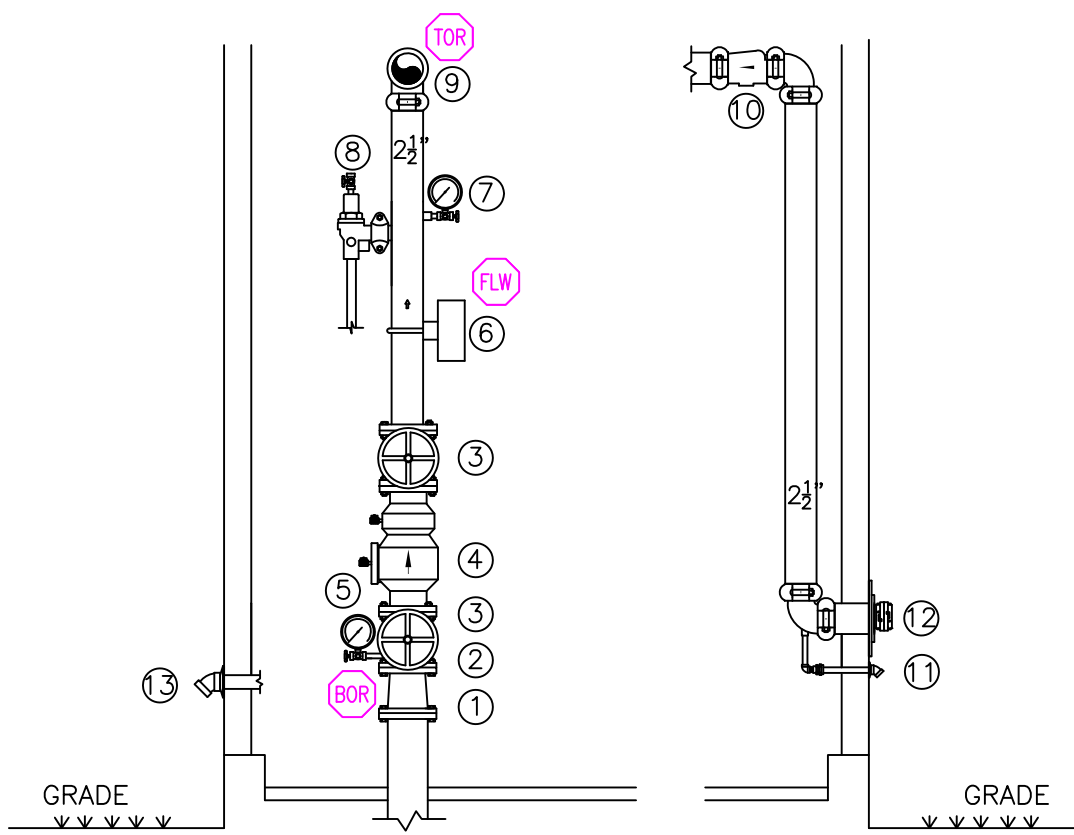
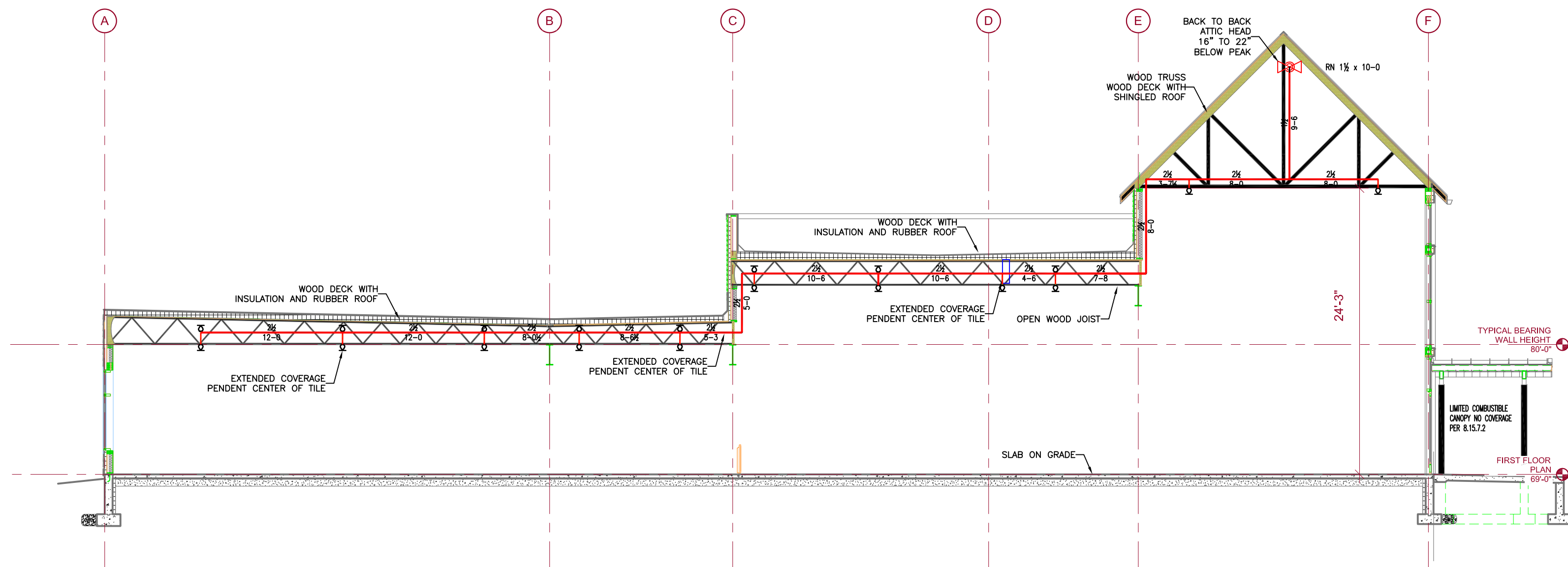


**SPRINKLER RISER COMPONENTS**

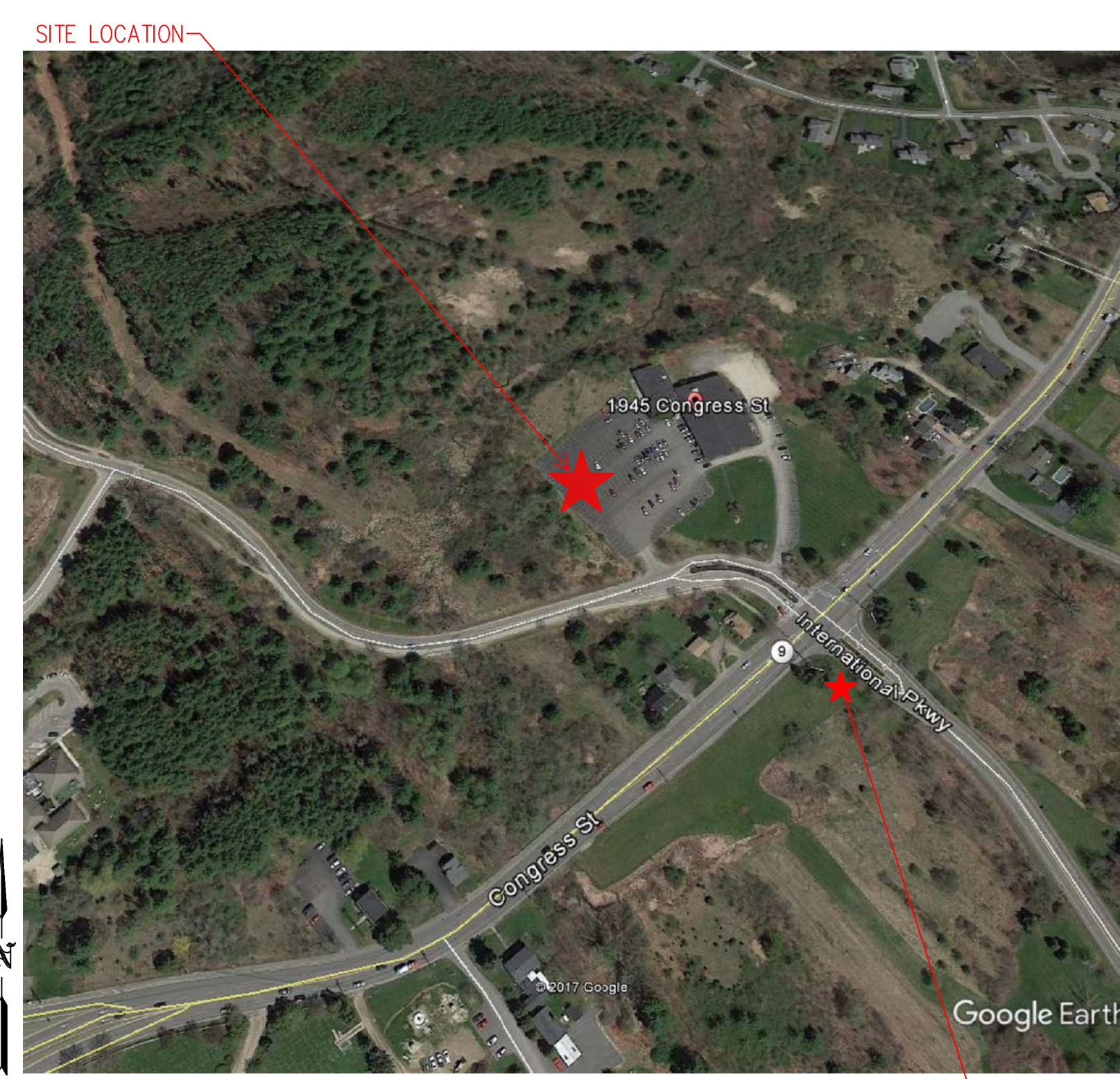
1. 6" DI. UNDERGROUND
2. 6" X 2 1/2" FLANGED CONCENTRIC TO GATE VALVE
3. 2 1/2" OS&Y GATE VALVE WITH ROTTER OYSTU-1 TAMPER SWITCH
4. 2 1/2" BRASS SHOCK BACKFLOW PREVENTER
5. SUPPLY PRESSURE GAUGE
6. NAME TYPE FLOW SWITCH
7. SYSTEM PRESSURE GAUGE
8. 1 1/4" TEST-N-DRAIN W/ RELIEF VALVE PIPED TO EXTERIOR (SEE PLAN FOR LOCATION)
9. 2 1/2" WET SYSTEM RISER TO ENTIRE BUILDING
10. 2 1/2" DRINK CHECK VALVE FOR F.D.C. FEED 48" MINIMUM FROM EXTERIOR
11. 1/2" AUTOMATIC BALL DRIP PIPED TO EXTERIOR
12. (3) 3 1/2" STORV F.D.C. 48" ABOVE GRADE (SEE PLAN FOR LOCATION)
13. 1 1/4" MAIN DRAIN DISCHARGE TO EXTERIOR (SEE PLAN FOR LOCATION)



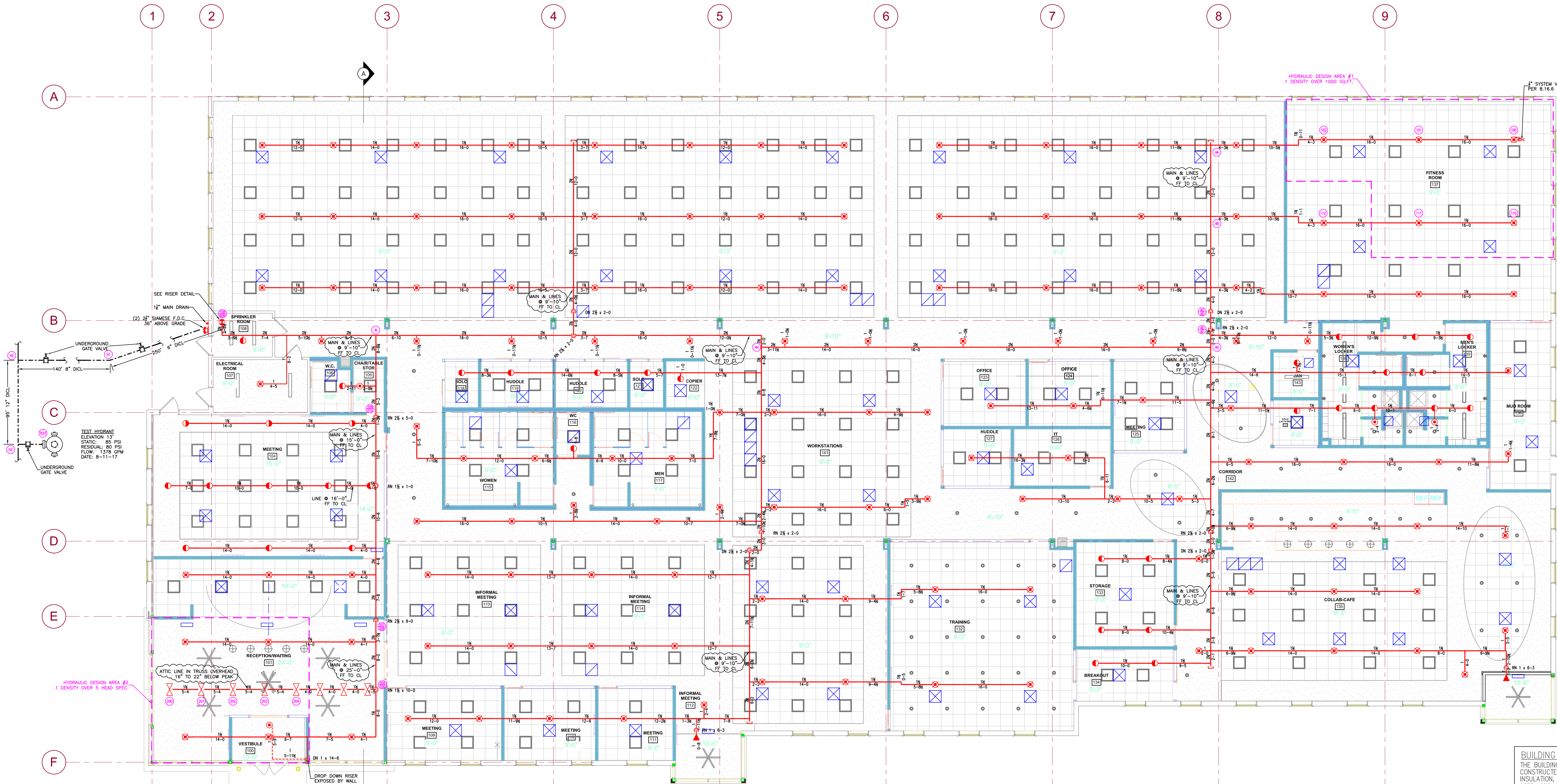
**1.1 RISER DETAIL**  
SCALE: N.T.S.



**1.2 SECTION 'A'**  
SCALE 1/8" = 1'-0"



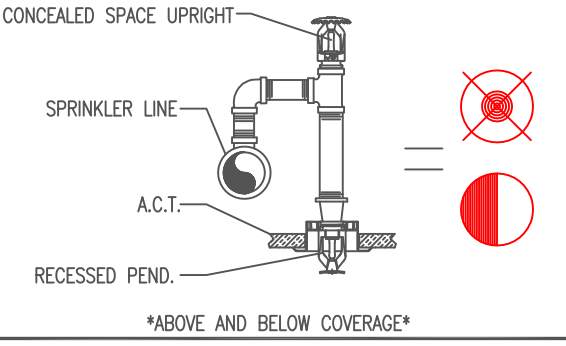
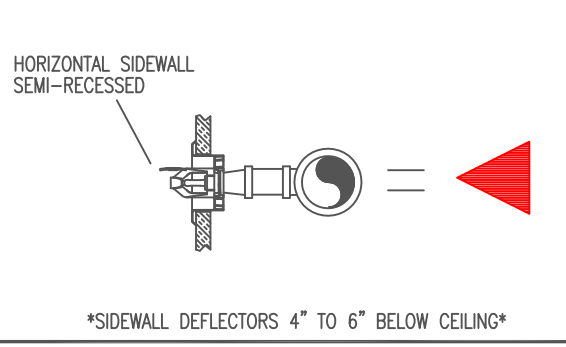
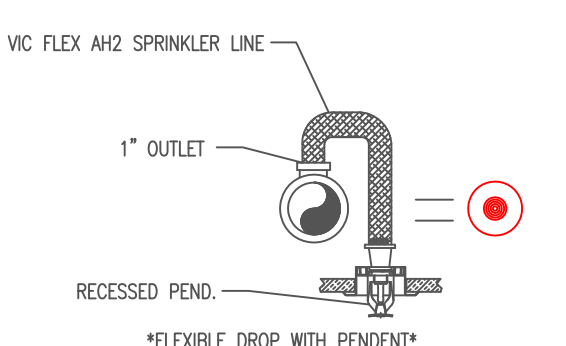
**1.3 PLOT PLAN**  
SCALE: N.T.S.



**\*DESIGN AREA NUMBER 2\***  
**HYDRAULIC DESIGN CRITERIA**  
LOCATION: CONDITIONED ATTIC SPACE  
TYPE OF SYSTEM: NFPA 13 WET  
AREA OF OPERATION: 3-HEAD-SPEC  
DENSITY: 1.5/ HOSE DEMAND OF 100 GPM  
HAZARD CLASS: LIGHT HAZARD  
HEAD SPACING: 240 SQ.FT.  
SYSTEM DEMAND INCLUDING HOSE @ BASE OF RISER= 223-GPM 61-PSI  
SAFETY MARGIN= 24-PSI

**1 GROUND FLOOR (WET)**  
TOTAL PROTECTED AREA 25,000 SQ.FT.  
SCALE 1/8" = 1'-0"

**\*DESIGN AREA NUMBER 1\***  
**HYDRAULIC DESIGN CRITERIA**  
LOCATION: FITNESS ROOM  
TYPE OF SYSTEM: NFPA 13 WET  
AREA OF OPERATION: 000-500 FT.  
DENSITY: 1.5/ HOSE DEMAND OF 100 GPM  
HAZARD CLASS: LIGHT HAZARD  
HEAD SPACING: 240 SQ.FT. 18" X 18" MAX  
SYSTEM DEMAND INCLUDING HOSE @ BASE OF RISER= 270-GPM 74-PSI  
SAFETY MARGIN= 11-PSI



**HIGH TECH FIRE PROTECTION**  
P.O. BOX 156  
MINOT, ME. 04258-0258  
TEL: (207) 998-2551 FAX: (207) 998-4187  
MAINE LICENSE # 102

GENERAL CONTRACTOR ON RECORD:  
WRIGHT-RYAN CONSTRUCTION  
PM: TOM CAREY 773-3625  
JS: TIM RIVARD 653-8604

SPECIAL APPLICATIONS:

- LEGEND:
- R/W/DN PIPE RISER UP OR DOWN
  - AUXILIARY DRAIN
  - PROPOSED PIPE
  - SYSTEM RISER
  - PIPE PITCH 1/4" MAINS 1/2" LINES
  - SWAY BRACING
  - HYDRAULIC CALC. POINT

DESIGN & SYSTEM NOTES:  
ALL PIPING 1 1/2" & LARGER TO BE SCHEDULE 10 WITH GROOVED DUCTILE IRON FITTING.  
ALL PIPING 1 1/4" & SMALLER TO BE SCHEDULE 40 WITH APPROPRIATE FITTING.  
POSITION, LOCATION, SPACING, AND USE OF SPRINKLERS SHALL BE IN ACCORDANCE WITH NFPA 13.  
POSITION, LOCATION, SPACING, AND USE OF HANGERS SHALL BE IN ACCORDANCE WITH NFPA 13.  
HYDRAULIC CALCULATION PROCEDURES HAVE BEEN DONE IN ACCORDANCE WITH NFPA 13. (SEE PLANS FOR LOCATION OF REMOTE AREAS, HYDRAULIC REFERENCE POINTS, AND SYSTEM DEMANDS.)  
HIGH TECH FIRE PROTECTION IS TO BEGIN WORK AT 6" MAIN 1" AFF INSIDE OF BUILDING.  
DIMENSIONS AND LOCATIONS GIVEN FOR SPRINKLER HEADS AND PIPE MAY VARY TO ACCOMMODATE ACTUAL FIELD CONDITIONS.  
OWNER TO PROVIDE ADEQUATE HEAT THROUGHOUT BUILDING TO PROTECT WATER FILLED PIPING AND EQUIPMENT FROM FREEZING TEMPERATURES.  
ONLY TR-SEA TYPE COUPLINGS TO BE INSTALLED ON DRY AND OR PRE-ACTION SYSTEMS.  
OWNER IS RESPONSIBLE TO MAINTAIN THE SPRINKLER SYSTEM IN ACCORDANCE WITH THE LATEST EDITION OF NFPA 25, INSPECTION, TESTING, & MAINTENANCE OF WATER-BASED FIRE PROTECTION SYSTEMS AND/OR ALL APPLICABLE FEDERAL, STATE, AND/OR LOCAL LAWS, CODES AND ORDINANCES.  
ALL MECHANICAL, ELECTRICAL AND PLUMBING TRADES TO COORDINATE THEIR WORK WITH SPRINKLER CONTRACTOR.  
ALL ELECTRIC WORK IS TO BE DONE BY OTHERS.

HEAD LEGEND:

- GLOBE\* MODEL GL5601  
K=5.6  
1/2" WHITE PENDENT SEMI-RECESSED ESC.
- GLOBE\* MODEL GL5626  
K=5.6  
1/2" WHITE HORIZONTAL SIDEWALL SEMI REC. ESC.
- GLOBE\* MODEL GL8109 & GL5608  
K=8.0  
3/4" WHITE PENDENT SEMI-RECESSED 18" X 18" SPACING MAX. & CONCEALED SPACE UPR.  
UPR. DEFLECTORS 1 1/2" TO 4" BELOW COMBUSTIBLE JOIST  
16" X 16" SPACING MAX
- GLOBE\* MODEL GL5601 & GL5608  
K=5.6  
1/2" WHITE PENDENT SEMI-RECESSED & CONCEALED SPACE UPR.  
UPR. DEFLECTORS 1 1/2" TO 4" BELOW COMBUSTIBLE JOIST  
16" X 16" SPACING MAX

\*OR APPROVED EQUAL\*

TOTAL HEADS ON THIS SHEET: 315

SCALE: 1/8" = 1'-0"

REVISIONS:  
NO. DATE: DESCRIPTION:

DATE: AUGUST 18, 2017  
DESIGNER: ED PULLIN (RMS# 515)  
NICET LEVEL: IV CERT # 108534  
CHECKED BY: J. FOSS

LOCATION:  
1945 CONGRESS STREET  
PORTLAND, ME

DRAWING TITLE:  
CLARK INSURANCE

FIRE PROTECTION PLAN  
(NFPA 13 2016ed.)

DRAWING NO.:  
FP-01

**PROJECT DESCRIPTION**

**BUILDING CONST.:**  
THE BUILDING IS 1 LEVEL OF BUSINESS OCCUPANCY CONSTRUCTED OF WOOD FRAMING, FIBERGLASS INSULATION, AND GYP BOARD TYPE II CONSTRUCTION. STEEL SPRINKLER PIPING AS SHOWN ON PLAN.

**BUILDING OCCUPANCY:**  
THE BUILDING WAS BUILT & DESIGNED FOR BUSINESS TYPE USE.

**SPRINKLER SYSTEM DESIGN:**  
THERE IS 1 WET NFPA 13 SYSTEM FOR THE ENTIRE BUILDING. EXTENDED COVERAGE PENDENTS FOR THE OFFICE AREAS STANDARD PENDENTS FOR THE STORAGE AREAS: ABOVE AND BELOW COVERAGE THROUGHOUT. GC TO PROPERLY INSULATE AROUND SPRINKLER PIPING TO PREVENT WATER FILLED PIPE FROM FREEZING. THE SPRINKLER SYSTEM WAS DESIGNED TO MEET APPLICABLE CODE REGARDING NFPA 13 2016ed. SYSTEM.