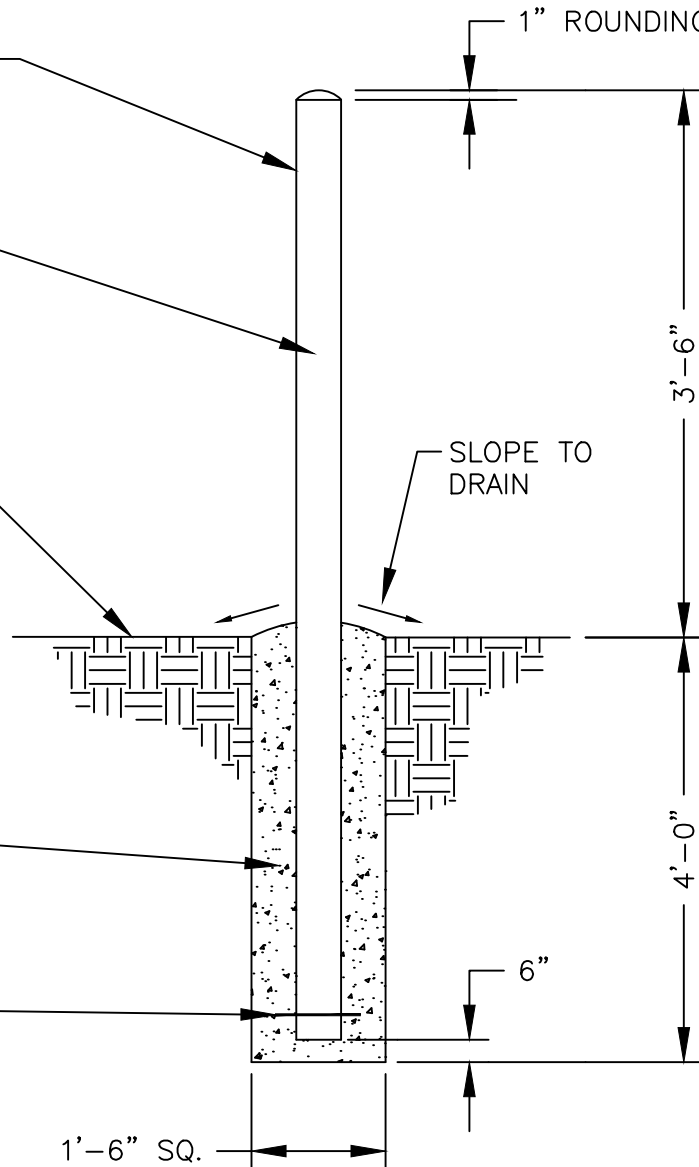
SLOPE TO  
DRAIN

3'-6"

4'-0"

6"

1'-6" SQ.



NOT TO SCALE



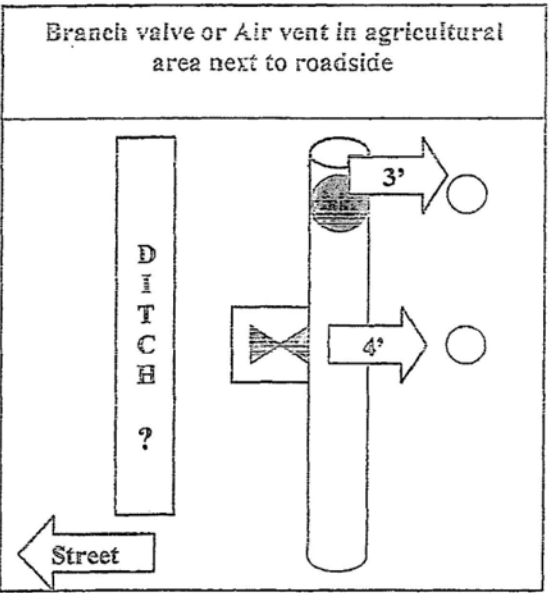
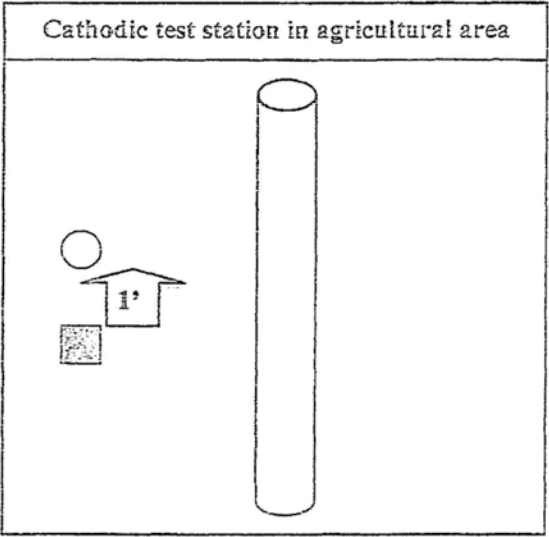
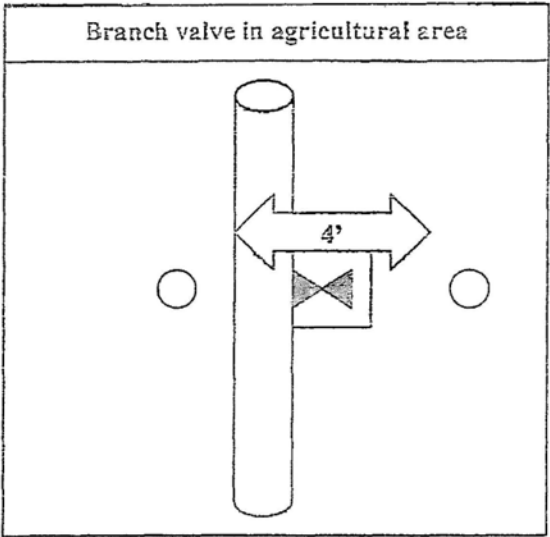
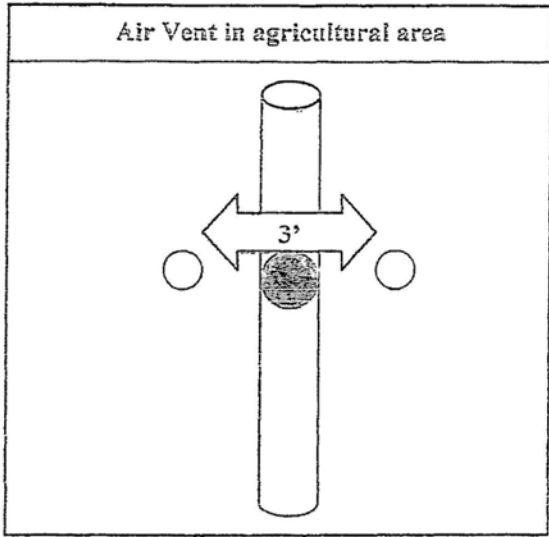
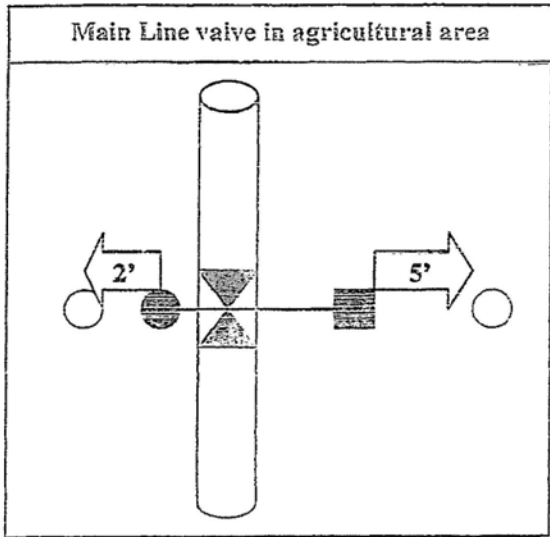
STANDARD DESIGN DETAIL

EXTERIOR BOLLARD DETAIL

DRAWING NO.  
102

SHEET  
1 OF 1

DATE  
9/2018



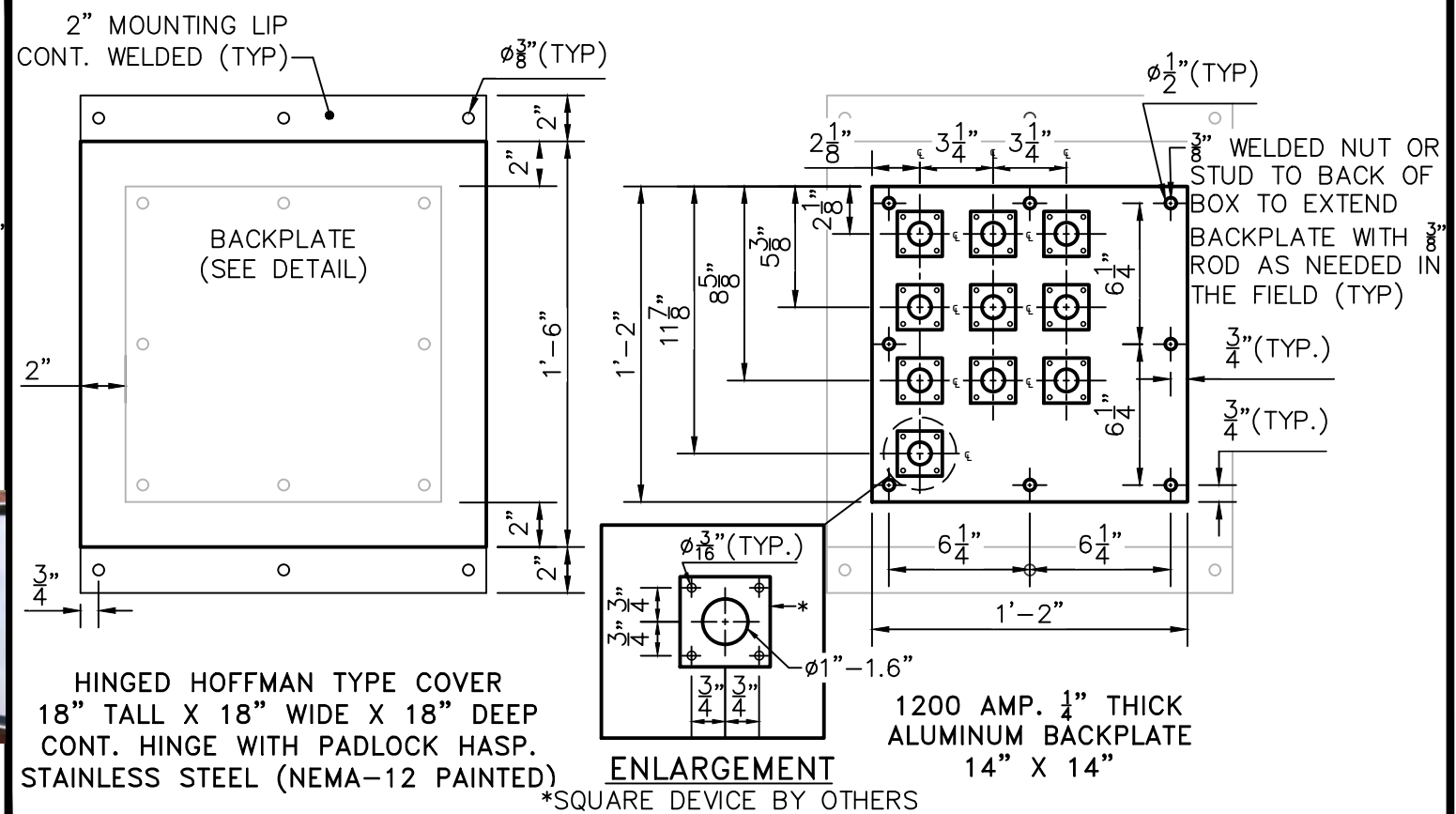
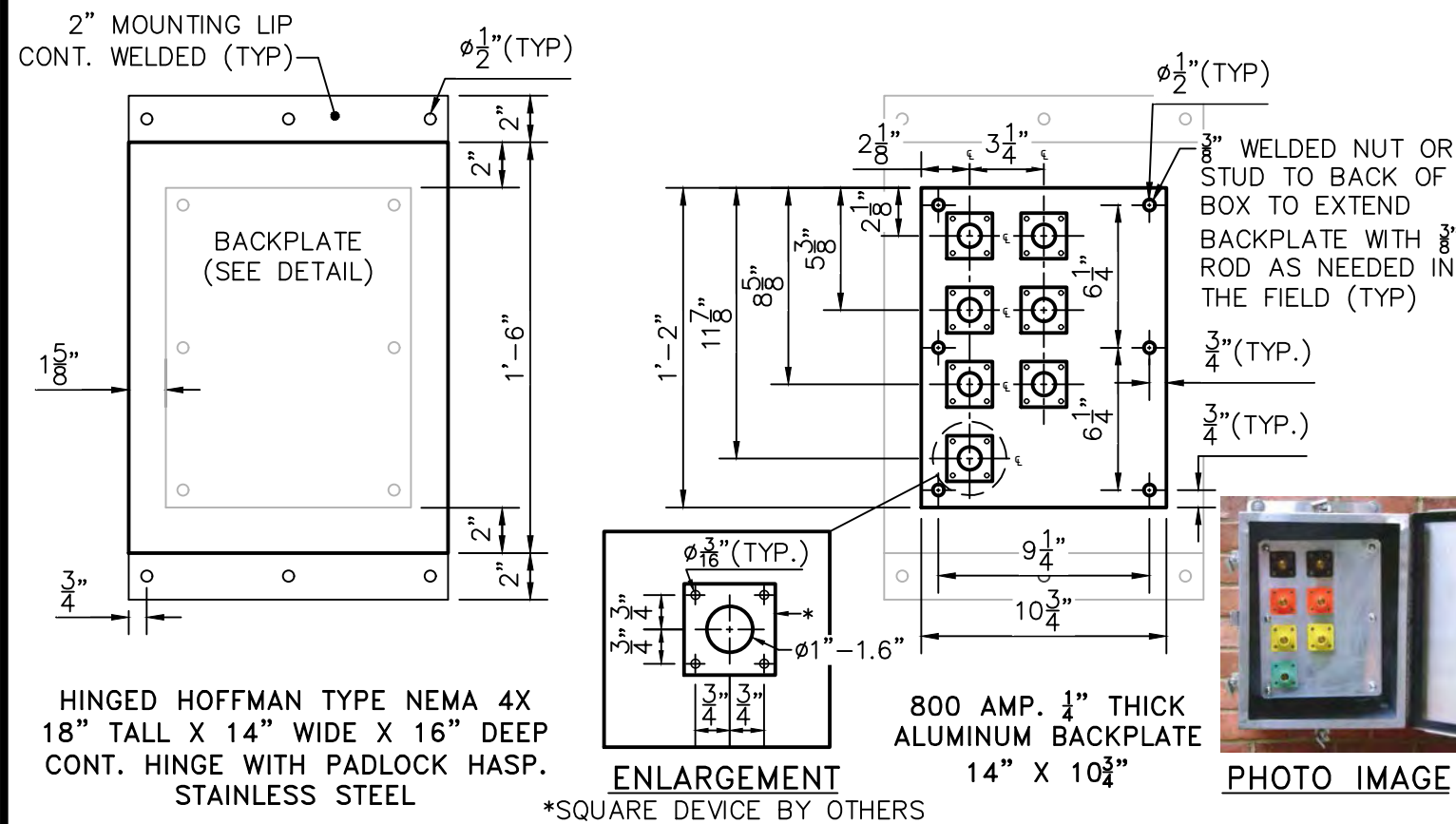
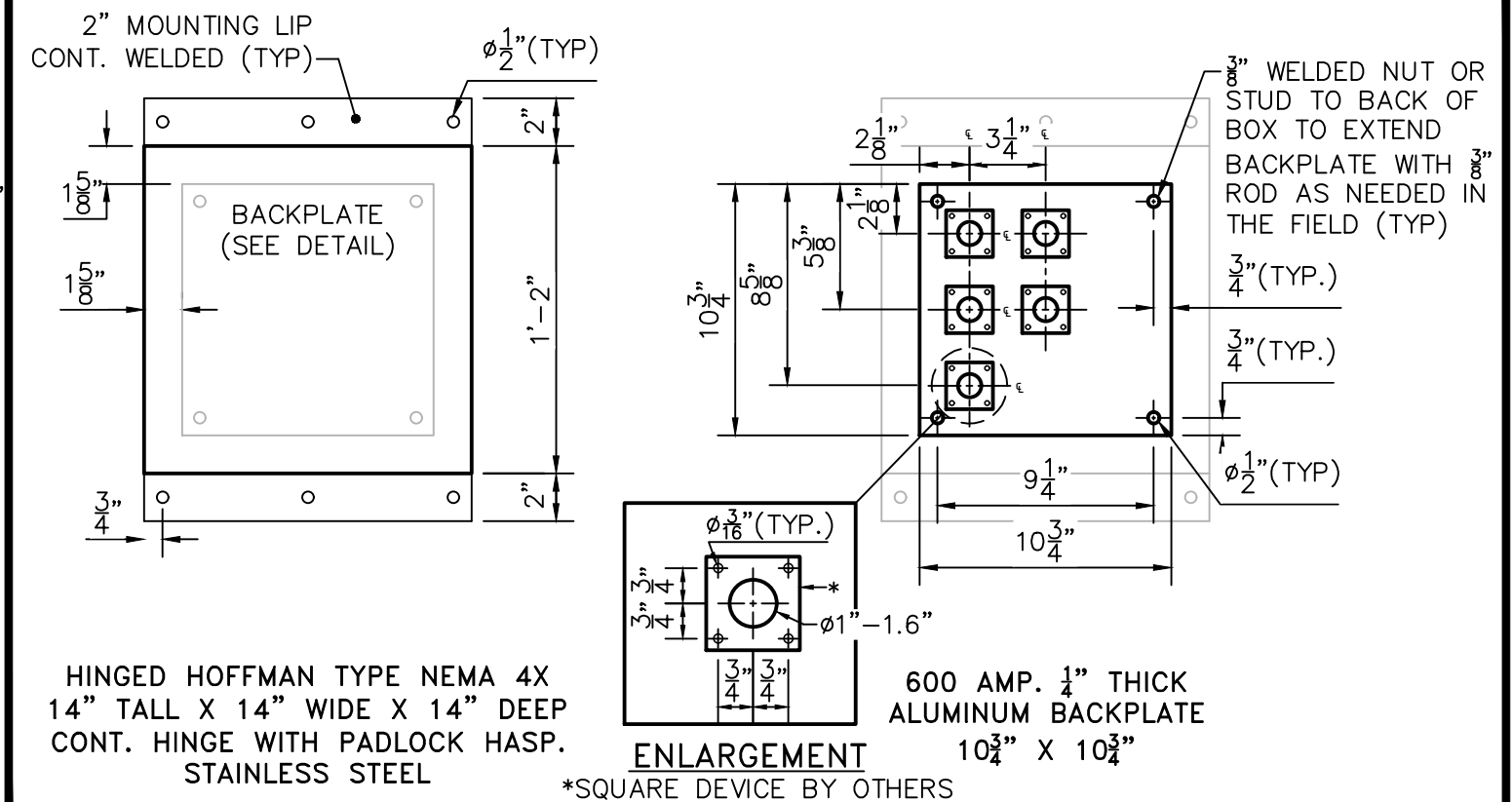
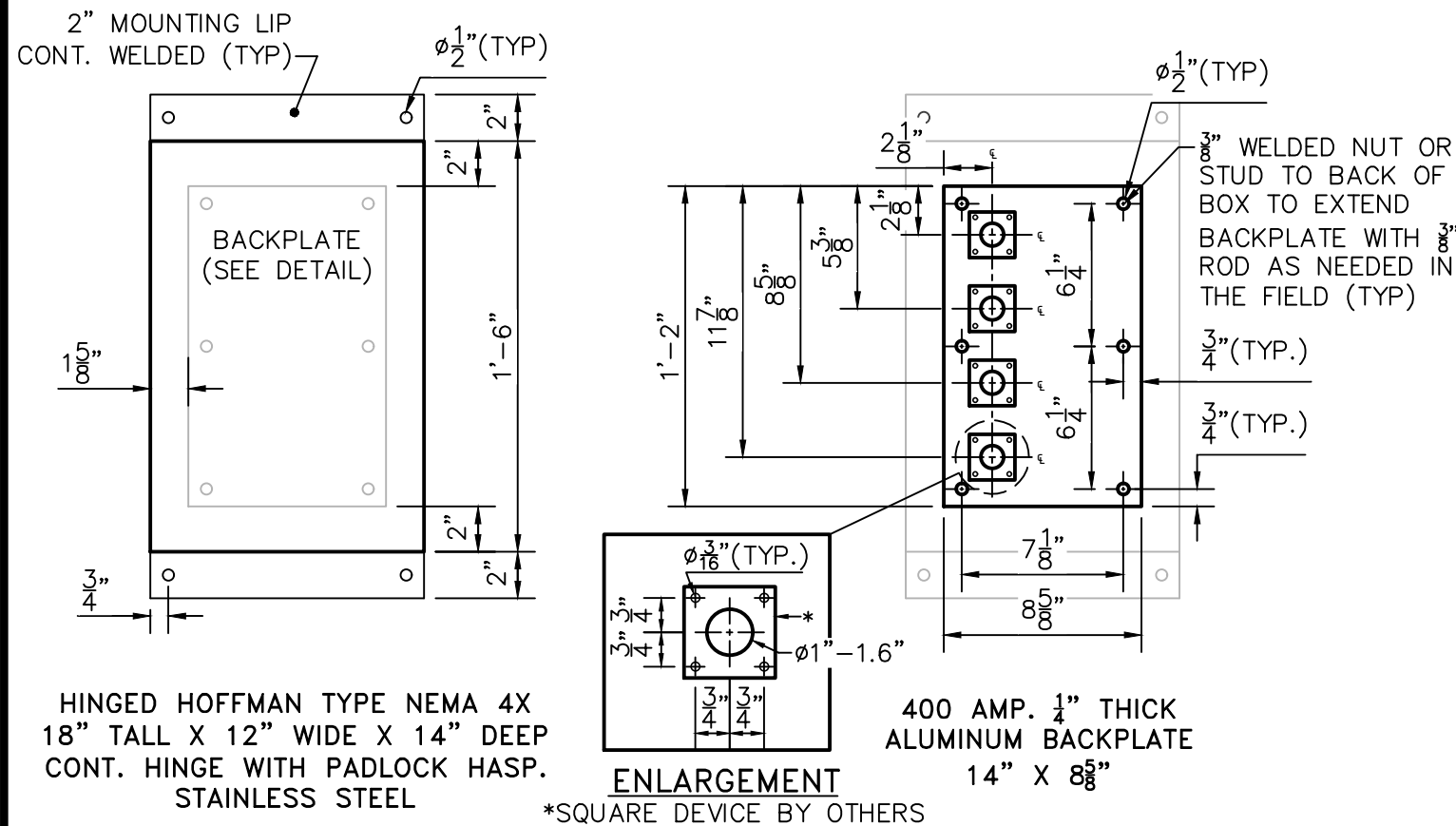
All measurements from center of casting



STANDARD DESIGN DETAIL

BOLLARD LOCATION DETAIL

DRAWING NO.  
103  
SHEET  
1 OF 1  
DATE  
9/2018



NOTES:

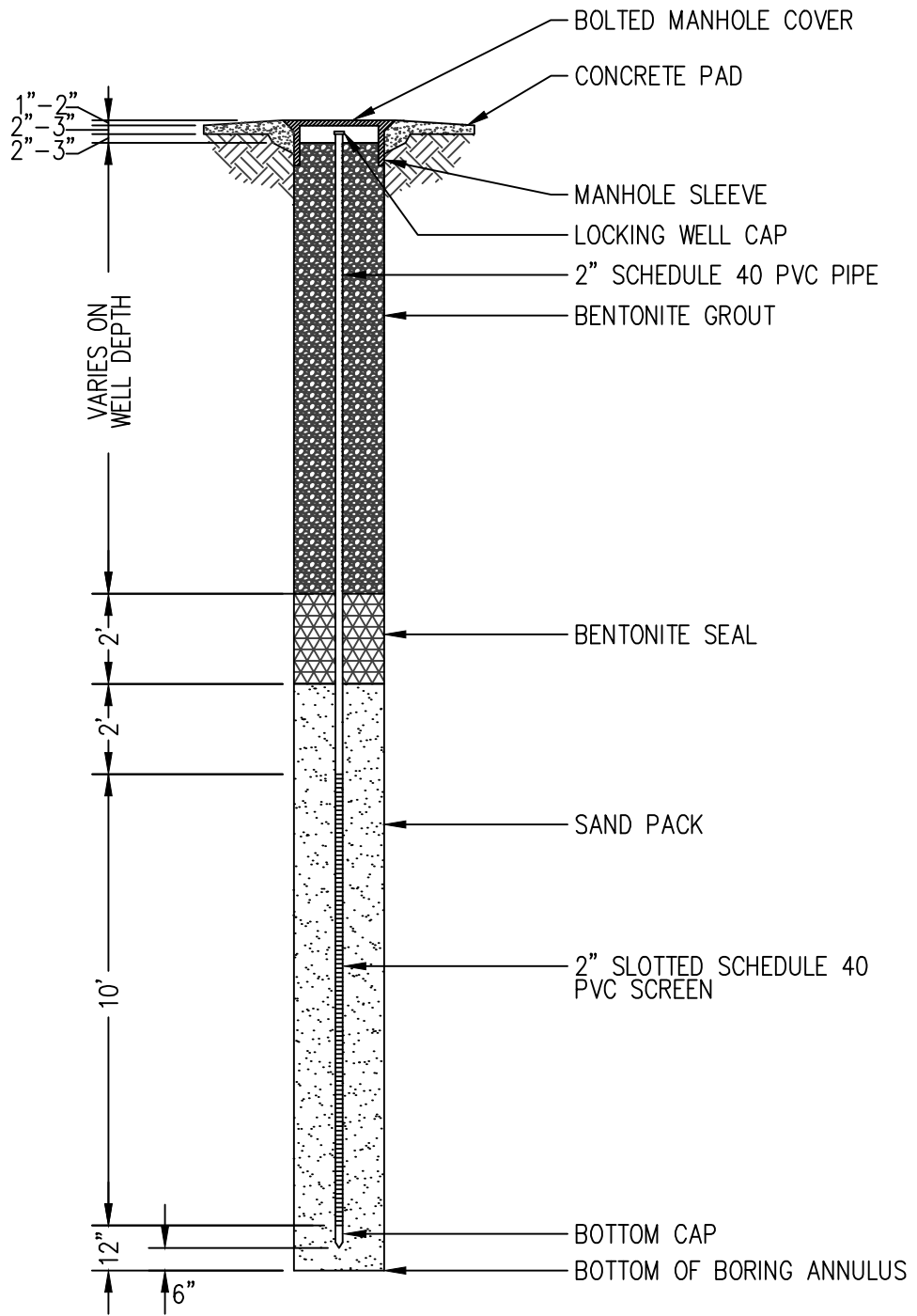
1. TYPICAL DIMENSIONS SHOWN FOR VARIOUS SERVICE SIZES. BOX MUST BE FIELD VERIFIED PRIOR TO FABRICATION AND INSTALLATION.



STANDARD DESIGN DETAIL

LOAD TEST HINGED BANK BOX

DRAWING NO.  
104  
SHEET  
1 OF 1  
DATE  
9/2018



\*SEE PAGE 2 FOR DETAIL NOTES

NOT TO SCALE


	<b>STANDARD DESIGN DETAIL</b>	DRAWING NO. 105A
	<b>FLUSH-MOUNT GROUNDWATER MONITORING WELL</b>	SHEET 1 OF 2
		DATE 9/2018

WELL DEPTH (FT)	PVC PIPING DIAMETER	SCREEN LENGTH* (FT)	SLOTING SIZE	RISER PIPE LENGTH (FT)	FILTER SAND MEDIA	SEALING MEDIA	SURFACE FINISHING
12	0.75 ID	9	0.010	2.5	#2	BENTONITE GROUT/NEAT CEMENT	FLUSH MOUNT CASING
17	0.75 ID	13	0.010	3.5	#2	BENTONITE GROUT/NEAT CEMENT	FLUSH MOUNT CASING

\*SCREENS LENGTHS COME IN 3FT AND 5FT SECTIONS

NOTES:

1. ONCE THE SCREEN INTERVAL IS INSTALLED, A MINIMUM OF 2 FEET OF SAND SHOULD BE PLACED ABOVE THE SCREEN. ONCE INSTALLED, A MINIMUM OF ONE FOOT THICK SEAL OF BENTONITE SLURRY OR NEAT CEMENT GROUT SHOULD BE PLACED.
2. AT FINAL SURFACE GRADE, THE MONITORING WELL SHALL BE PROTECTED WITH FLUSH MOUNT RISER CASING.
3. UPON COMPLETION OF WELL INSTALLATION, THE CONTRACTOR WILL DEVELOP THE WELL TO REMOVE SILT FROM WITHIN THE SCREEN INTERVAL.

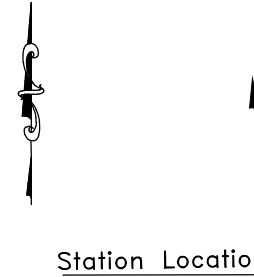
	<b>STANDARD DESIGN DETAIL</b>	<small>DRAWING NO.</small> 105B
		<small>SHEET</small> 2 OF 2
	<b>FLUSH-MOUNT GROUNDWATER MONITORING WELL</b>	<small>DATE</small> 9/2018

LOCATION SKETCH

NOT TO SCALE

"STATION NAME" PUMP STATION

#XXX



Station Location

VICINITY MAP

SCALE: 1" = 1 MILE

SITE ADDRESS: XXXXXXXXXXXX

HORIZONTAL CONTROL:

VIRGINIA STATE PLANE COORDINATE SYSTEM, SOUTH ZONE  
NORTH AMERICAN DATUM 1983/1996 CORS ADJUSTMENT (US SURVEY FOOT)

NORTH (FT):     X,XXX,XXX.XX     EAST (FT):     XX,XXX,XXX.XX      
NORTH (m):     X,XXX,XXX.XXX     EAST (m):     X,XXX,XXX.XXX      
LATITUDE:     XX°XX'XX.XXXXX"     N LONGITUDE:     XX°XX'XX.XXXXX"     W  
SCALE FACTOR:     X.XXXXXXXXXX     CONVERGENCE:     X°XX'XX.XXXXX"    

DESCRIPTION:

TO REACH THE DISK FROM XXXXXXXX

VERTICAL CONTROL:

NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD 88)  
U.S. SURVEY FEET (DIFFERENTIAL LEVELING)  
ELEVATION     XX.XX'    

DATE ESTABLISHED: \_\_\_\_\_  
GPS DATE:     XX/XX/XXXX      
DATE RECOVERED: \_\_\_\_\_



2389 G AVENUE, NEWPORT NEWS, VA 23602



STANDARD DESIGN DETAIL

RECOVERY SHEET TEMPLATE

DRAWING NO.  
106  
SHEET  
1 OF 1  
DATE  
9/2018