



## RESIDENTIAL WATER SOFTENER GUIDELINES

**California Health & Safety Code Sections 116775 through 116795** have the following requirements for water softener installations throughout the State which in turn are enforced through the Building & Safety Division:

- Water softeners must discharge to the sanitary sewer system, with a minimum 1" air gap.
- The water softening appliance must utilize demand control to activate regeneration.
- The water softener shall be certified by an approved third party rating organization to have a salt efficiency rating of no less than 4,000 grains of hardness removed per pound of salt used in regeneration.
- The following water conservation devices must be installed on all fixtures using softened or conditioned water unless the devices will adversely restrict the normal operation of the fixtures:
  - Faucet flow restrictors
  - Shower head restrictors
  - Toilet reservoir dams or low flow toilets (maximum 1.6 gallon per flush)
  - Only untreated (un-softened or unconditioned) supply water is permitted to supply hose bibs and sill cocks that serve water to the outside of the house, except that bypass valves may be installed on homes with slab foundations constructed prior to the date of the water softener installation or otherwise where a piping system is physically inhibited.
- The attached certification shall be completed by a contractor having a valid Class C-55 water conditioning contractor's license or Class C-36 plumbing contractor's license attesting that all these requirements have been satisfied at the time of final inspection.

In addition, **California Plumbing Code (CPC) Section 610.2** specifies that no water softener shall be installed when the installation produces an excessive pressure drop in the water supply piping. Whenever a water softener is installed, the water supply pipe and meter shall be adequately sized to compensate for any pressure loss. In the absence of specific pressure drop

information, the diameter of the inlet or outlet of a water softener and its connecting piping shall be not less than the diameter of the water distribution piping to the fixtures served by the device. Water Softeners must be approved by the City of Riverside, shall be tested for flow rating and pressure loss by an approved laboratory or recognized testing agency and shall be sized per **CPC Table 6-8 to the left.**

<b>CPC TABLE 6-8 SIZING OF RESIDENTIAL WATER SOFTENERS</b>	
REQUIRED SIZE OF SOFTENER CONNECTION	NUMBER OF BATHROOM GROUPS SERVED <sup>1</sup>
¾ in.	Up to 2 <sup>2</sup>
1 in.	Up to 4 <sup>3</sup>

<sup>1</sup> Installation of a kitchen sink and dishwasher, laundry tray, and automatic clothes washer permitted without additional size increase.

<sup>2</sup> An additional water closet and lavatory permitted.

<sup>3</sup> Over four (4) bathroom groups, the softener size shall be engineered for the specific installation

*See also Appendix A, Recommended Rules for Sizing the Water Supply System, and Appendix L, Alternative Plumbing Systems, for alternative methods of sizing water supply systems*



## RESIDENTIAL WATER SOFTENER INSTALLATION CERTIFICATE

Permit Number \_\_\_\_\_

Date \_\_\_\_\_

*This certification shall be provided at the time of final inspection by the new user of the appliance and shall be completed by a contractor having either a valid Class C-55 water conditioning contractor's license or Class C-36 plumbing contractor's license, and filed with the City of Riverside Building & Safety Division.*

Name of homeowner \_\_\_\_\_

Address \_\_\_\_\_

Water Softener Manufacturer \_\_\_\_\_ Model number \_\_\_\_\_

Pounds of salt used per regeneration \_\_\_\_\_ Salt efficiency rating \_\_\_\_\_

Manufacturer of the required water-saving devices installed, model number, and number installed: \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

I, as the owner or representative of \_\_\_\_\_,  
(Contractor) (CA License)

located at \_\_\_\_\_  
(Business Address)

do hereby declare under penalty of perjury that the water softener and required water-saving devices are installed at the address shown hereon per the current edition of the California Plumbing Code and in conformance with Sections 116775 through 116795 of the California Health and Safety Code.

\_\_\_\_\_  
(Signature)

\_\_\_\_\_  
(Name)

\_\_\_\_\_  
(Date)