

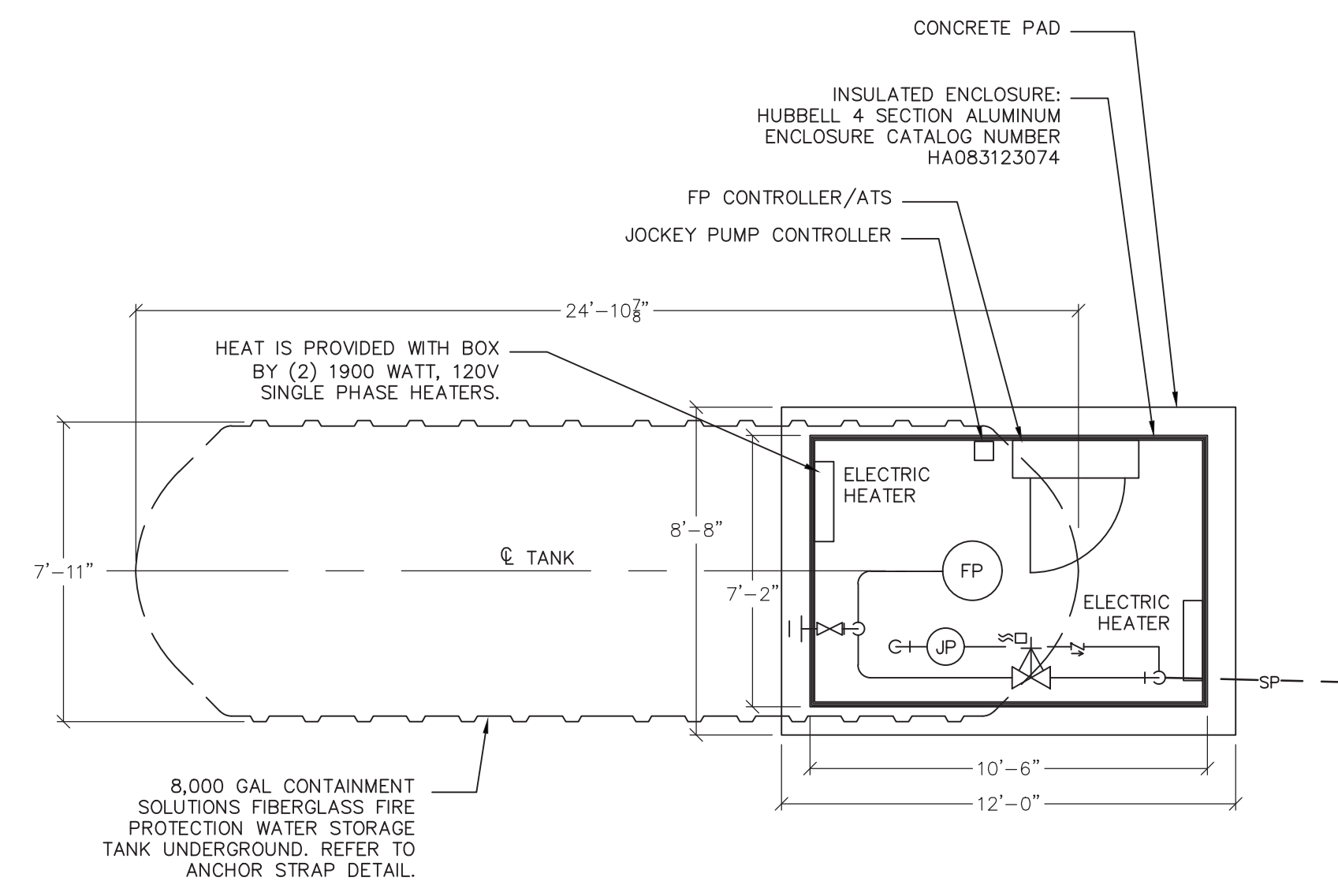
SPRINKLER NOTES:

- THIS SPRINKLER DRAWING IS ISSUED FOR DESIGN BUILD PURPOSES, AND IS INTENDED TO BE SCHEMATIC IN NATURE. THE CONTRACTOR IS RESPONSIBLE TO DESIGN THE SYSTEM IN COMPLETE COMPLIANCE WITH ALL CODES AND REGULATIONS AND SUBMIT SIGNED & SEALED SHOP DRAWINGS AND HYDRAULIC CALCULATIONS. SEE SPECIFICATIONS FOR DETAILS. SHOP DRAWINGS SHALL BE SUBMITTED FOR REVIEW AND APPROVED BY THE AUTHORITY HAVING JURISDICTION, PRIOR TO THE INSTALLING OF ANY SPRINKLER HEADS.
- ALL EQUIPMENT SHOWN PROVIDED BY SPRINKLER CONTRACTOR FROM BACKFLOW PREVENTER THROUGH TO ALL SPRINKLER HEADS, INCLUDING BACKFLOW PREVENTER, AMES, WATTS, OR EQUAL.
- THE NUMBER OF HEADS SHOWN ON DRAWINGS IS INDICATIVE OF THE COVERAGE REQUIRED AS PER NFPA 13. THE ACTUAL NUMBER OF HEADS SHALL BE DETERMINED BY THE FINAL DETAIL DESIGNER OF THE SYSTEM. THE FINAL DESIGN SHALL BE BY A LICENSED PROFESSIONAL ENGINEER AND SHALL BE SUBMITTED FOR APPROVAL BY THE AUTHORITY HAVING JURISDICTION.
- PROVIDE CONCEALED PENDENT HEADS IN AREAS WITH CEILINGS, VIKING QUICK RESPONSE OR EQUAL.
- PROVIDE UPRIGHT HEADS IN AREAS WITHOUT CEILINGS, VIKING QUICK RESPONSE OR EQUAL.
- PROVIDE SIDEWALL HEADS VIKING QUICK RESPONSE OR EQUAL.
- CONTRACTOR SHALL HIGHLIGHT ANY EXPOSED PIPING ON SHOP DRAWINGS AND CONFIRM WITH ARCHITECT BEFORE INSTALLATION.
- PROVIDE FLEXIBLE HEADS AND LOCATE IN CENTER OF TILES, TYPICAL. ALIGN HEADS THROUGHOUT SPACES AS DIRECTED BY ARCH. PROVIDE ADDITIONAL HEADS AS REQUIRED TO MAINTAIN ALIGNMENTS.

SPRINKLER LEGEND:

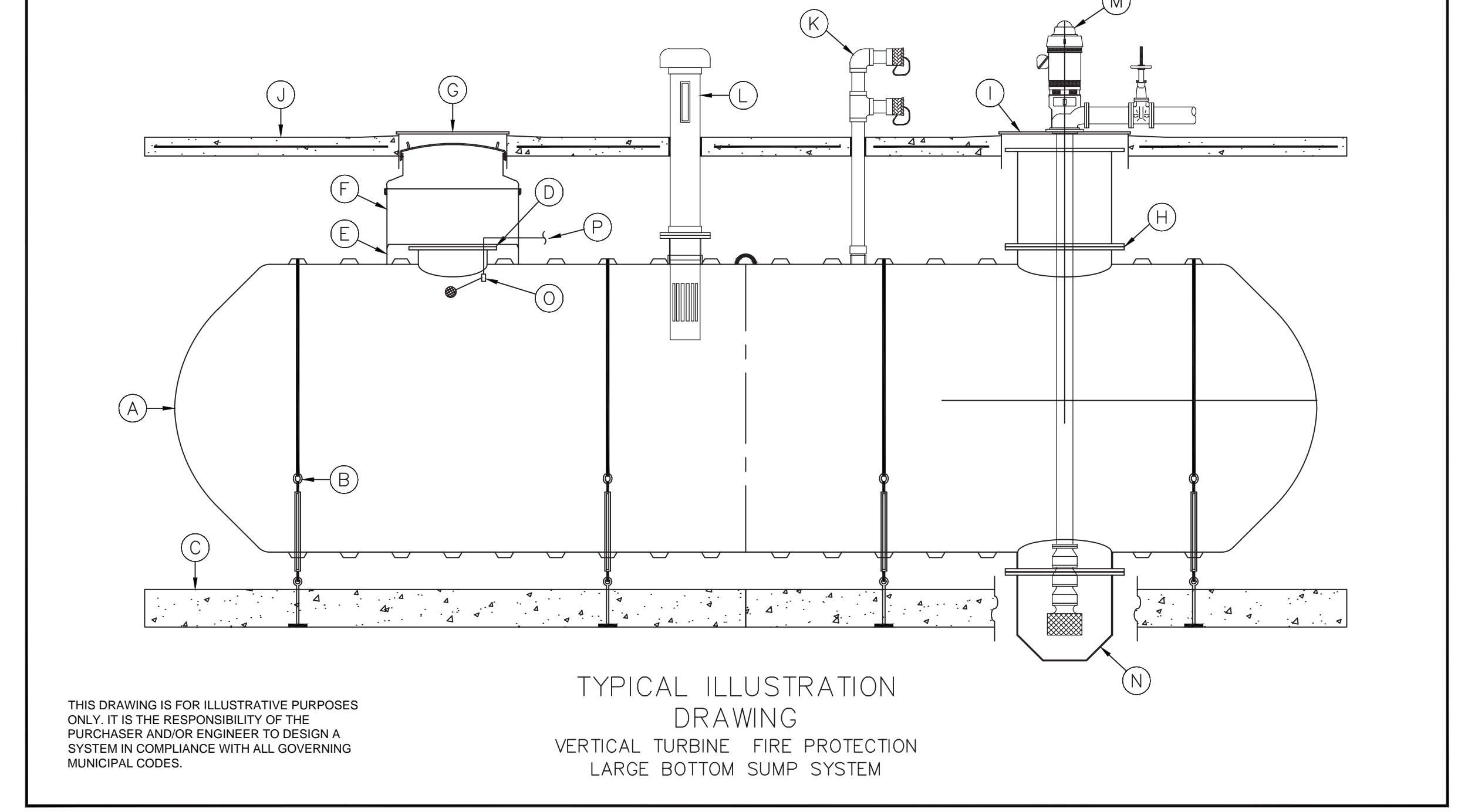
- ⊗ U EXPOSED UPRIGHT HEAD
- CONCEALED PENDENT HEAD
- ⊗ P PENDENT, QUICK RESPONSE INSTITUTIONAL HEAD AS MANUFACTURED BY THE RELIABLE AUTOMATIC SPRINKLER CO. MODEL XL-INST.
- ⊗ H SIDE WALL HEAD
- ⊗ D SIDE WALL HEAD, DRY TYPE
- ⊗ OS&Y GATE VALVE
- ⊗ CHECK VALVE
- ⊗ WATERFLOW SWITCH
- ⊗ FIRE SIAMOSE CONNECTION
- ⊗ GAUGE

SPRINKLER DESIGN
LIGHT HAZARD



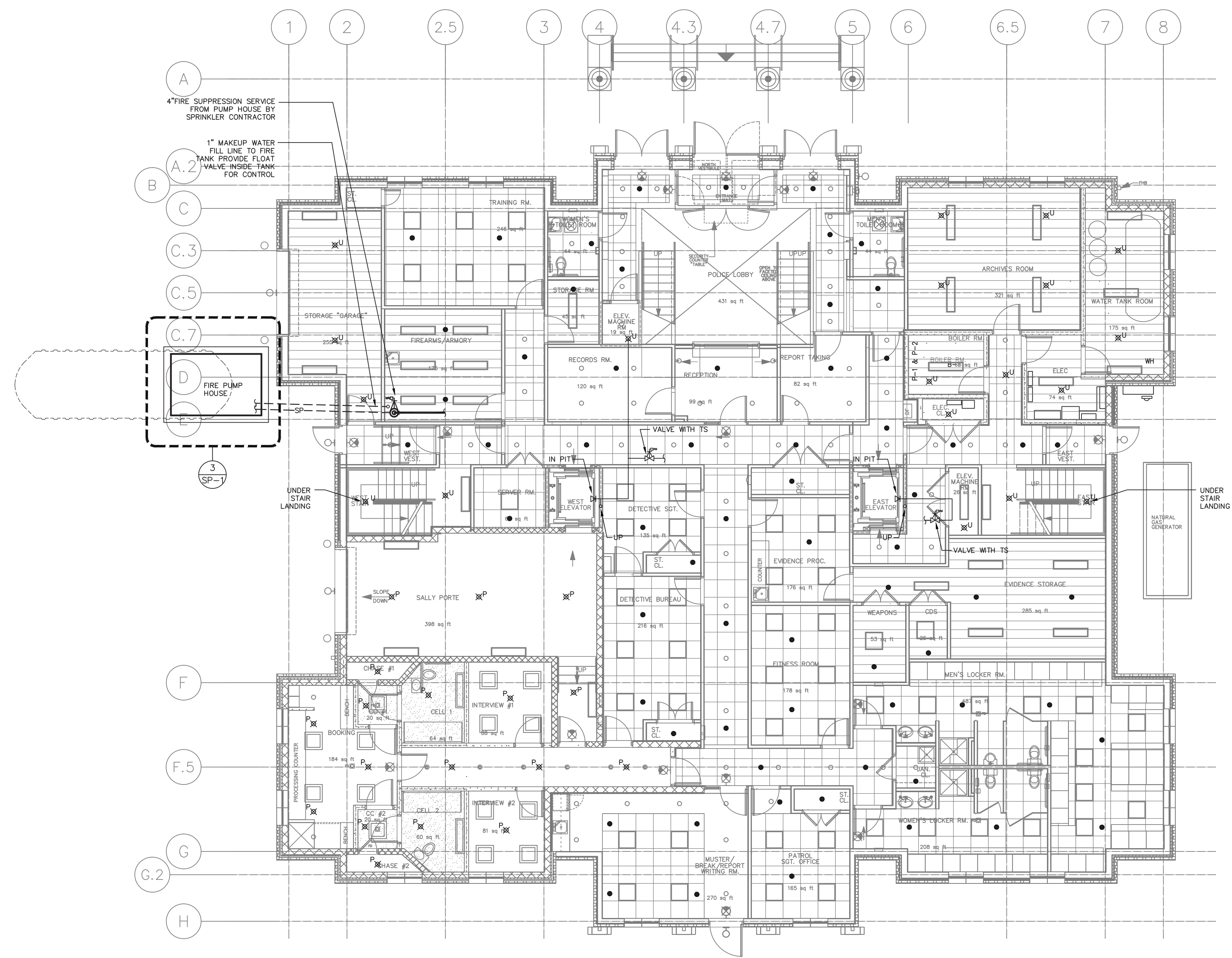
3 FIRE PUMP HOUSE PART PLAN
1/4" = 1'-0"

MARK	EQUIPMENT LISTING AND SUPPLIER	CSI	CUSTOMER	MARK	EQUIPMENT LISTING AND SUPPLIER	CSI	CUSTOMER
A	C.S.I. SINGLE WALL FIBERGLASS TANK	X		I	42" DIAMETER MANHOLE AND COVER		X
B	C.S.I. FRP HOLD DOWN STRAP & TURNBUCKLE ASSEMBLY	X		J	H-20 AXLE LOAD CONCRETE APRON		X
C	C.S.I. PRECAST DEADMAN ANCHOR WITH EYEBOLTS	X		K	4" NPT FTG w/ DUAL NST FILL OR RECIRCULATING POINTS	X	
D	22" FRP FLANGED MANWAY	X		L	10" NPT FITTING WITH VENT/LEVEL INDICATOR ASSEMBLY	X	
E	42" ATTACHED CONTAINMENT COLLAR	X		M	VERTICAL PUMP w/ DISCHARGE HEAD AND MULTI STAGE BOWL	X	
F	42" TANK SUMP WITH 32" I.D. OPENING	X		N	30" FRP FLANGED BOTTOM SUMP FOR VERTICAL TURBINE	X	
G	36" DIAMETER MANHOLE AND COVER	X	X	O	TANK REFILL INLET FLOAT VALVE	X	
H	30" FRP FLANGED MANWAY w/ 42" FRP FLANGED MANWAY EXTENSION	X		P	1" WATER MAKEUP FILL LINE	X	

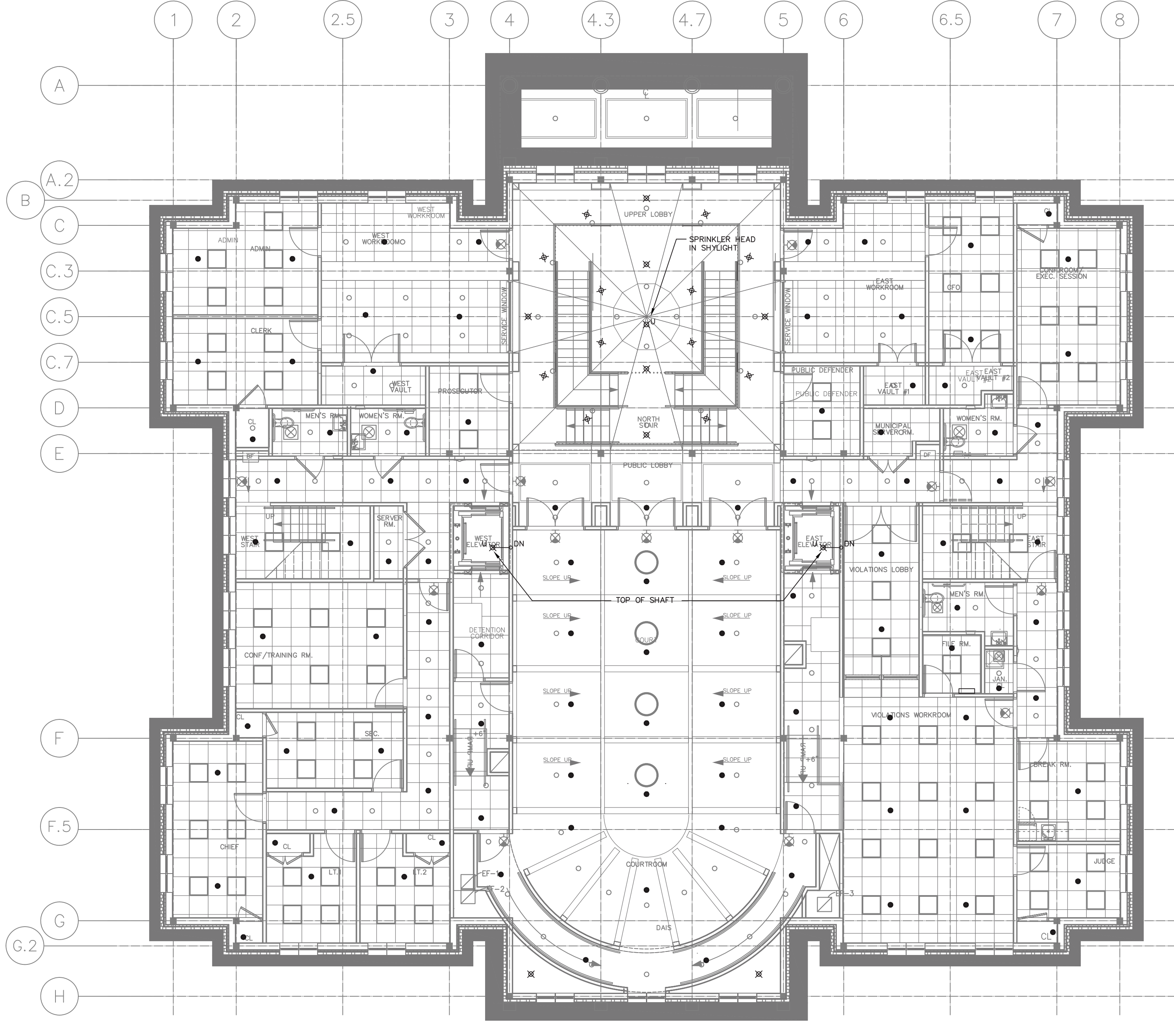


THIS DRAWING IS FOR ILLUSTRATIVE PURPOSES ONLY. IT IS THE RESPONSIBILITY OF THE PURCHASER AND/OR ENGINEER TO DESIGN A SYSTEM IN COMPLIANCE WITH ALL GOVERNING MUNICIPAL CODES.

TYPICAL ILLUSTRATION DRAWING
VERTICAL TURBINE FIRE PROTECTION LARGE BOTTOM SUMP SYSTEM



1 FIRST FLOOR PLAN
SCALE: 1/8" = 1'-0"



2 SECOND FLOOR PLAN
SCALE: 1/8" = 1'-0"

ALAN KUN, PE, STRUCTURAL ENGINEER
100 S. VALLEY STREET, SUITE 200
MORRISTOWN, NJ 07960
PHONE: (973) 261-2007
FAX: (973) 261-2008
WWW.KUNENGINEERS.COM

FRANK H. ALPHR ASSOCIATES, P.C., MECHANICAL & ELECTRICAL ENGINEERS
100 S. VALLEY STREET, SUITE 200
MORRISTOWN, NJ 07960
PHONE: (973) 261-2007
FAX: (973) 261-2008
WWW.KUNENGINEERS.COM

ROBERT B. BOWEN, P.E., MECHANICAL & ELECTRICAL ENGINEER
100 S. VALLEY STREET, SUITE 200
MORRISTOWN, NJ 07960
PHONE: (973) 261-2007
FAX: (973) 261-2008
WWW.KUNENGINEERS.COM

LEON A. LEONARDI, P.E., MECHANICAL & ELECTRICAL ENGINEER
100 S. VALLEY STREET, SUITE 200
MORRISTOWN, NJ 07960
PHONE: (973) 261-2007
FAX: (973) 261-2008
WWW.KUNENGINEERS.COM

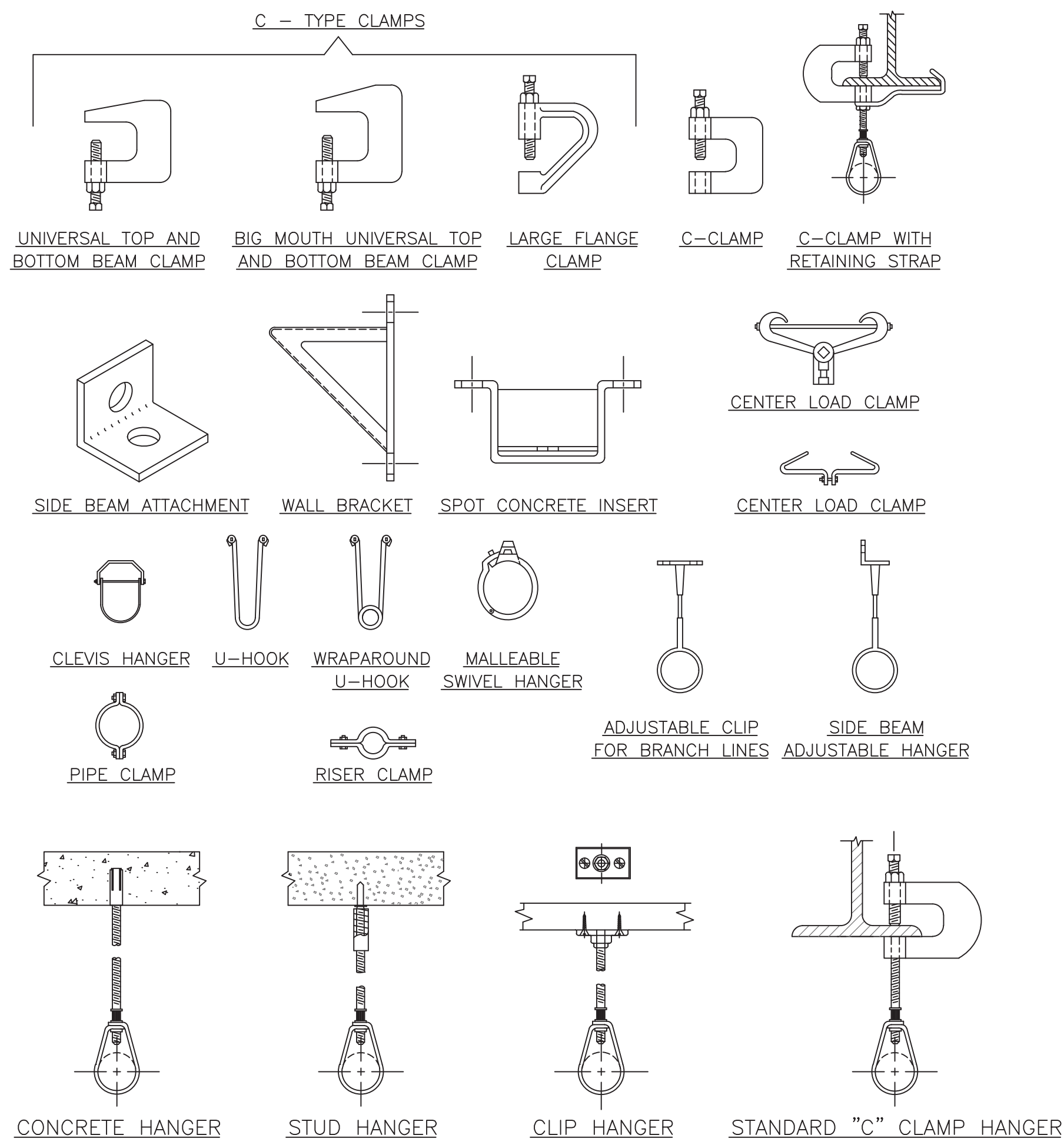
THE GOLDSTEIN PARTNERSHIP ARCHITECTS
515 VALLEY STREET, SUITE 110, MAPLEWOOD, NJ 07040
PHONE: (973) 781-4550
WWW.GOLDSTEINPARTNERSHIP.COM
COPYRIGHT © 2015 BY THE GOLDSTEIN PARTNERSHIP. ALL RIGHTS RESERVED.

NEW MUNICIPAL BUILDING COLTS NECK TOWNSHIP
BLOCK 18, LOT 11
COLTS NECK TOWNSHIP
MONMOUTH COUNTY, NEW JERSEY

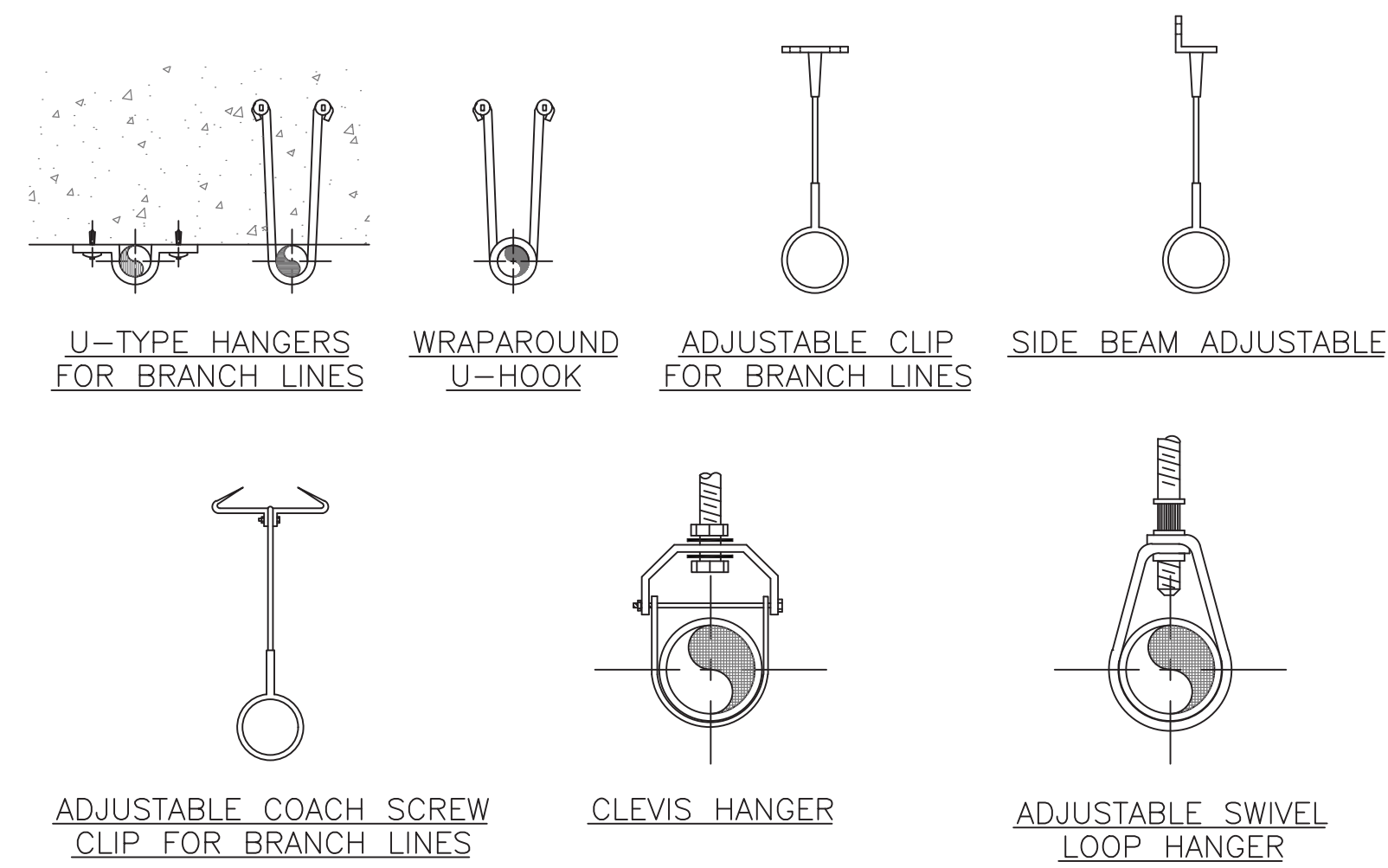
SPRINKLER FIRST & SECOND FLOOR PLANS
DVAN, GSKIN
CKD, MABP
SCALE: AS NOTED
DATE: 01/01/20 REV 1

THIS DRAWING IS INCOMPLETE UNLESS USED WITH ALL OTHER CONTRACT DOCUMENTS.

DRAWING NUMBER
SP-1
SHEET 25 OF 62



COMMON TYPES OF ACCEPTABLE HANGERS

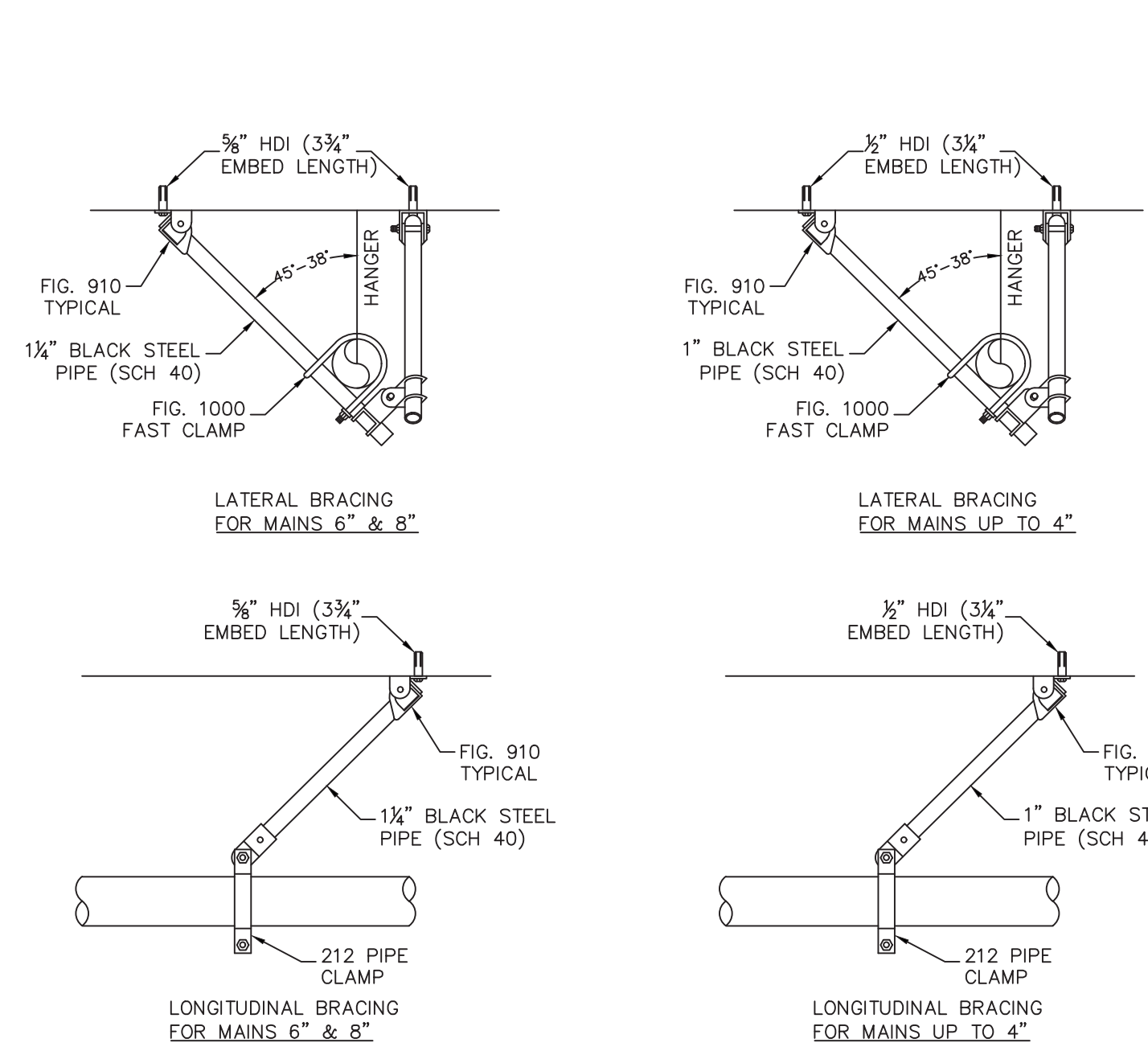


EXAMPLES OF ACCEPTABLE HANGERS FOR END OF LINE (OR ARM OVER) PENDENT SPRINKLERS

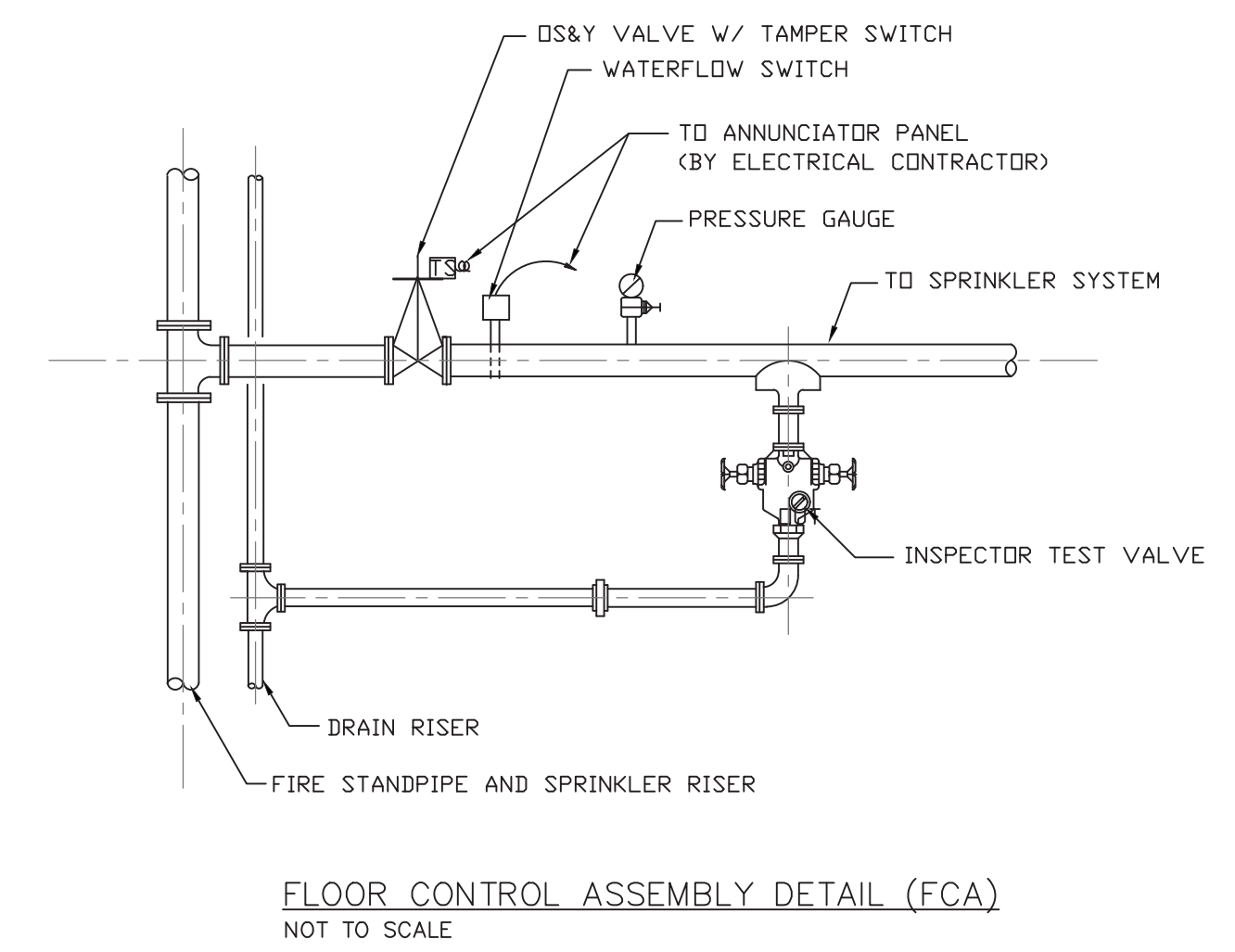
UL APPROVED VERTICAL TURBINE FIRE PUMP								
GPM	PSI HEAD	SUCT. PRESS.	PSI FLANGE	SUCTION/DISCH.	VOLTS	RPM	HP	AURORA MODEL
250	100	40	250	3"	208/3ø	3550	30	914

- PROVIDE - AUTOMATIC AIR RELEASE VALVE
 - 3" DIA. SUCTION & DISCHARGE GAUGES
 - CASING RELIEF VALVE
 - 3" MAIN RELIEF VALVE W/ 3/3 ENCLOSED WASTE CORE
 - ACROSS THE LINE MOTOR CONTROLLER

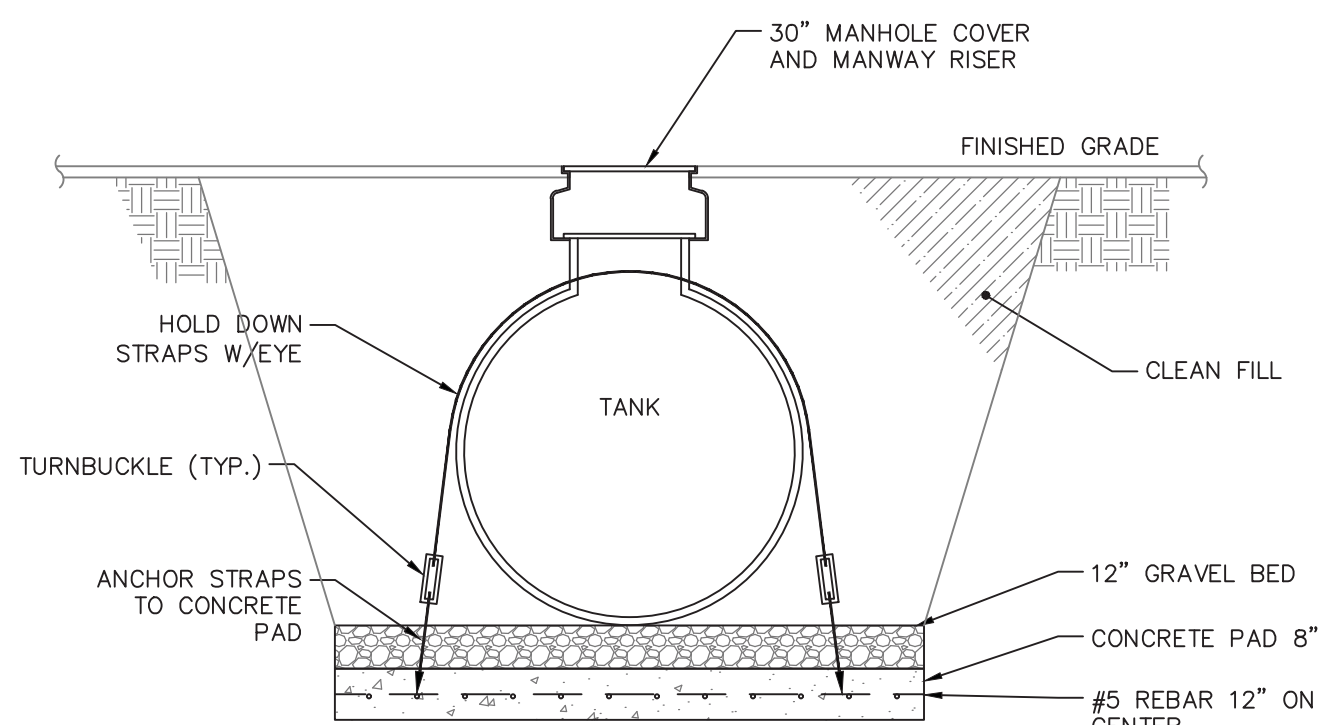
UL APPROVED JOCKEY PUMP								
GPM	PSI HEAD	VOLTS	PSI FLANGE	HP	RPM	SUCTION/DISCH.	STAGE	AURORA MODEL
2.5	55	208/3ø	250	1/2	3500	1 1/4"	MULTI	933



DETAIL OF EARTHQUAKE SWAYBRACE COMPONENTS ANCHORING TO CONCRETE. N.T.S.

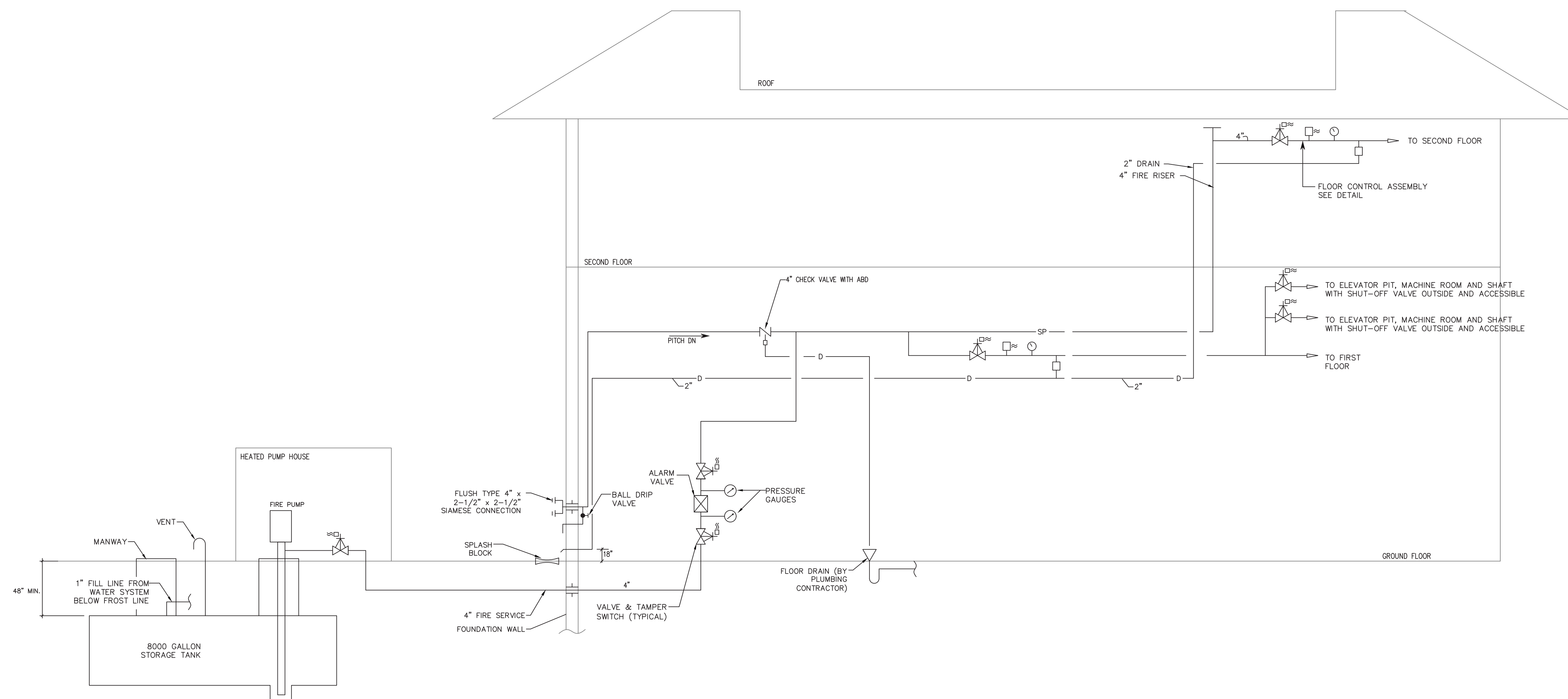


FLOOR CONTROL ASSEMBLY DETAIL (FCA) NOT TO SCALE



STORAGE TANK ANCHOR STRAP DETAIL SCALE: NONE

- NOTES:
 1. TANK SHALL BE CAPABLE OF WITH STANDING 10,000 LBS OF BUOYANCY FORCE.
 2. STRAPS SHALL BE 4" MINIMUM WIDTH.



SPRINKLER RISER DIAGRAM NOT TO SCALE

ALAN KUN, P.E. STRUCTURAL ENGINEER
 1000 W. 222ND ST. SUITE 202
 OMAHA, NE 68104
 T: (402) 444-0233 F: (402) 444-0300
 FRANK H. LIPKOWSKI, P.E. MECHANICAL & ELECTRICAL ENGINEER
 10110 W. 222ND ST. SUITE 202
 OMAHA, NE 68104
 T: (402) 444-0233 F: (402) 444-0300
 ROBERT B. WINTER, P.E. MECHANICAL & ELECTRICAL ENGINEER
 10110 W. 222ND ST. SUITE 202
 OMAHA, NE 68104
 T: (402) 444-0233 F: (402) 444-0300
 LARRY A. GARDNER, P.E. MECHANICAL & ELECTRICAL ENGINEER
 10110 W. 222ND ST. SUITE 202
 OMAHA, NE 68104
 T: (402) 444-0233 F: (402) 444-0300

THE GOLDSTEIN PARTNERSHIP ARCHITECTS
 515 VALLEY STREET, SUITE 110, MAPLEWOOD, NJ 07040
 OFC: 973-781-6500
 FAX: 973-781-6501
 WWW.GOLDSTEINPARTNERSHIP.COM
 COPYRIGHT © 2015 BY THE GOLDSTEIN PARTNERSHIP. ALL RIGHTS RESERVED.

NEW MUNICIPAL BUILDING COLTS NECK TOWNSHIP
 BLOCK 18, LOT 11
 COLTS NECK TOWNSHIP
 MONMOUTH COUNTY, NEW JERSEY

SPRINKLER DETAILS
 SCALE: AS NOTED
 DATE: 01/02/20 REV 1
 DWG: GRUN CKD: MARP

THIS DRAWING IS INCOMPLETE UNLESS USED WITH ALL OTHER CONTRACT DOCUMENTS.

DRAWING NUMBER
SP-2
 SHEET 26 OF 62