

ORANGE COUNTY FIRE AUTHORITY



NFPA 13D / 13R FIRE SPRINKLER SYSTEM

<INSERT LOCATION MAP THAT INCLUDES MAJOR CROSS STREETS PROVIDING SITE ACCESS>

VICINITY MAP

OCFA STAMP

7	DESIGNED:		NO.	DATE
6	DRAWN:			
5	CHECKED:			
4	DATE:			
3	SCALE:			
2				
1				

PROJECT INFORMATION REQUIREMENTS

PROJECT LOCATION:

- NFPA 13D NFPA 13R
- MULTIPURPOSE PIPING SYSTEM
- SINGLE FAMILY SINGLE FAMILY NEW TRACT MULTI FAMILY
- NEW INSTALLATION NUMBER OF HEADS:
- TENANT IMPROVEMENT NUMBER OF HEADS:
- HYDRAULIC CALCULATIONS
- SPECIAL PROVISIONS FROM FIRE MASTER PLAN

DETAILED SCOPE OF WORK

NOTE: OCFA WILL ONLY REVIEW WORK OUTLINED IN SCOPE OF WORK

FLOW TEST INFORMATION

WATER DISTRICT: _____ DATE: _____
 LOCATION: _____ STATIC PRESSURE (PSI): _____ FLOW (GPM): _____
 ELEVATION: _____

FIRE SPRINKLER DESIGN DATA

METER SIZE: _____
 SPRINKLER HEAD SPACING
 1 HEAD: _____
 2 HEADS: _____
 CEILING HEIGHT:
 SPRINKLERED DECK (13R)
 CEILING BEAMS

MINIMUM STATIC PRESSURE AT RISER GAUGE

NOTE: THE MINIMUM STATIC PRESSURE REQUIRED AT THE RISER GAUGE IS CALCULATED BY MULTIPLYING THE MINIMUM REQUIRED STREET (SOURCE) PRESSURE BY 1.1 (THE 10% SAFETY BUFFER) AND ADJUSTING FOR THE PRESSURE LOSS BETWEEN THE GAUGE ON THE RISER AND THE STREET (SOURCE) CONNECTION DUE TO ELEVATION.

PLAN NAME: _____	REQUIRED PRESSURE: _____
PLAN NAME: _____	REQUIRED PRESSURE: _____
PLAN NAME: _____	REQUIRED PRESSURE: _____
PLAN NAME: _____	REQUIRED PRESSURE: _____

OCFA STANDARD NFPA 13D SPRINKLER

1. ONE SET OF OCFA APPROVED SPRINKLER PLANS WITH HYDRAULIC CALCULATIONS SHALL ALWAYS BE RETAINED AT THE JOB SITE.
2. THE SYSTEM SHALL BE DESIGNED AND INSTALLED IN ACCORDANCE WITH 2022 NFPA 13D AND AMENDMENTS AS ADOPTED BY THE LOCAL JURISDICTION.
3. UNDERGROUND MAINS AND LEAD-IN CONNECTIONS SHALL BE FLUSHED BEFORE CONNECTION IS MADE TO SPRINKLER PIPING.
4. THE WATER METER SHALL BE INSTALLED PRIOR TO FINAL.
5. CALL OCFA INSPECTION SCHEDULING AT (714) 573-6150 TO SCHEDULE ALL INSPECTIONS AT LEAST 48 HOURS IN ADVANCE. INSPECTIONS CANCELED AFTER 1 P.M. ON THE DAY BEFORE THE SCHEDULED DATE WILL BE SUBJECT TO A RE-INSPECTION FEE.
6. OCFA INSPECTION REQUIRED AT BOTH ROUGH AND FINAL PRIOR TO OCCUPANCY BEING GRANTED.
7. SYSTEMS SHALL BE TESTED AT A MINIMUM OF STREET PRESSURE IN ACCORDANCE WITH NFPA 13D.
8. EXPOSED EXTERIOR RISER VALVES SHALL BE PAINTED OSHA SAFETY RED. FIRE SPRINKLER OR SUPPLY PIPE EXPOSED OR SUSCEPTIBLE TO WET CONDITIONS SHALL BE PAINTED (ANY COLOR) OR OTHERWISE COATED TO INHIBIT CORROSION. STAINLESS STEEL ASSEMBLIES AND PIPING MAY BE LEFT UNPAINTED PROVIDED THAT ANY HOSE CONNECTIONS, VALVES, OR OTHER COMPONENTS OPERATED BY THE FIRE DEPARTMENT ARE PAINTED RED.
9. SPRINKLERS IN SPACES SUBJECT TO TEMPERATURES IN EXCESS OF 100°F (INCLUDING GARAGES AND EXTERIOR CLOSETS) MUST BE INTERMEDIATE TEMPERATURE RATED (175°F OR MORE).
10. ALL SPRINKLER PIPING SHALL REMAIN UNCOVERED UNTIL INSPECTED BY OCFA.
11. AT ROUGH INSPECTION, PENDENT AND SIDEWALL SPRINKLER HEADS SHALL NOT BE INSTALLED IN PORTIONS OF SYSTEMS USING CPVC PIPE; ONLY PLUGS SHALL BE USED.
12. AT FINAL INSPECTION, ALL CEILINGS SHALL HAVE ALL PATCHES, REPAIRS, AND FINAL FINISHES COMPLETED. CONCEALED SPRINKLER COVER PLATES SHALL NOT BE INSTALLED REGARDLESS OF CEILING TYPE, BUT SHALL BE AVAILABLE ON-SITE FOR INSPECTION.
13. AN APPROVED METHOD OF DEMONSTRATING THE SYSTEM IS PRESSURIZED AT THE TIME OF ROUGH INSPECTION WILL BE PROVIDED.
14. A PRESSURE GAUGE SHALL BE PROVIDED ON THE RISER AT THE TIME OF FINAL INSPECTION TO VERIFY THE MINIMUM REQUIRED PRESSURE IS PRESENT.

OCFA STANDARD NFPA 13R SPRINKLER

1. ONE SET OF OCFA APPROVED SPRINKLER PLANS WITH HYDRAULIC CALCULATIONS SHALL BE RETAINED AT THE JOB SITE.
2. THIS AUTOMATIC FIRE PROTECTION SYSTEM SHALL BE DESIGNED, FABRICATED, AND INSTALLED IN ACCORDANCE WITH 2022 NFPA 13R AND LOCAL AMENDMENTS ENFORCED BY THE OCFA.
3. AT LEAST ONE WATER PRESSURE GAUGE SHALL BE INSTALLED ON THE RISER ASSEMBLY.
4. ALL VALVES SHALL HAVE PERMANENTLY AFFIXED SIGNS THAT DESIGNATE THEIR FUNCTION.
5. THE WATER FLOW SWITCH SHALL BE CONNECTED TO THE SERVICE PANEL ON AN UNINTERRUPTIBLE HOUSE CIRCUIT.
6. AT LEAST ONE BELL/ALARM SHALL BE LOCATED NEAR THE ADDRESS SIDE OR FRONT SIDE OF THE STRUCTURE AND SHALL BE LISTED FOR EXTERIOR USE.
7. UNDERGROUND MAINS AND LEAD-IN CONNECTIONS SHALL BE FLUSHED BEFORE CONNECTION IS MADE TO SPRINKLER PIPING. FLUSH MUST BE WITNESSED BY AN APPROVED PARTY AND DOCUMENTATION PROVIDED TO THE OCFA INSPECTOR.
8. WATER METER SHALL BE IN PLACE PRIOR TO FINAL, IF APPLICABLE.
9. CALL OCFA INSPECTION SCHEDULING AT (714) 573-6150 TO SCHEDULE ALL INSPECTIONS AT LEAST 48 HOURS IN ADVANCE. INSPECTIONS CANCELED AFTER 1 P.M. ON THE DAY BEFORE THE SCHEDULED DATE WILL BE SUBJECT TO A RE-INSPECTION FEE.
10. OCFA INSPECTION REQUIRED AT BOTH ROUGH AND FINAL PRIOR TO OCCUPANCY BEING GRANTED.
11. ALL NEW SYSTEMS AND ADDITIONS OR MODIFICATIONS TO EXISTING PIPING AFFECTING MORE THAN 20 SPRINKLERS SHALL BE HYDROSTATICALLY TESTED FOR TWO HOURS AT 200 PSI OR AT 50 PSI ABOVE THE SYSTEM OPERATING PRESSURE, WHICHEVER IS GREATER. HYDRO TESTING ABOVE OPERATING PRESSURE IS NOT REQUIRED FOR RELOCATED DROPS.
12. ALL FDOS, WALL PIVS, AND EXTERIOR/EXPOSED SPRINKLER RISER VALVES SHALL BE PAINTED OSHA SAFETY RED. OTHER FIRE SPRINKLER OR SUPPLY PIPE EXPOSED TO THE SKY OR SUSCEPTIBLE TO WET CONDITIONS SHALL BE PAINTED (ANY COLOR) OR OTHERWISE COATED TO INHIBIT CORROSION. STAINLESS STEEL ASSEMBLIES AND PIPING MAY BE LEFT UNPAINTED PROVIDED THAT ANY HOSE CONNECTIONS, VALVES, OR OTHER COMPONENTS OPERATED BY THE FIRE DEPARTMENT ARE PAINTED RED.
13. ALL SPRINKLER PIPING SHALL REMAIN UNCOVERED UNTIL INSPECTED BY OCFA.
14. AT ROUGH INSPECTION, PENDENT AND SIDEWALL SPRINKLER HEADS SHALL NOT BE INSTALLED IN PORTIONS OF SYSTEMS USING CPVC PIPE; ONLY PLUGS SHALL BE USED.
15. AT FINAL INSPECTION, ALL CEILINGS SHALL HAVE ALL PATCHES, REPAIRS, AND FINAL FINISHES COMPLETED. CONCEALED SPRINKLER COVER PLATES SHALL NOT BE INSTALLED REGARDLESS OF CEILING TYPE, BUT SHALL BE AVAILABLE ON-SITE FOR INSPECTION.
16. SPRINKLERS IN SPACES SUBJECT TO TEMPERATURES IN EXCESS OF 100°F (INCLUDING GARAGES AND EXTERIOR CLOSETS) MUST BE INTERMEDIATE TEMPERATURE RATED (175°F OR MORE).

APPLICABLE CODES

- 2022 CALIFORNIA FIRE CODE
- 2022 CALIFORNIA BUILDING CODE
- 2022 CALIFORNIA RESIDENTIAL CODE
- 2022 CALIFORNIA GREEN BUILDING STANDARDS CODE
- 2022 CALIFORNIA MECHANICAL CODE
- 2022 CALIFORNIA ELECTRICAL CODE
- 2022 CALIFORNIA PLUMBING CODE
- 2022 CALIFORNIA BUILDING ENERGY EFFICIENCY STANDARDS
- APPLICABLE NFPA STANDARDS:
- LOCALLY ADOPTED ORDINANCES:
- OCFA GUIDELINE
- CONDITIONS OF APPROVAL:

RELATED PLANS

- FIRE MASTER PLAN SR:
- RESIDENTIAL SITE PLAN SR:
- UNDERGROUND FIRE SUPPLY LINE

REVISION

- ORIGINAL PLAN SR:
- COPY OF ORIGINAL APPROVED PLAN REQUIRED TO BE SUBMITTED WITH ALL REVISED PLANS.

REVISION SCOPE OF WORK

PROJECT DIRECTORY

CONTRACTOR
 BUSINESS NAME: _____
 CONTACT NAME: _____
 ADDRESS: _____
 CITY: _____ STATE: _____ ZIP: _____
 PHONE: _____
 EMAIL: _____

PROPERTY OWNER
 BUSINESS NAME: _____
 CONTACT NAME: _____
 ADDRESS: _____
 CITY: _____ STATE: _____ ZIP: _____
 PHONE: _____
 EMAIL: _____

DESIGNED: _____
 DRAWN: _____
 CHECKED: _____
 DATE: _____
 SCALE: _____

OCFA REVIEW AND INSPECTIONS (OCFA USE ONLY)

NO OCFA REVIEW REQUIRED

PLAN REVIEW ONLY

PLAN REVIEW AND INSPECTION

PLANS PREPARED BY: _____

ENGINEER LICENSE NO. EXP. DATE

ORANGE COUNTY FIRE AUTHORITY
 COMMUNITY RISK REDUCTION - PLANNING AND DEVELOPMENT SECTION

SERVICE REQUEST NUMBER