



Permit Number: _____

ARE THE FOLLOWING CF1R INPUTS CONFIRMED ON THE PLANS?	Project Notes	YES	NO*
WATER HEATING SYSTEM			
Distribution: Section 150.0(j)	Multifamily central or individual dwelling	<input type="checkbox"/>	<input type="checkbox"/>
Multifamily: Central Distribution	<i>No control / Other:</i>	<input type="checkbox"/>	<input type="checkbox"/>
Single or Multifamily: Individual Dwelling Distribution	<i>Standard / Other:</i>	<input type="checkbox"/>	<input type="checkbox"/>
Multifamily: Recirculation pumps	<i>Power (bhp):</i> <i>Efficiency (%):</i>	<input type="checkbox"/>	<input type="checkbox"/>
Equipment: Sections 110.3, 110.5, 150.0(j)(n) / 150.1(c)8 / 150.2(a)1.D / 150.2(b)1.G			
# of water heaters		<input type="checkbox"/>	<input type="checkbox"/>
Hot water solar system (if applicable)	<i>Solar fraction (%):</i>	9 <input type="checkbox"/>	<input type="checkbox"/>
Heater element type	<i>Electric resistance / Natural gas / Propane / Heat pump / Oil</i>	10 <input type="checkbox"/>	<input type="checkbox"/>
Tank type	<i>Boiler / Indirect / Large instant / Large storage / Small instant / Small storage</i>	<input type="checkbox"/>	<input type="checkbox"/>
Tank volume		<input type="checkbox"/>	<input type="checkbox"/>
Energy factor or efficiency		11 <input type="checkbox"/>	<input type="checkbox"/>
Input Rating (Btuh)		<input type="checkbox"/>	<input type="checkbox"/>
Tank insulation		12 <input type="checkbox"/>	<input type="checkbox"/>
Standby Loss Fraction (input >75kBtuh)		<input type="checkbox"/>	<input type="checkbox"/>
HVAC Systems			
Equipment: Sections 150.0(h) / 150.1(c)8 / 150.2(a)1.D / 150.2(b)1.G			
Heating (# of systems)		<input type="checkbox"/>	<input type="checkbox"/>
Heating Systems: Type	<i>Central furnace / Heater / Boiler / Electric / Combined hydronic</i>	<input type="checkbox"/>	<input type="checkbox"/>
Heating efficiency	<i>AFUE / HSPF / Other:</i>	13 <input type="checkbox"/>	<input type="checkbox"/>
Cooling (# of systems)		<input type="checkbox"/>	<input type="checkbox"/>
Cooling Systems: Type	<i>No cooling / Other</i>	<input type="checkbox"/>	<input type="checkbox"/>
Cooling efficiency	<i>SEER / EER:</i>	14 <input type="checkbox"/>	<input type="checkbox"/>
HERS verification	<i>Airflow / EER / SEER / Refrig.charge</i>	15 <input type="checkbox"/>	<input type="checkbox"/>
Heating and cooling load calculations provided?		16 <input type="checkbox"/>	<input type="checkbox"/>



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HVAC Systems <i>continued</i>			
Distribution: Sections 150.0(m) / 150.1(c)9 & 13 / 150.2(a)1.D / 150.2(b)1.D & E			
Distribution System Type	<i>Unconditioned attic / Crawlspace / Garage / Conditioned except <12 ft / Conditioned all / Without ducts / Outdoors / HERS low leakage in conditioned / Multiple places</i>	<input type="checkbox"/>	<input type="checkbox"/>
HERS Distribution measures	<i>Sealed & Tested / Specified lower leakage target / Duct location / Duct design</i>	17 <input type="checkbox"/>	<input type="checkbox"/>
Duct Insulation R-value	<i>R-0 / R-2.1 / R-4.2 / R-6 / R-8 / R-10 / R-12</i>	18 <input type="checkbox"/>	<input type="checkbox"/>
Bypass Duct	<i>Yes / None</i>	<input type="checkbox"/>	<input type="checkbox"/>
IAQ Fans: Sections 150.0(o) / 150.1(c)10 / 150.2(a)			
HERS IAQ CFM		19 <input type="checkbox"/>	<input type="checkbox"/>
IAQ Fan Type	<i>Exhaust / Supply / Balanced (RE %)</i>	<input type="checkbox"/>	<input type="checkbox"/>
HERS HVAC Fans	<i>Cooling fan efficiency: (Watts/CFM)</i>	20 <input type="checkbox"/>	<input type="checkbox"/>
Ventilation Cooling: Section 150.1(c)12 / 150.2(a)			
Cooling Ventilation CFM		<input type="checkbox"/>	<input type="checkbox"/>
Cooling Ventilation Watts/CFM		<input type="checkbox"/>	<input type="checkbox"/>
# of fans		<input type="checkbox"/>	<input type="checkbox"/>
HERS Ventilation Cooling measures:	<i>Required / Not required</i>	21 <input type="checkbox"/>	<input type="checkbox"/>
Are the mechanical measures in the plans equal to, or better than, the CF1R, and do they meet mandatory measures? <input type="checkbox"/> <input type="checkbox"/>			

Additional Notes: _____

Comments / Reference Guide / Qualifications / End Notes

- 9** Documented with CEC F-Chart or other CEC-approved method
- 10** Gas or propane heaters to have (150.0(n)): 120 V outlet within 3 feet; Vent straight to outside; Condensate drain sloped to outside; Gas supply with 200 kBtuh capacity or greater.
- 11** Before April 15, 2015; Gas 50 gallons or less = 0.58; Gas instantaneous = 0.62; on or after April 16, 2015; Gas 50 gallons or less = 0.60; Gas instantaneous = 0.82
- 12** Mandatory: R-12 tank insulation required for any water heater with an EF of 0.58 (0.60 in 2015) or less, and any unfired tank
- 13** Non-Weatherized Gas Furnace ≤225 kBtuh 80% AFUE or higher; as of 1/1/15 Heat pumps <65 kBtuh and if split = 8.2 HSPF or higher; if packaged = 8.0 HSPF or higher; all others: See Table(s) 110.2
- 14** As of 1/1/15 Split: <45 kBtuh = 14 SEER or higher/12.2 EER or higher; ≥45 kBtuh = 14 SEER/11.7 EER or higher; packaged: 14 SEER / 11.0 EER; All others: See Table(s) 110.2
- 15** Prescriptive: Compliance credit requires HERS verification of refrigerant charge in CZ 2, 8-15. All other HERS measures dependent upon performance features modeled for compliance.
- 16** Building Code requires 68°F be provided 3 feet above the floor on coldest day of year. This is verified with load calculation. The load calculation is a separate document and not part of the CF1R.
- 17** Mandatory: HVAC Distribution. Duct testing required: a. All new ducting; b. More than 40 feet added; c. New cooling system installed. All other HERS measures dependent upon performance features modeled for compliance
- 18** New & Altered Ducts: Mandatory = R-6 Prescriptive: CZ 1-10, 12-13 = R-6, CZ 11, 14-16 = R-8
- 19** Mandatory: Fan watt draw with new or replacement AC
- 20** The Mandatory IAQ requirement for Whole-Building Ventilation airflow (new homes and additions >1000 ft²) shall be HERS verified. All other HERS measures dependent upon performance features modeled for compliance.
- 21** Mandatory: Ventilation Cooling: When a central fan integrated system is used for ventilation cooling, air handler fan watt draw required HERS verification