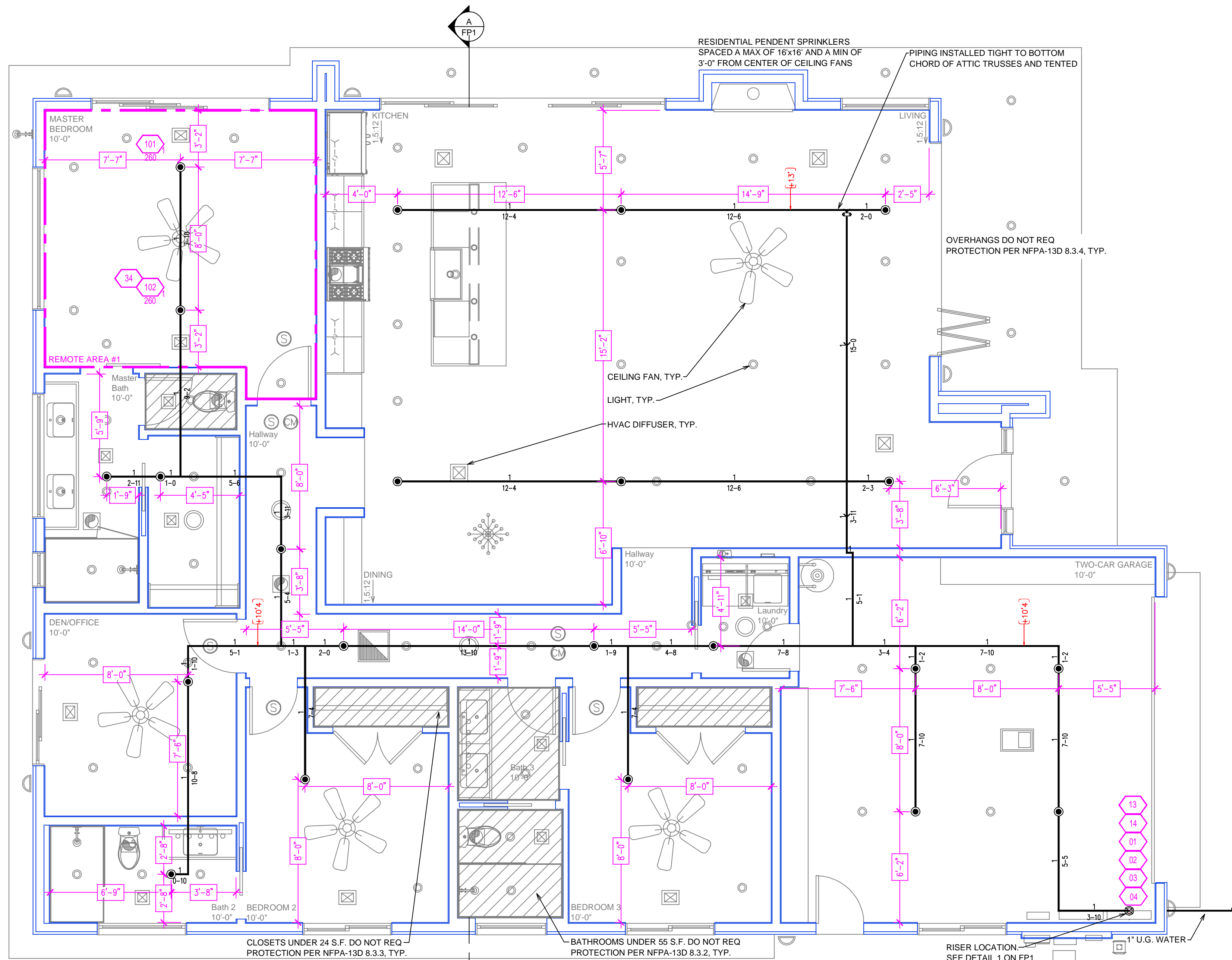
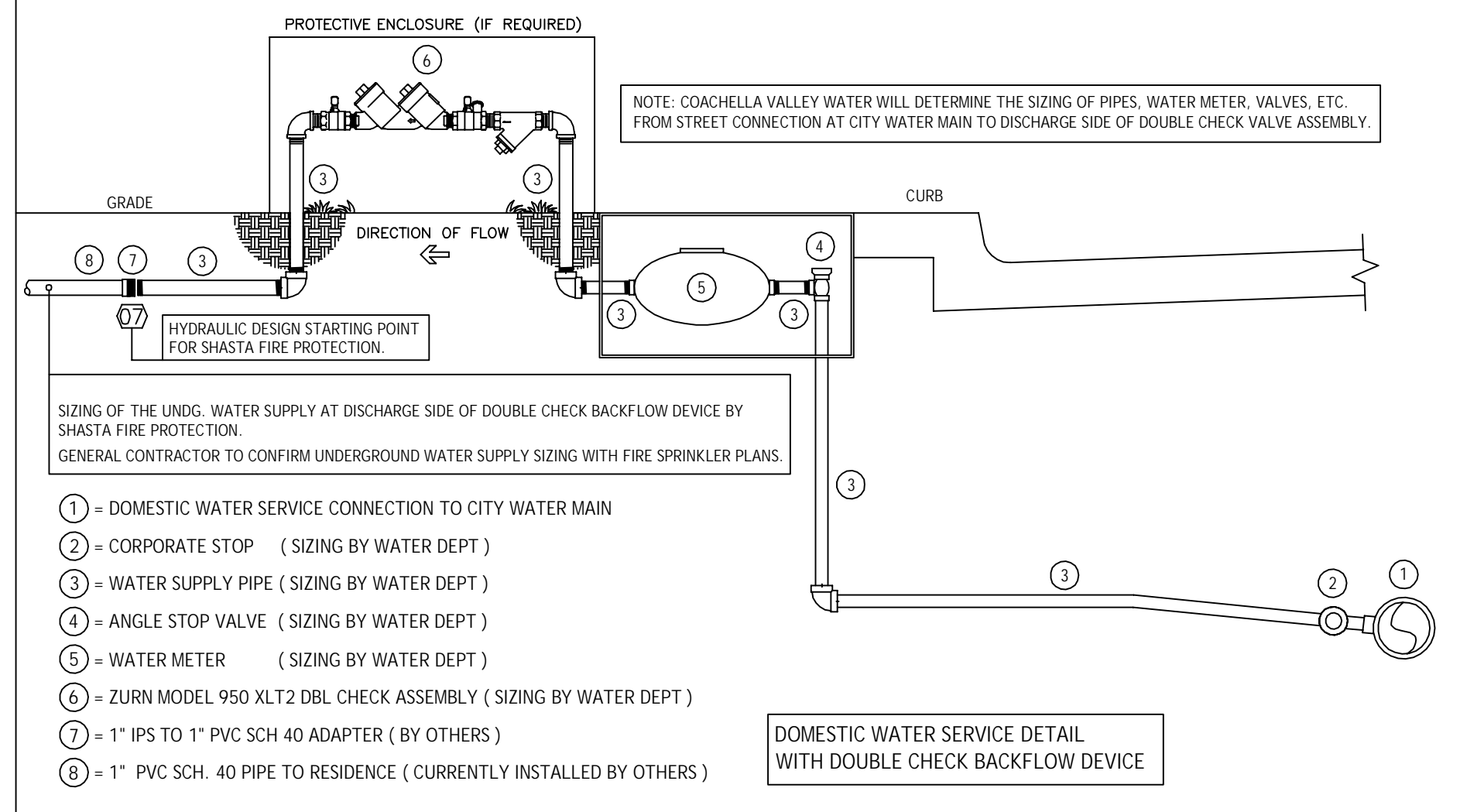
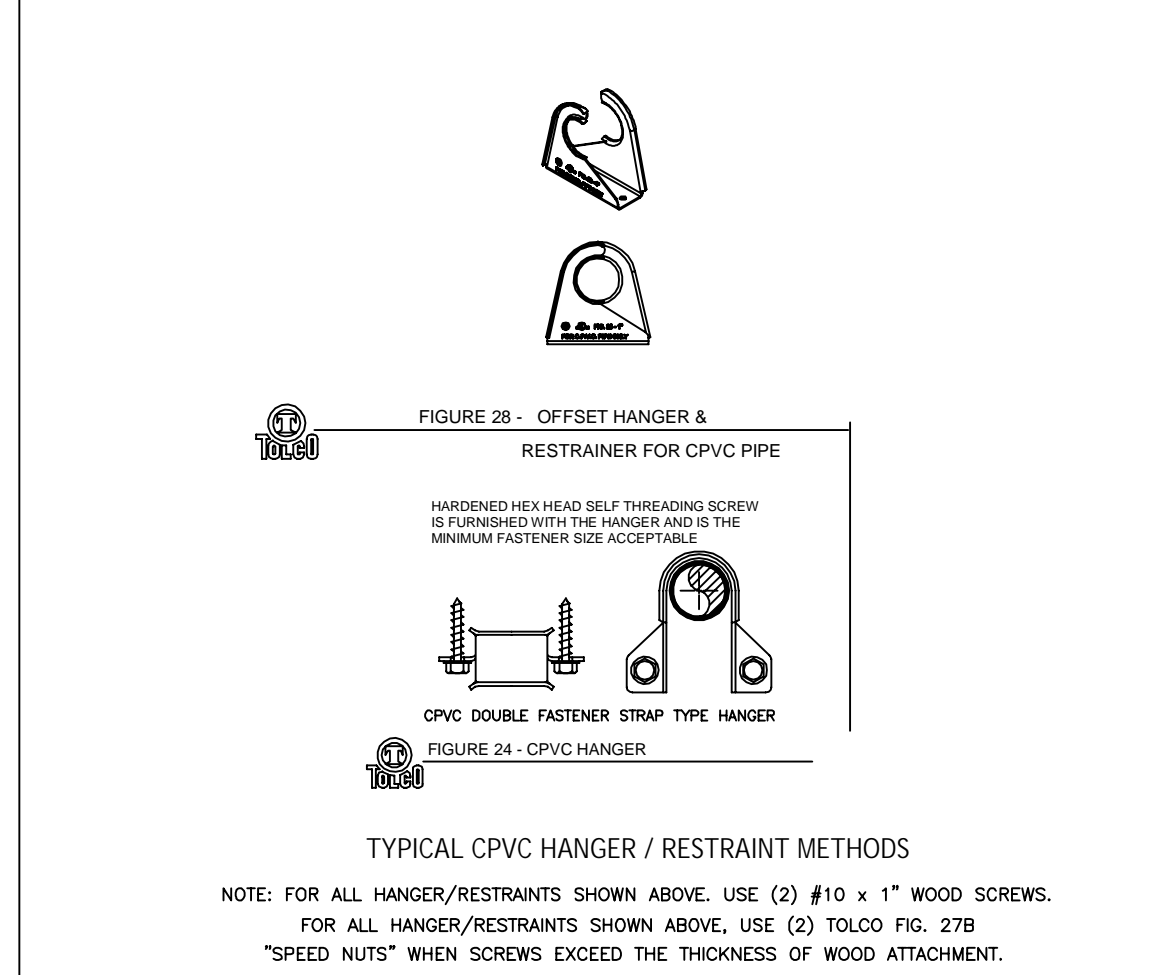


A BUILDING SECTION
SCALE= 1/4" : 1'-0"

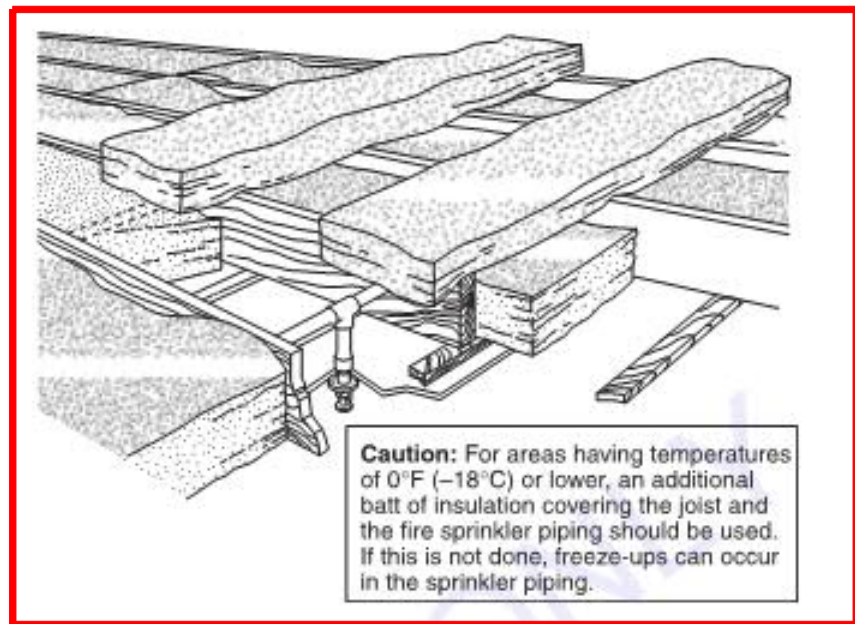


MAIN FLOOR FIRE SPRINKLER PLAN
SCALE= 1/4" : 1'-0"

HYDRAULIC DESIGN INFORMATION	
PROJECT NAME	GRINNELL RESIDENCE
PROJECT ADDRESS	51015 AVENIDA VELASCO - LA QUINTA CA 92253
JOB #	25-012
PLAN DATED	4-8-25
LOCATION OF REMOTE AREA	HYD NODES 101 & 102 (SSP HEADS)
HAZARD CLASSIFICATION	RESIDENTIAL - SINGLE FAMILY DWELLING
DESIGN DENSITY / AREA	0.05 gpm/ft ² REMOTE TWO HEADS
SPRINKLER SPACING MAXIMUM	16' x 16' - 256.0 sq.ft.
MINIMUM SPRINKLER HEAD DISCHARGE	13.0 gpm @ 7.0 psi
REQUIRED DEMAND AT BASE OF RISER	26.2 gpm @ 24.6 psi
REQUIRED DEMAND AT WATER METER	31.2 gpm @ 56.2 psi
DOMESTIC DEMAND	5 gpm - included in demand
REQUIRED AT DISCHARGE SIDE OF PUMP	N.A. gpm @ N.A. psi
MAX. ALLOWED STORAGE HEIGHT	N.A.
REMOTE AREA SPRINKLER DATA	SIN # VK494 RESIDENTIAL SSP K-FACTOR - 4.9
DEGREE - 200	ORIENTATION - SSP SPRINKLERS FLOWING - 2
RESPONSE - FAST RESPONSE	MFG. - VIKING MODEL - FREEDOM
SUPPLY DATA	COACHELLA VALLEY WATER DISTRICT
TEST BY	COMPUTER PRESSURE ANALYSIS BY CVMW
RESULTS	STATIC = 88 psi RESIDUAL PSI = N.A. GPM = N.A.
CODE & EDITION USED	NFPA 13D 2022 OTHER - CFC 2022
SYSTEM TYPE	WET <input checked="" type="checkbox"/> DRY <input type="checkbox"/> DELUGE <input type="checkbox"/> PRE-ACTION <input type="checkbox"/>



VIKING FREEDOM CONCEALED RESIDENTIAL PENDENT FINISHED CEILING HEAD DESIGN REQUIREMENT: SIN # VK 494 (4.9 K-FACTOR) 200 DEGREE	
MAXIMUM AREA OF COVERAGE: 16' x 16' (8' TO ANY WALL) (8' MINIMUM DISTANCE BETWEEN HEADS)	MIN. WATER SUPPLY REQUIREMENT: EACH HEAD (TWO HEAD CALC.) 13 G.P.M. (MIN.) @ 7.0 P.S.I. (MIN.)

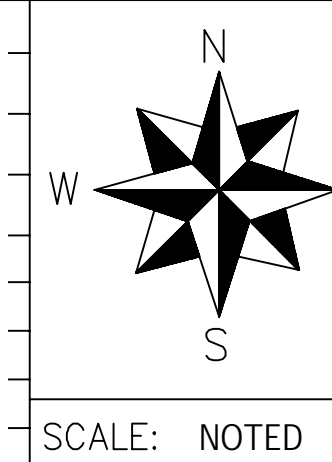
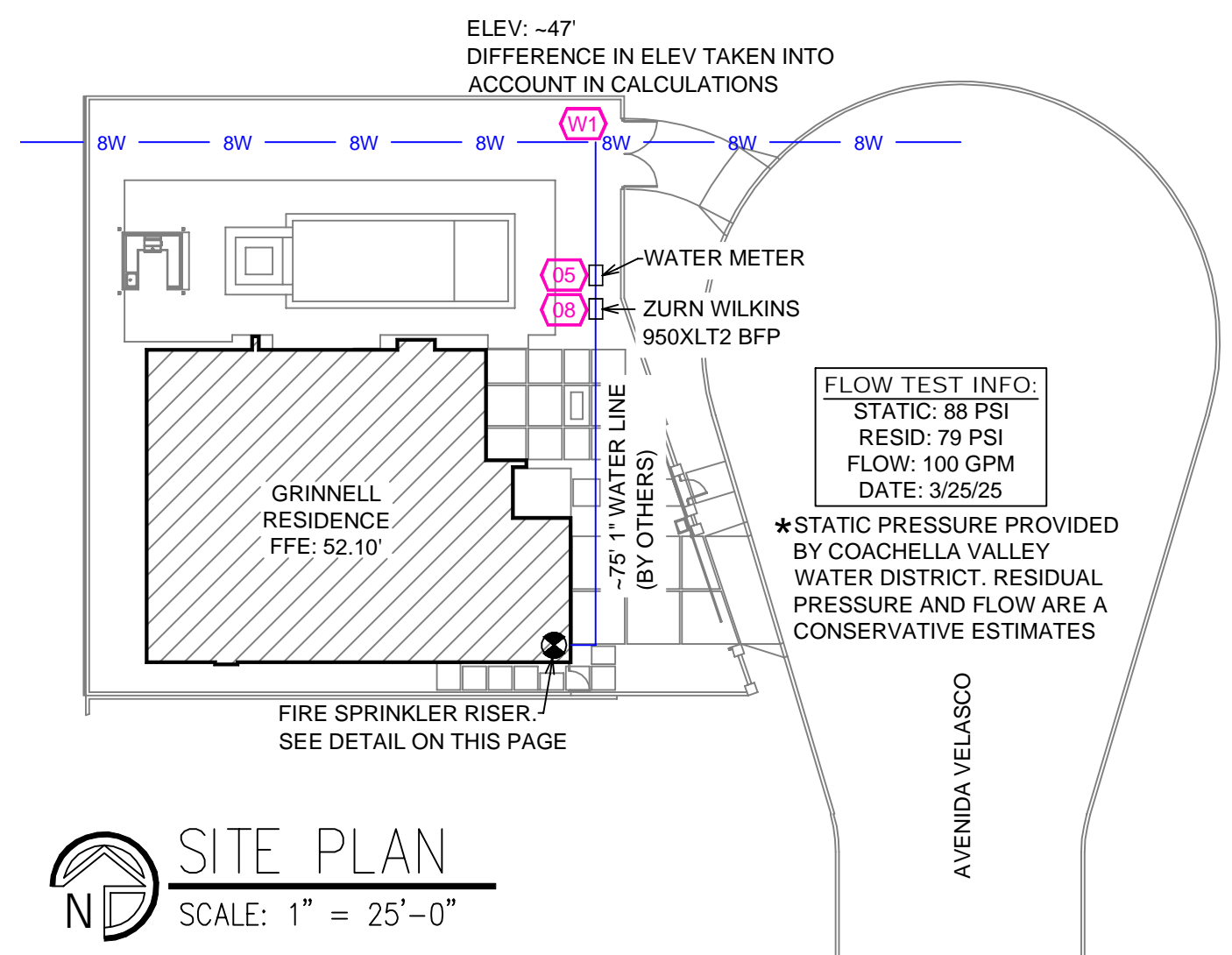
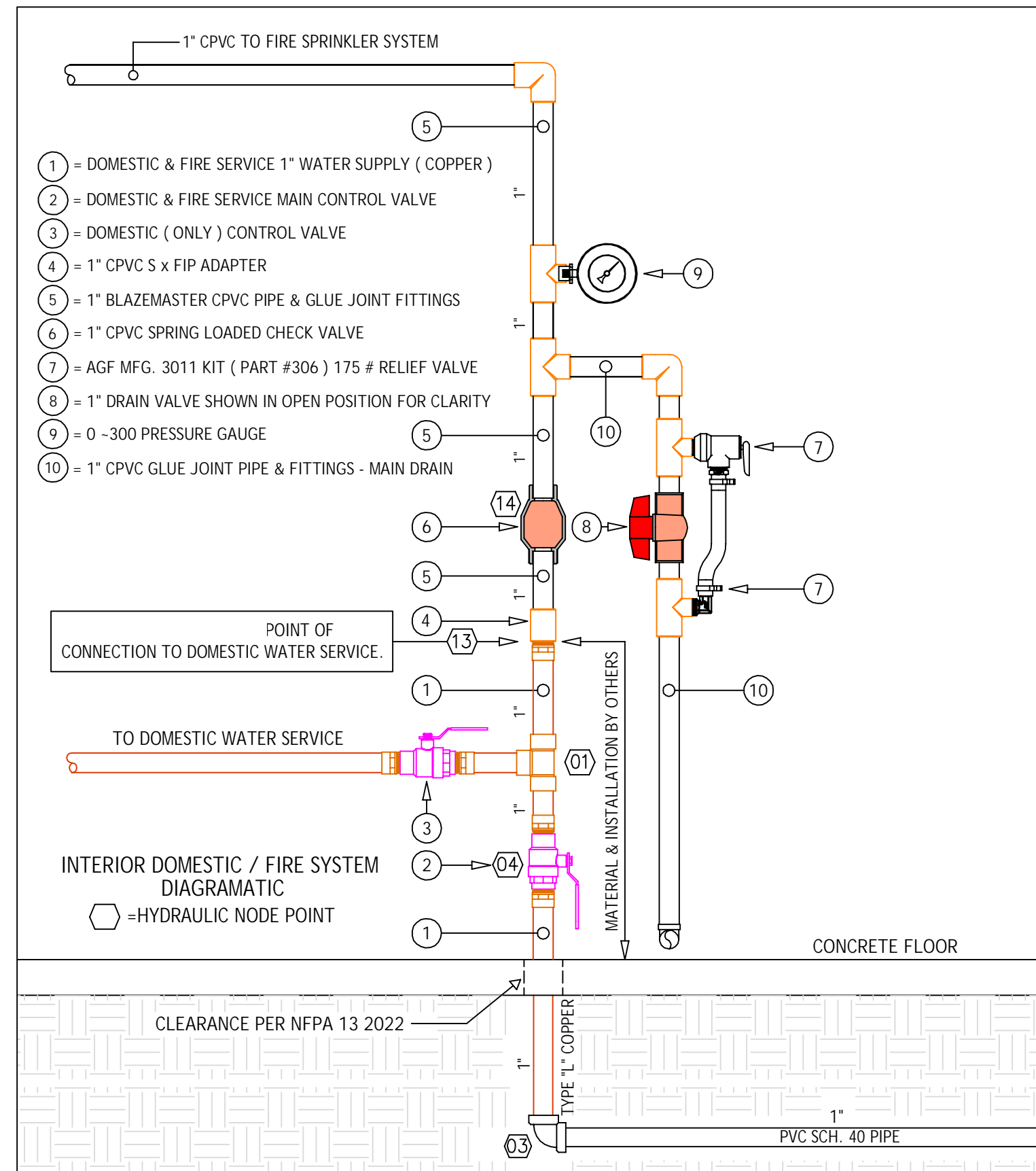


BUILDING SUMMARY	
SINGLE FAMILY DWELLING	
DISCRIPTION OF USE: RESIDENTIAL	
TYPE OF CONSTRUCTION: TYPE V-B	
SPRINKLERS: YES N.F.P.A. 13 D 2022	
STORIES: ONE	
TOTAL LIVING AREA = 2192 SQ. FT.	
GARAGE = 451 SQ. FT.	
TOTAL FOOTPRINT = 2643 SQ. FT.	

RESIDENTIAL HEADS IN RELATION TO HEAT SOURCE	
MINIMUM DISTANCES FOR ORDINARY TEMPERATURE RESIDENTIAL FIRE SPRINKLERS	
HEAT SOURCE	
SIDE OF OPEN OR RECESSED FIREPLACE	36"
FRONT OF RECESSED FIREPLACE	40"
COAL OR WOOD - BURNING STOVE	42"
KITCHEN RANGE	18"
WALL OVEN	18"
HOT AIR FLUES	18"
UNINSULATED HEAT DUCTS	18"
SIDE OF CEILING OR WALL MOUNTED HOT AIR DIFFUSERS	24"
FRONT OF WALL MOUNTED HOT AIR DIFFUSERS	36"
HOT WATER HEATER OR FURNACE	6"
LIGHT FIXTURE UP TO 250 WATT	6"
LIGHT FIXTURE 250 TO 499 WATT	12"
CEILING FAN	36" (MINIMUM)

RESIDENTIAL DESIGN MATERIAL NOTES
PIPE AND FITTINGS WILL BE "BLAZEMASTER" CPVC WITH PRIMER / GLUE JOINTS. INSTALL CPVC PIPE/FITTINGS PER MFG. RECOMMENDATIONS. SECURE CPVC PIPE TO STRUCTURE PER MFG. RECOMMENDATIONS. MAXIMUM CPVC HANGER DISTANCES ARE AS FOLLOWS:
1" CPVC PIPE (HANGER @ MAXIMUM DISTANCE OF) 6'-0"
1 1/4" CPVC PIPE (HANGER @ MAXIMUM DISTANCE OF) 6'-0"
NOTE: CPVC PIPE / FITTINGS WILL BE INSTALLED ABOVE A MIN. OF 3/8" GYP. BOARD, SUSPENDED LAY IN PANELS (WITH "T-BARS") OR 1/2" PLYWOOD.
CPVC PIPE / FITTINGS FOR THIS INSTALLATION WILL BE CONCEALED ABOVE MINIMUM CONSTRUCTED BARRIERS NOTED ABOVE.

NOTE TO GENERAL CONTRACTOR !
ANY PRESSURE REDUCING DEVICE FOR DOMESTIC WATER SERVICE MUST BE INSTALLED DOWNSTREAM TO THE WATER SUPPLY WHERE THE DOMESTIC AND FIRE SERVICE INTERSECT. THE FIRE SPRINKLER SYSTEM HAS BEEN HYDRAULICALLY CALCULATED WITH THE FULL PRESSURE THAT IS AVAILABLE AT THE SUPPLY SOURCE.
31.2 GPM @ 42.3 PSI IS REQUIRED AT OUTLET OF DOUBLE CHECK VALVE. IT IS THE RESPONSIBILITY OF THE GENERAL CONTRACTOR TO INSTALL THE DOMESTIC WATER / FIRE SPRINKLER SUPPLY FROM DOUBLE CHECK VALVE TO RESIDENCE WITH PIPE, DEVICES & SIZING PER THIS DRAWING.
IT IS THE RESPONSIBILITY OF THE WATER DISTRICT TO PROVIDE THE CORRECT SIZE WATER LATERAL & METER & DOUBLE CHECK VALVE TO MEET THE GPM & PSI REQUIREMENTS STATED ABOVE.



PROJECT: GRINNELL RESIDENCE
51015 AVENIDA VELASCO
LA QUINTA, CA 92253
SCALE: 1" = 25'-0"