

**INITIAL STATEMENT OF REASONS
FOR
PROPOSED BUILDING STANDARDS
OF THE
DEPARTMENT OF HOUSING AND COMMUNITY DEVELOPMENT
REGARDING THE 2010 CALIFORNIA PLUMBING CODE (CPC)
CALIFORNIA CODE OF REGULATIONS, TITLE 24, PART 5
(HCD 3/09)**

The Administrative Procedure Act requires an Initial Statement of Reasons to be available to the public upon request when rulemaking action is being undertaken. The following are the reasons for proposing this particular rulemaking action:

STATEMENT OF SPECIFIC PURPOSE AND RATIONALE:

(Government Code Section 11346.2 requires a statement of specific purpose of **EACH** adoption, amendment or repeal and the rationale of the determination by the agency that EACH adoption, amendment or repeal is reasonably necessary to carry out the purpose for which it is proposed.

- When repealing adopted California original standards, summarize the effect of the standards and explain why the standard is no longer necessary
- When amending a standard, explain the standard proposed to be modified, explain the effect of the proposed modification, explain the inadequacy of the standards being modified, and explain why the proposed amendment is necessary)

Specific Proposed Regulatory Actions:

HCD proposes to adopt by reference the 2009 edition of the Uniform Plumbing Code with amendments into the 2010 California Plumbing Code. These proposed amendments are intended to provide clarity, specificity and direction to the code user and to implement and make specific existing state laws. These proposed amendments are a result of recommendations developed during the public participation period prior to submittal to the California Building Standards Commission (CBSC). The rationale for each amendment by chapter and section is listed below.

CHAPTER 1
CALIFORNIA ADMINISTRATION
DIVISION I

HCD proposes to bring forward and adopt the existing California amendments from the 2007 California Plumbing Code (CPC). As a result of guidance received from the California Building Standards Commission, Coordinating Council Ad Hoc Committee, HCD in coordination with its state agency partners also proposes to redesignate Chapter 1 to include two administrative divisions.

SPECIAL NOTE: In order to differentiate “*California Chapter 1*” from “Chapter 1, Administration”, former “*California Chapter 1, General Code Provisions* (Sections 101.0–108.10.2) is renumbered to “*Chapter 1, California Administration, Division I* (Sections 1.1.0–1.8.10.2). For example, former Section 101 is renumbered to Section 1.1, and former Section 108 is renumbered to Section 1.8. Since this change consistently affects all sections in Chapter 1, including subsections, each renumbering will not be addressed separately.

However, all other amendments to the chapter are described below and also identified on the Matrix Adoption Table.

SECTION: 1.1.0 (formerly 101.0) – GENERAL

SECTION: 1.1.1 (formerly 101.1) Title.

HCD proposes to update the Uniform Plumbing Code (UPC) reference from 2006 to 2009 and make other nonsubstantive editorial corrections in pluralization and capitalization.

SECTION: 1.1.2 (formerly 101.2) Purpose.

HCD proposes to reword the term "safety to preserve life" to "safety to life" to provide consistency with other building codes. The modification has no intended change in regulatory effect.

SECTION: 1.1.3 (formerly 101.3) Scope.

HCD proposes to pluralize "building" and to add the word "or" to provide parallel reference to the prior phrase and to provide consistency with the California Building Code (CBC). The modifications have no intended change in regulatory effect.

SECTION: 1.1.3.1 (formerly 101.3.1) Non-State Regulated Buildings, Structures, and Applications.

HCD proposes replacement of the existing language to provide consistency with the CBC and to provide reference to all parts of the California Building Standards Code. The modifications have no intended change in regulatory effect.

SECTION: 1.1.3.2 (formerly 101.3.2) (6) and (13) State-Regulated Buildings, Structures, and Applications.

HCD proposes rephrasing this section to provide consistency with the CBC. HCD also proposes to correct the range of state agencies referenced, correct a reference to the "Preface", and correct the list of HCD applications and referenced terms. The modifications have no intended change in regulatory effect.

SECTION: 1.1.4 (formerly 101.4) Appendices.

HCD proposes to add a reference to Health and Safety Code Section 18938.3 added by Senate Bill 1473 (Chapter 719, Statutes of 2008) providing clarity on adoption of model building codes by the California Building Standards Commission. HCD also proposes pluralizing "section" to accommodate the addition. The modifications have no intended change in regulatory effect.

SECTION: 1.1.6 (formerly 101.6) Non-Building Standards, Orders and Regulations.

HCD proposes using boldface for the title of this section and making a nonsubstantive code reference correction for consistency within the code. The modifications have no intended change in regulatory effect.

SECTION: 1.1.7.2 (formerly 101.7.2) Specific Provision.

HCD proposes making corrections in pluralization to provide consistency with the CBC. The modifications have no intended change in regulatory effect.

SECTION: 1.1.7.3 (formerly 101.7.3) Conflicts.

HCD proposes making corrections in pluralization to provide consistency with the CBC. The modifications have no intended change in regulatory effect.

SECTION: 1.1.8 (formerly 101.8) City, County, or City and County Amendments, Additions or Deletions.

HCD proposes to add language referencing statutory provisions related to local modifications of building code. This will provide consistency with other building codes. The modifications have no intended change in regulatory effect.

SECTION: 1.1.8.1 (formerly 101.8.1) Findings and Filings.

HCD proposes to correct punctuation and reference HCD's post office box for purposes of receiving copies of referenced findings via mailing. The modifications have no intended change in regulatory effect.

SECTION: 1.1.10 (formerly 101.1.10) Availability of Codes.

HCD proposes to replace the ampersand symbol with the word "and" in regulatory text and to make other nonsubstantive editorial and clarifying changes. Language has been added for clarity and consistency with the other building codes requiring an up-to-date copy of the code for public inspection. The modifications have no intended change in regulatory effect.

SECTION: 1.1.11 (formerly 101.1.11) Format.

HCD proposes capitalization of the term "Matrix Adoption Table" for consistency within the code. The modifications have no intended change in regulatory effect.

SECTION: 1.1.12 (formerly 101.12) Validity.

HCD proposes a nonsubstantive punctuation correction. The modifications have no intended change in regulatory effect.

SECTION: 1.8.0 (formerly 108.0) – DEPARTMENT OF HOUSING AND COMMUNITY DEVELOPMENT (HCD)

SECTION: 1.8.1 (formerly 108.1) Purpose.

HCD proposes to replace the word "standards" with "requirements" and to make other grammatical and punctuation changes to provide consistency with the CBC. These changes will not result in changes in regulatory effect. The modifications have no intended change in regulatory effect.

SECTION: 1.8.2 (formerly 108.2) – AUTHORITY AND ABBREVIATIONS

SECTION: 1.8.2.1.1 (formerly 108.2.1.1) Housing Construction.

HCD proposes to provide a complete list of statutory authority and reference citations for clarification purposes. The modifications have no intended change in regulatory effect.

SECTION: 1.8.2.1.2 (formerly 108.2.1.2) Housing Accessibility.

HCD proposes to delete “units” and add “s” to “covered multifamily dwellings” so the reference is consistent with the definition in Chapter 11A of the CBC, remove the hyphen from “timeshares” and “Common-use” and hyphenate the acronyms for HCD 1-AC and DSA-AC. The modifications have no intended change in regulatory effect.

HCD proposes to correct the term “persons with disabilities” by deleting reference to “physical” disabilities. HCD proposes to capitalize this term and other referenced defined terms and including the terms in quotes for purpose of consistency. The modifications have no intended change in regulatory effect.

During the 2007 annual adoption cycle, HCD removed many references to the Group R occupancy classification in CBC’s Chapter 11A because occupancy classifications are located in CBC Chapter 3 and are not relevant to determine accessibility standards for covered multifamily dwelling units. HCD proposes a similar change to provide clarity and consistency for the code user. The modifications have no intended change in regulatory effect.

HCD proposes to delete references to Chapters 11A and 11B for the term “publicly funded” since this term is not defined in the referenced chapters. The modifications have no intended change in regulatory effect.

HCD amended the CBC, Section 1101A.1, during the 2007 annual update to clarify a HCD 1-AC application. HCD proposes a similar amendment to applications listed in the CPC, Chapter 1, Administration, Division I, to provide consistency and clarity on HCD 1-AC applications. The rationale submitted for the amendment to the 2007 CBC, Section 1101A.1, is noted below:

“The change is for consistency with the Federal Fair Housing Amendments Act (FHAA), page 11, and to clarify that a new building, when constructed as multifamily dwelling units behind an existing façade, is covered. The change provides clarity for the code user.”

HCD proposes to provide a complete list of statutory authority and reference citations for clarification purposes. The modifications have no intended change in regulatory effect.

SECTION: 1.8.2.1.3 (formerly 108.2.1.3) Permanent Buildings in Mobilehome Parks and Special Occupancy Parks.

HCD proposes to provide punctuation corrections in referenced statutes and to provide a complete list of statutory authority and reference citations for clarification purposes. The modifications have no intended change in regulatory effect.

SECTION: 1.8.3 (formerly 108.3) – LOCAL ENFORCING AGENCY

SECTION: 1.8.3.1 (formerly 108.3.1) Duties and Powers.

HCD proposes to correct information on the Title 25 reference addressing use and occupancy of existing buildings.

SECTION: 1.8.3.2.1 (formerly 108.3.2.1) State Housing Law.

HCD proposes to provide punctuation corrections in referenced statutes and to clarify a reference to a statutory citation by identifying the initial section number instead of the article number. The modifications have no intended change in regulatory effect.

SECTION: 1.8.3.2.2 (formerly 108.3.2.2) Mobilehome Parks Act.

HCD proposes to clarify a reference to a statutory citation by identifying the initial section number instead of the article number. The modification has no intended change in regulatory effect.

SECTION: 1.8.3.2.3 (formerly 108.3.2.3) Special Occupancy Parks Act.

HCD proposes to clarify a reference to a statutory citation by identifying the initial section number instead of the article number and deleting capitalization of “special occupancy parks” for consistency with the CBC. The modifications have no intended change in regulatory effect.

SECTION: 1.8.3.2.4 (formerly 108.3.2.4) Employee Housing Act.

HCD proposes to clarify a reference to a statutory citation by identifying the initial section number instead of the article number. The modifications have no intended change in regulatory effect.

SECTION: 1.8.3.2.5 (formerly 108.3.2.5) Factory-Built Housing.

HCD proposes to correct the name of the law, clarify a reference to a statutory citation by identifying the initial section number instead of the article number, and to make punctuation corrections. The modifications have no intended change in regulatory effect.

SECTION: 1.8.4 (formerly 108.4) – PERMITS, FEES, APPLICATIONS AND INSPECTIONS

SECTION: 1.8.4.1 (formerly 108.4.1) Permits.

HCD proposes to reference the new title for the former Appendix Chapter 1 as Chapter 1, Administration, Division II and to make a punctuation correction. The modifications have no intended change in regulatory effect.

SECTION: 1.8.4.3.1 (formerly 108.4.3.1) Retention of Plans.

HCD proposes corrections of the references to exceptions and to include a reference to a metric equivalent. The modifications have no intended change in regulatory effect.

SECTION: 1.8.5 (formerly 108.5) – RIGHT OF ENTRY FOR ENFORCEMENT

SECTION: 1.8.5.1 (formerly 108.5.1) (1) through (5) General.

HCD proposes to add more specificity and consistency to citations for referenced statutes and make punctuation corrections. The modifications have no intended change in regulatory effect.

SECTION: 1.8.6 (formerly 108.6) – LOCAL MODIFICATION BY ORDINANCE OR REGULATION

SECTION: 1.8.6.1 (formerly 108.6.1) General.

HCD proposes adding Health and Safety Code, Section 17958.5, which provides authority for developing local amendments to building codes, to the list of references addressing local amendments. The modifications have no intended change in regulatory effect.

SECTION: 1.8.6.2 (formerly 108.6.2) (2) Findings, Filings, and Rejections of Local Modifications.

HCD proposes a spelling correction for "cities." The modification has no intended change in regulatory effect.

SECTION 1.8.7 (formerly 108.7) – ALTERNATE MATERIALS, DESIGNS, TESTS AND METHODS OF CONSTRUCTION

SECTION: 1.8.7.2 (formerly 108.7.2) Local Building Departments.

HCD proposes to add the words "structure" related to accessory buildings and make additional grammatical and punctuation corrections. These changes will provide consistency with the CBC. The modifications have no intended change in regulatory effect.

SECTION: 1.8.7.2.1 (formerly 108.7.2.1) (4) Approval of Alternates.

HCD proposes to correct reference to defined terms by capitalizing the terms and including the terms in quotes. The modifications have no intended change in regulatory effect.

SECTION: 1.8.7.3 (formerly 108.7.3) Department of Housing and Community Development.

HCD proposes to restructure this section to provide consistency with the CBC. The modifications have no intended change in regulatory effect.

SECTION: 1.8.9 (formerly 108.9) – UNSAFE BUILDINGS OR STRUCTURES

SECTION: 1.8.9.1 (formerly 108.9.1) (1) through (5) Authority to Enforce.

HCD proposes to add more specificity and consistency to citations for referenced statutes and make related punctuation corrections. The modifications have no intended change in regulatory effect.

SECTION: 1.8.9.2 (formerly 108.9.2) (1) through (5) Actions and Proceedings.

HCD proposes to add more specificity and consistency to citations for referenced statutes and make related punctuation corrections. The modifications have no intended change in regulatory effect.

ADMINISTRATION

DIVISION II

HCD proposes redesignating this chapter as Division II of Chapter 1, deleting the former designation and location as an appendix chapter, and keeping it in the front section of the CPC. This action, in coordination with HCD's state agency partners, resulted from guidance received from the California Building Standards Commission, Coordinating Council Ad Hoc Committee.

HCD proposes a note to alert users of the relocation of the chapter.

HCD proposes adoption of this chapter as shown on the attached Matrix Adoption Table.

CHAPTER 2 DEFINITIONS

HCD proposes to adopt the 2009 UPC, Chapter 2, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTIONS: 203.0 "Approved"
203.0 "Approved Testing Agency"
203.0 "Authority Having Jurisdiction"

HCD proposes to continue adoption of the above referenced California amendments. These California amendments have been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 204.0 "Building"

HCD proposes to continue adoption of the above referenced California amendment with modification to editorially correct the term "multi-unit manufactured housing" to "multifamily manufactured home". The modification has no intended change in regulatory effect.

SECTION: 205.0 "Covered Multi-Family Dwellings"

HCD proposes to continue adoption of the above referenced California amendment with modification to editorially correct "Dwellings" by adding an "s". The modification has no intended change in regulatory effect.

SECTIONS: 206.0 "Department"
206.0 "Department Having Jurisdiction"

HCD proposes to continue adoption of the above referenced California amendments with modification to the banner for consistency. These California amendments have been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 207.0 "Enforcing Agency"

HCD proposes to continue adoption of the above referenced California amendment with modification to the banner for consistency. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 211.0 "Insanitary"

HCD proposes to repeal the above referenced California amendment. The new model language contains the same language as this repealed California amendment. This repeal will have no intended regulatory effect.

SECTIONS: 214.0 "Labeled"
214.0 "Lavatory"
214.0 "Listed"
214.0 "Listing Agency"
214.0 "Low VOC Cement"
214.0 "Low VOC One-step Cement"
214.0 "Low VOC Primer"

HCD proposes to continue adoption of the above referenced California amendments. These California amendments have been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTIONS: 216.0 "Non-Water Supplied Urinal"
216.0 "Nuisance"

HCD proposes to continue adoption of the above referenced California amendments. These California amendments have been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 221.0 “Single Family Dwelling”

HCD does not adopt this definition; it is not consistent with state housing law and would be a conflict between building code and state housing law. This non-adoption is being brought forward from the previous adoption cycle and will be shown in the matrix.

SECTION: 222.0 “Testing Agency”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 223.0 “UPC”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 225.0 “Water Closet”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

CHAPTER 3 GENERAL REGULATIONS

HCD proposes to adopt the 2009 UPC, Chapter 3, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 301.2 “Alternate Materials and Methods of Construction Equivalency”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 301.5 “One- and Two-Family Dwellings”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 303.0 “Disposal of Liquid Waste”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 304.0 “Connections to Plumbing System Required”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 313.0 “Protection of Piping, Materials, and Structures”

SECTION: 313.7

HCD proposes to amend the above referenced section by deleting the references to Table 14.1 and Chapter 15 “Firestop Protection”. The California amendments are necessary because Chapter 15 is not adopted, and since Table 14.1 contains a reference to non-adopted Chapter 15, it is also being deleted. Firestop protection regulations are specified in the CBC, Chapter 7.

Additionally, the reference to the “Building Code” is modified to the “California Building Code” for clarity.

SECTION: 316.1.6 “Solvent Cement Plastic Pipe Joints”

HCD proposes to continue adoption of the above referenced California amendment with modifications to remove the hyphen from Low VOC and correct an internal reference to Section 214. The modifications have no intended change in regulatory effect.

SECTION: 316.2.4 “Dielectric Unions”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

CHAPTER 4 PLUMBING FIXTURES AND FIXTURE FITTINGS

HCD proposes to adopt the 2009 UPC, Chapter 4, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 402.0 Water-conserving Fixtures and Fittings

SECTION: 402.1

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.1.1 "Shower Heads"

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.1.2 "Faucets"

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.2.1 "Water Closets after January 1, 1994"

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.2.2 "Water Closets on or after July 1, 2011"

HCD proposes to continue adoption of the above referenced California amendment with modification. This California amendment has been brought forward from the 2007 CPC and has been amended to specify a flushing performance standard and to enable local enforcing agencies to modify the requirement should availability become a problem.

These amendments are necessary to address concerns expressed to HCD stating that toilets with lower flush volumes may not perform as well as other models generating consumer complaints and that as manufacturers continue to convert their entire product lines to meet the high-efficiency criteria, a sufficient number of toilets may not be available to satisfy the market needs of California.

The U.S. Environmental Protection Agency (EPA) through the *WaterSense Program* has done extensive research on the flushing performance of high-efficiency water closets and has developed a performance standard to address the concern regarding consumer satisfaction. As of January 2009, recent advancements in design have allowed over 30 manufacturers producing nearly 200 models to meet or exceed the *WaterSense* performance and efficiency standards while using 20 percent less water than the current federal 1.6 gallon per flush standard. Unlike some toilets considered low-flow toilets, *WaterSense* toilets combine high-efficiency with high performance. Design advances enable *WaterSense* toilets to save water with no trade-off in flushing power. In fact, many perform better than standard toilets in consumer testing.

EPA estimates that over the course of a person's lifetime, they will likely flush the toilet nearly 140,000 times. Use of high-efficiency toilets can save 4,000 gallons per year. EPA also states that these toilets are available at a wide variety of price points and a broad range of styles. In addition, EPA estimates that a family of four will, on average, save more than \$90 per year in reduced water utility bills, and \$2,000 over the lifetime of the toilet.

HCD has also received comments from manufacturer trade associations indicating a sufficient number of high-efficiency toilets may not be available to meet the needs of the California market. Considering the need for a drastic reduction in water use to conserve one of California's most valuable resources, the number of manufacturers that currently have the ability to produce high-efficiency toilets, the number of models available, and the fact that the California housing market is experiencing a reduction in the projected number of housing starts of approximately 75%, HCD does not believe that the concern over product availability is adequate to delay the requirement to use high-efficiency water closets.

However, in an effort to address these concerns and ensure that as the housing market in California recovers and to eliminate any perceived burden related to availability, HCD is proposing to amend this section to clarify that a local enforcing agency may temporarily suspend the requirement for the use of high-efficiency water closets.

SECTION: 402.3.1 “Urinals after January 1, 1994”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.3.2 “Urinals on or after July 1, 2011”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 402.3.3 “Non-Water Supplied Urinals (Waterless Urinals)”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 405.2 “Prohibited Urinals”

HCD proposes to repeal the above referenced California amendment. The new model language contains the same language as this repealed California amendment. This repeal will have no intended regulatory effect.

SECTION: 406.5. “Drinking Fountains”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 407.6 “Installations for Persons with Disabilities”

HCD proposes to continue adoption of the above referenced California amendment with modification to remove the word “physical”. The modification has no intended change in regulatory effect.

SECTION: 411.6

HCD proposes to continue adoption of the above referenced California amendment with modification to remove the word “physical”. The modification has no intended change in regulatory effect.

SECTION: 411.7

HCD proposes to continue adoption of the above referenced California amendment with modifications to correct punctuation and to remove the word “physical”. The modifications have no intended change in regulatory effect.

SECTION: 412.3

412.5

412.5.1

412.5.2

412.5.3

412.6

HCD proposes to not adopt the above sections. These non-adoptions are being brought forward from the 2007 CPC and will have no change in regulatory affect. These sections are not applicable to occupancies under authority of HCD. The non-adoptions will be shown in the Matrix Adoption Table.

SECTION: 413.0 “Fixtures and Fixture Fittings for Persons with Disabilities”

HCD proposes to continue adoption of the above referenced California amendment with modifications to correct punctuation and to remove the word “physical”. The modifications have no intended change in regulatory effect.

TABLE 4-1 MINIMUM PLUMBING FACILITIES

HCD proposes to continue adoption of the above referenced California amendment with modification. The modifications have no intended change in regulatory effect.

CHAPTER 5 WATER HEATERS

HCD proposes to adopt the 2009 UPC, Chapter 5, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 508.2

HCD proposes to continue to not adopt this section. The amendments in Section 508.2.1 are the California requirements for this section. There is no intended change in regulatory affect.

SECTION: 508.2.1

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

CHAPTER 6 WATER SUPPLY AND DISTRIBUTION

HCD proposes to adopt the 2009 UPC, Chapter 6, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 601.1

HCD proposes to continue adoption of the above referenced California amendment with modification. This California amendment has been brought forward from the 2007 CPC, in the form of two added exceptions with no intended change in regulatory effect of the existing exceptions. The modification adds another exception to the existing exceptions and allows the use of recycled water for uses specified in Chapter 16 Part II. This modification will promote water conservation efforts in residential applications.

SECTION: 601.2.2 “Color and Information”

HCD proposes to continue adoption of the above referenced California amendment with modification to change “provided” to “shown” and adding “for all nonpotable water systems”. The addition language is to make clear that the exception in the model language only applies to the color of the markings, all nonpotable water systems will have the international symbol of a glass in a circle with a slash through it.

NOTE: The California amendment that applied to former Section 601.2.2 “Nonpotable Water” now applies to the revised 2009 model code Section 601.2.2 “Color and Information”. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 601.4

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 603.4.11 “Nonpotable Water Piping”

HCD proposes to continue adoption of the above referenced California amendment with modifications to change “provided” to “shown” and capitalize “Figure”. The modifications have no intended change in regulatory effect.

TABLE 6-4

HCD proposes to continue adoption of the above referenced California amendment with modification. The table has been replaced in model code. The superscript numbers on the footnotes have been changed due to an addition to the model code. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 604.1.1.” *Local Authority to Approve CPVC Pipe Within Residential Buildings Under Specified Conditions*”

HCD proposes to continue adoption of the above referenced California amendment with modifications to update internal references and to add a reference to Section 1.2.1 regarding flushing requirements. The modifications have no intended change in regulatory effect.

SECTION: 604.10

HCD proposes to continue adoption of the above referenced California amendment with modification to add a banner to the “Note”. The modification has no intended change in regulatory effect.

SECTION: 604.13 “PEX-AL-PEX and PE-AL-PE”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 604.13.1 “PEX-AL-PEX and PE-AL-PE”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 604.13.2 “Water Heater Connections”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 609.10 “Water Hammer”

HCD is proposing to continue to not adopt this section and places banner to show non-adoption of this section.

TABLE 6-5

HCD proposes to continue adoption of the above referenced California amendment with modifications to Footnote No. 9 by adding a banner, adding “water supply” and correcting a reference to “mobilehome parks” for clarity. The modifications have no intended change in regulatory effect.

CHAPTER 7 SANITARY DRAINAGE

HCD proposes to adopt the 2009 UPC, Chapter 7, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 701.1.2

HCD proposes to amend the above referenced section by deleting the reference to Chapter 15 “Firestop Protection”. This California amendment is necessary since Chapter 15 is not adopted. Firestop protection regulations are specified in the CBC, Chapter 7.

SECTION: 701.1.2.2

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

TABLE 7-3

HCD proposes to continue adoption of the above referenced California amendment with modifications to Footnote No. 9 by adding a banner, adding “drainage” and correcting a reference to “mobilehome parks” for clarity. The modifications have no intended change in regulatory effect.

SECTION: 705.1.7 “Elastomeric Gasketed and Rubber-Ring Joints”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 705.1.9 “Hubless Cast Iron Pipe Joints”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 705.2.5 “ABS and PVC Pipe”

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 710.3.3.1

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 713.4

HCD proposes to adopt the above referenced section with amendment to add an Exception. The choice of when a sewer is considered as not being available is to be determined by the Authority Having Jurisdiction because of geographic diversity and cost. Local conditions could present challenges so that a set distance would not be appropriate or cost effective.

CHAPTER 8 INDIRECT WASTES

HCD proposes to adopt the 2009 UPC, Chapter 8, without California amendments, as indicated on the attached Matrix Adoption Table.

CHAPTER 9 VENTS

HCD proposes to adopt the 2009 UPC, Chapter 9, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 903.1.2

HCD proposes to amend the above referenced section by deleting the reference to Chapter 15 “Firestop Protection”. This California amendment is necessary since Chapter 15 is not adopted. Firestop protection regulations are specified in the CBC, Chapter 7.

SECTION: 903.1.3

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 903.1.4

HCD proposes to continue adoption of the above referenced California amendment. This section was previously Section 903.3.1 and has been relocated to Section 903.1.4 because of a change in the model code language. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

CHAPTER 10 TRAPS AND INTERCEPTORS

HCD proposes to adopt the 2009 UPC, Chapter 10, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 1003.1

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 1005.0 Trap Seals

HCD proposes to repeal the Exception, a California amendment, in the above referenced section. The Exception in Section 1005.0 was previously adopted by HCD to allow the use of waterless urinals, which do not have a water seal. The 2009 UPC amended the model language to read "liquid seal" rather than "water seal". This change in model language allows the use of waterless urinals and the HCD amendment is no longer necessary. There is no intended change in regulatory effect.

CHAPTER 11 STORM DRAINAGE

HCD proposes to adopt the 2009 UPC, Chapter 11, with California amendments, as indicated below and on the attached Matrix Adoption Table.

SECTION: 1101.3 Material Uses

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

Additionally, HCD proposes to make a grammatical change by adding the word "and" and deleting the reference to Chapter 15 "Firestop Protection" since Chapter 15 is not adopted. Firestop protection regulations are specified in the CBC, Chapter 7.

SECTION: 1101.5.1

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

SECTION: 1102.1.2

HCD proposes to continue adoption of the above referenced California amendment. This California amendment has been brought forward from the 2007 CPC with no intended change in regulatory effect.

CHAPTER 12 FUEL PIPING

HCD proposes to adopt the 2009 UPC, Chapter 12, without California amendments, as indicated on the attached Matrix Adoption Table.

CHAPTER 13 HEALTH CARE FACILITIES AND MEDICAL GAS AND VACUUM SYSTEMS

HCD proposes to not adopt the 2009 UPC, Chapter 13, as indicated on the attached Matrix Adoption Table.

CHAPTER 14 MANDATORY REFERENCED STANDARDS

HCD proposes to adopt the 2009 UPC, Chapter 14, without California amendments

CHAPTER 15 FIRESTOP PROTECTION

HCD proposes to not adopt the 2009 UPC, Chapter 15, as indicated on the attached Matrix Adoption Table.

CHAPTER 16 NONPOTABLE WATER REUSE SYSTEMS

HCD proposes to not adopt the 2009 UPC, Chapter 16, as indicated on the attached Matrix Adoption Table.

CHAPTER 16A NONPOTABLE WATER REUSE SYSTEMS

HCD proposes to continue the adoption of the 2007 California Plumbing Code, Chapter 16A as indicated below and on the Matrix Adoption Table.

NOTE: SB 1258 (Ch. 172, Stats. of 2008), directed HCD to propose building standards for the construction, installation, and alteration of graywater systems for residential indoor and outdoor uses.

While in development of the building standards, HCD decided to move the newly proposed regulations forward as an emergency rulemaking pursuant to the Governor's proclamation dated February 27, 2009, declaring a drought to be in existence and a state of emergency to exist within California. The proclamation directed, to the extent allowed by applicable law, state agencies within his administration to prioritize and streamline permitting and regulatory compliance actions for desalination, water conservation and recycling projects to provide drought relief.

The emergency rulemaking amending the 2007 California Plumbing Code, which added Chapter 16A, was approved by the California Building Standards Commission on July 30, 2009. The emergency regulations adopting Chapter 16A were subsequently filed with the Secretary of State on August 4, 2009, effective immediately upon filing.

Chapter 16A was based on the 2009 UPC, Chapter 16. Since a substantial amount of amendments were necessary, HCD chose to create a new Chapter 16A. Chapter 16A as submitted in this rulemaking has no intended change in regulatory effect from Chapter 16A as approved by the CBSC on July 30, 2009, and filed with the Secretary of State on August 4, 2009.

The following rationale, submitted with the emergency rulemaking, is reprinted here to provide clarity and an historical perspective.

Part I

HCD proposes to place a statement of "Intent" at the beginning of this chapter immediately below the chapter heading. This statement of "Intent" informs the user that this chapter only applies to occupancies under authority of HCD and explains the intention of the regulations included below. The purpose is to preserve health and safety of Californians while conserving water and providing guidance on how to safely achieve water reuse using a graywater system.

SECTION 1601A.0 Graywater Systems – General.

HCD proposes to adopt referenced section title and the subsections (A) through (I) listed below.

- (A) HCD proposes to not adopt model code language brought over from Chapter 16 of the 2009 Uniform Plumbing Code and add this amendment subsection to state the application of graywater system building standards; address prevalent health and safety concerns which are the prevention of backflow to avoid contamination of potable water supply, and to control the dispersion of graywater to preclude its surfacing providing a vector for possible human contact; and provide the Health and Safety Code authority allowing local authorities to further restrict or prohibit use of graywater systems. The design requirement is removed from this section and placed in Section 1603A.1 to cover the various types of graywater systems the design requirements change appropriately.
- (B) HCD proposes to not adopt model code language brought over from Chapter 16 of the 2009 Uniform Plumbing Code and add this amendment subsection to provide users with the criteria for determining the type of graywater system needed to accomplish the user's goal of the graywater system. The requirement for a tank was removed from model language allowing small systems to directly discharge graywater to irrigation or disposal fields. Tanks will be used only if required by design. The removal of the requirement for a tank reduces the possibility of holding the graywater until it becomes septic, effectively reducing risk of pathogen contact with humans. Smaller systems not utilizing a tank will be less complicated to install and less expensive.
- (C) HCD proposes to adopt model code language from Chapter 16 of the 2009 Uniform Plumbing Code and add an exception allowing the user to extend a graywater system beyond property lines under specific

circumstances. This is a similar provision that is permitted in Appendix K "Private Septic Systems" of the 2007 California Plumbing Code for the design and construction of private septic systems.

- (D) HCD proposes to adopt and amend model code language from Chapter 16 of the 2009 Uniform Plumbing Code requiring a construction permit, and add an exception to this requirement. The amendments to the model code language do not change the intended regulatory effect requiring a construction permit, which is necessary for ensuring some local oversight is provided to evaluate the system and its installation. The added exception is a provision to exempt clothes washer systems and single fixture systems (as defined in these proposed building standards) from the construction permit requirement.

HCD believes that the exemption provision will help support the construction of affordable systems generally common to the average single-family user of graywater wanting to conserve water with a small capacity graywater system without the cumbersome and expensive permitting and engineering process. HCD has received numerous comments from stakeholders indicating extensive unlawful installations of graywater systems for single family dwellings due to the current permitting requirements.

- (E) HCD proposes to not adopt model code language brought over from Chapter 16 of the 2009 Uniform Plumbing Code regarding the permit restriction in a geologically sensitive area. Senate Bill 1258 (Ch. 172, Stats. of 2008) provides authority to the enforcing agency (city, county or other local agency) the ability to further restrict graywater systems eliminating the need for this section. HCD additionally proposes an amendment to this subsection requiring the user to have the ability to direct the flow of the graywater to the sanitary drain at will. This requirement is needed on graywater systems of all types in order to control the discharge when irrigation is not necessary or direction to a disposal field is not suitable and may pose a health and safety risk.
- (F) HCD proposes to not adopt model code language brought over from Chapter 16 of the 2009 Uniform Plumbing Code regarding private septic systems. This provision for private sewage disposal has no place in the graywater regulations and is addressed in Appendix K "Private Septic Systems" of the 2007 California Plumbing Code. HCD additionally proposes an amendment to interpret, implement and clarify the provisions of Health and Safety Code Section 17922.12 prohibiting the use of water used to wash diapers or similarly soiled or infectious garments, and that water used for such purpose be directed to the structure's building sewer.
- (G) HCD proposes to add this subsection as a safeguard to health and safety relevant to the safe reuse of graywater. The spraying or ponding, or run-off and/or discharge of graywater directly into any storm sewer system or any body of water is prohibited due to the potential for pathogens. This health and safety measure is supported through studies concerning graywater, including the Water Environment Research Foundation (WERF) referenced in Health and Safety Code Section 17922.12 and the California Department of Public Health.
- (H) HCD proposes to add this subsection as a safeguard to health and safety relevant to the safe reuse of graywater. Graywater is known to contain pathogens and contact is to be avoided or minimized, with an exception provided regarding the maintenance or repair of the system. Locating the graywater below the surface minimizes the vector and the chance of inadvertent human contact. Discharge points require a minimum of two (2) inches coverage so the graywater will be beneficial for irrigation, and minimize ponding or run-off.
- (I) HCD proposes to add this subsection as a safeguard to health and safety relevant to the safe reuse of graywater. Graywater is not to be used to irrigate root crops or edible parts of food crops that contact the soil. This is widely accepted by users of graywater and health officials as a safety precaution and is an appropriate restriction.

SECTION 1602A.0 Definitions.

HCD proposes to adopt the referenced section title and add this section to define numerous terms necessary for the manufacture, design and construction of graywater systems and the safe use of graywater.

Clothes Washer System.

HCD proposes to add this subsection to define for the code user what constitutes a clothes washer system as used in this chapter.

Complex System.

HCD proposes to add this subsection to define for the code user what constitutes a complex system as used in this chapter.

Disposal Field.

HCD proposes to add this subsection to define for the code user what constitutes a disposal field as used in this chapter.

Graywater.

HCD proposes to not adopt model code language brought over from Chapter 16 of the 2009 Uniform Plumbing Code regarding the definition for graywater and proposes to add the new definition for the code user. Graywater is defined in Health and Safety Code Section 17922.12 and is reiterated here for the code user's ease of reference.

Graywater System.

HCD proposes to add this subsection to define for the code user what constitutes a graywater system as used in this chapter.

Irrigation Field.

HCD proposes to add this subsection to define for the code user what constitutes an irrigation field as used in this chapter.

Mulch.

HCD proposes to add this subsection to define for the code user what constitutes mulch as used in this chapter.

Mulch Basin.

HCD proposes to add this subsection to define for the code user what constitutes a mulch basin as used in this chapter.

Simple System.

HCD proposes to add this subsection to define for the code user what constitutes a simple system as used in this chapter.

Single Fixture System.

HCD proposes to add this subsection to define for the code user what constitutes a single-fixture system as used in this chapter.

Treated Graywater.

HCD proposes to add this subsection to define for the code user what constitutes treated graywater as used in this chapter.

SECTION 1603A.0 Permit.

HCD proposes to amend this section from the model language. HCD proposes to add the exception as a California provision to exempt clothes washer systems and single fixture systems from the construction permit requirement. This exemption will promote affordable systems for the average single family user of graywater. The primary goal is to allow and promote installation for those users wanting to conserve water with a small capacity graywater system without the cumbersome and expensive permitting and engineering process. HCD has received many comments from stakeholders indicating widespread unauthorized use because of the current permitting requirements, primarily for single family dwellings. With reduced bureaucracy and expense, the health and safety of citizens will be better protected against unauthorized systems by providing guidelines for these smaller systems that is easily achieved. Exemptions for permits are already in place within the building codes, HCD proposes to add these systems to the existing exemptions to aid in the efforts to conserve water for the future of California.

SECTION 1603A.1 System Requirements.

HCD proposes to add the above mentioned section. HCD recognizes the need to classify graywater systems into three general categories listed below and include definitions and requirements for each type of system.

SECTION 1603A.1.1 Clothes Washer System and/or Single Fixture System.

HCD proposes to add this section along with 12 subsections. This is the first of three types of graywater systems. HCD has specifically designated the Clothes Washer System and Single Fixture System to be allowed without a construction permit when certain criteria have been met. The State of California has made very clear there is a need to conserve water. The reuse of graywater for irrigation is a very effective means of reducing potable water use and could potentially be a valuable tool for the state when used widely. The water use savings will vary, but most single family homes use at least 50% of the water on irrigation so if utilized, the water use could be reduced by 40% or more depending on the site. The Clothes Washer System and/or Single Fixture System will allow reuse of the largest sources of graywater in the average household, maximizing water use efficiency with the least amount of effort and cost. It is likely that this section will be the most common type of graywater system used for a single family dwelling.

The 12 subsections included in this section are minimum safeguards and guidance for users to install and use these systems in a way that minimizes any threat to health and safety. These provisions are performance based to allow design flexibility appropriate for the system size and use. The development of these 12 subsections included a large amount of stakeholder input along with the consideration of existing use in other states and countries.

HCD recognizes some of this language is unprecedented in Title 24 because it includes education and direction that will not be monitored unless a complaint is filed. This is necessary for these regulations as this section will be widely used by homeowners that are not familiar with typical Title 24 language and need the directions and information given in this section as a safeguard.

SECTION 1603A.1.2 Simple System.

HCD proposes to add this section and three subsections. This is the second of the three types of systems. The Simple System is specifically designed to accommodate the average home up to five bedrooms. The calculations in Section 1606A determine estimated discharge of a graywater system. Using this formula, HCD established a 250 gallon per day (GPD) maximum for these systems. The 250 GPD mark is also used by New Mexico and has been determined to be a point where engineering could be required above this mark; below 250 GPD the design will be the industry standard and performance based.

SECTION 1603A.1.3 Complex System.

HCD proposes to add this section and three subsections. This is the third and largest of the three types of graywater systems. These systems discharge a large volume of over 250 gallons per day and are more complicated in design than the other two types of graywater systems. The design criteria for these systems will satisfy the enforcing agency and could include engineering, design professional or drawings from any person competent to design such systems. The application for these systems will be very large homes, multi-family dwellings or other similar occupancies.

TABLE 1603A.1 Construction Permit Requirements.

HCD proposes to add this table. This table clarifies the need for permitting all the system types in this one location. The user will have this as a tool to simplify referencing the included information about permits without researching the entire chapter. Multiple stakeholders requested this information be consolidated for reference. HCD responded to the needs of the stakeholders with this proposed table.

SECTION 1604A.0 Drawings and Specifications.

HCD proposes to strikeout the model language in this section and add new language more appropriate for this chapter as amended. The existing language is too restrictive for all types of graywater systems and the new language is performance based which makes these details and perk tests unnecessary. The amended language provides guidance applicable to graywater systems allowing the Enforcing Agency to require submittal documents according to local conditions. Each area will have differences and the local authority will know what is needed in that locale. This allows wider use in areas capable of handling greater discharge and restricted use in less permeable areas.

SECTION 1604A.1 Groundwater Depth.

HCD proposes to add this section in order to prevent costly and unnecessary verification of groundwater depth. The required groundwater separation is set at three-foot minimum from graywater system to groundwater. It is not necessary to locate groundwater if the separation distance has been met, so this added section prevents expensive drilling to locate the groundwater depth by allowing an inexpensive test hole to prove adequate separation and protect the groundwater.

SECTION 1605A.0 Inspection and Testing.

HCD proposes to strikeout the existing model language on inspection. The provisions in this chapter have been significantly modified changing the needed requirements for inspection. For example, tanks are no longer required in all systems so the inspection of tanks is no longer needed in all systems. When a tank is installed, it will be tested and the testing provisions remain model language.

SECTION 1606A.0 Procedure for Estimating Graywater Discharge.

HCD proposes to adopt this section of model language with an amendment. The amendment has no change in regulatory affect and adds clarity to the user for the intended regulation. The proposed amendment adds “estimates of graywater use based on” to the model language so the user understands that graywater need estimates may be based on the amount of water previously used as shown in water use records. HCD believes that with this proposed amendment the code user will be able to accurately establish the graywater discharge and need from a given structure.

SECTION 1607A.0 Required area of Irrigation or Disposal Fields.

HCD proposes to not adopt model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. This California amendment removes model code provisions for calculating effective irrigation area in UPC Table 16-2 and usage of estimated graywater discharge rates in UPC Section 1606.0 because these provisions may not apply to all graywater system designs. The tables have been modified and retained and are referenced by other sections of this chapter. HCD is also proposing to remove some of the prescriptive requirements of this section because they are more suited to sewage disposal fields than graywater irrigation or disposal. In addition, the minimum depth a graywater system may extend or encroach upon ground, surface and other waters was reduced to three (3) feet. The California State Water Resources Control Board (CSWRCB) is now in the process of developing regulations for on-site wastewater disposal systems (septic system). At this time, the regulations call for three (3) feet separation to high ground water. This requirement is less stringent than the model code graywater standard that requires five (5) feet separation to high ground water. This change was necessary to remove the conflict between the graywater standards and the CSWRCB's programs.

This California amendment provides clear language which has been condensed and simplified for easier application and use. Inclusion of this California amendment provides a clear distinction between graywater uses for irrigation purposes versus the model code's focus on disposal methods. Also, a clarifying note is added to indicate that it is not necessary to verify the location of groundwater provided it is greater than three (3) feet from the lowest point of the irrigation or disposal field. These provisions are pursuant to recommendations from state agencies, technical experts and comments from focus group members and the public. This proposed action provides clarity and consistency to the code user.

SECTION 1608A.0 Determination of Maximum Absorption Capacity.

HCD proposes to not adopt all of the model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. This California amendment removes burdensome model code provisions for establishing absorption capacity of the soil that does not allow for local enforcing agencies flexibility in determining the application of graywater to various soil types. The proposed amendments provide distinction between graywater uses for irrigation purposes versus the model code's focus on disposal methods, and add an exception which permits the local Enforcing Agency to waive percolation requirements based upon their knowledge of local soil conditions. An exception is also added to clarify that drip type irrigation systems should not need percolation tests because these systems emit graywater in smaller regulated doses. They have surge tanks to accommodate larger quantities of graywater, which, in the event of excess graywater, will automatically divert the graywater to the building sewer, and already are required to be covered and protected. These provisions are pursuant to recommendations from technical experts and comments from focus group members and the public. This proposed action provides clarity and consistency to the code user.

SECTION 1609A.0 Tank Construction.

HCD proposes to not adopt all of the model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. This California amendment removes some incorrect model code provisions and language. “Holding tank” has been replaced by “Tank”. “Tank” serves a more general application which does not discount a holding tank but would include a surge tank. A surge tank is most often utilized in current designs to store graywater for a limited allowable time. Additional simplified language for ease of application and use was added and model code language for holding tank was deleted. In addition, HCD has proposed to add provisions necessary to safeguard against the intrusion of pests and is proposing to make the warning labels consistent throughout the graywater system by specifying that all the labels use the word “caution”. HCD is also proposing to clarify that

overflow drains are required on all tanks regardless of location and that they be referred to as an overflow drain, not an emergency drain. It was determined the required materials were unnecessarily costly and restrictive given modern technologies. All tanks for use above ground and underground are not steel and should not be required to be steel. Item I removed overflow drain and backwater requirements for a clothes washer system because due to the nature of the system, they are not necessary. The pump out cycle of a clothes washer is no different if it is connected to a drain leading to a graywater system or the building sewer. This proposed action provides clarity and consistency to the code user.

SECTION 1610A.0 Graywater Systems.

HCD proposes to adopt the above referenced new California amendment. This California amendment strikes the reference to UPC Chapter 16, Figures 16-1, 16-2, 16-3 and 16-4 which were not brought forward from the model code chapter and are not proposed for adoption by HCD. Comments received from stakeholders indicated the figures did not accurately reflect modern graywater system design and were confusing to the regulated public. References to the required section in Chapter 16A are also corrected. This proposed action provides clarity and consistency to the code user.

SECTION 1610A.1 Pipe Materials.

HCD proposes to adopt the above referenced new California amendment. This section contains model code provisions brought forward and proposed to be inserted for use in Chapter 16A. This proposed action provides clarity and consistency to the code user.

SECTION 1610A.2 Identification.

HCD proposes to not adopt all of the model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. This proposed California amendment removes a perceived conflict which is further discussed in the rationale for Section 1612A.1. Currently, the color purple is used for recycled water treated to Title 22 standards. HCD believes that more coordination must be done in this area before different standards for different colors and types of water and water piping systems can be introduced in the code without causing confusion to the code user. In this section, HCD proposes to specify the labeling requirements for graywater collection piping upstream from the graywater distribution system. These revisions to model code provisions are pursuant to recommendations from technical experts and comments from focus group members and the public. This proposed action provides clarity and consistency to the code user.

SECTION 1610A.3 Valves.

HCD proposes to not adopt all of the model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. HCD proposes to amend this model code section to clarify that a three way valve is not necessary for all graywater systems because there are other methods for the user to direct the flow of the system to either the graywater irrigation or disposal field or the building sewer. A very simple example of this is a system which utilizes multiple standpipes in which the discharge line from a clothes washer may be placed in either the standpipe that leads to an irrigation field or a standpipe that leads to the building sewer. HCD also proposes to amend this section to clarify that in some instances the method of changing direction may be enclosed or in the crawl space of a structure and would not meet the commonly accepted definition of readily accessible. HCD is also removing Authority Having Jurisdiction. Authority Having Jurisdiction is not an adopted term by HCD and does not need to be in this section. Use of the term is also redundant. It is already established in Section 1601A.0 that the Enforcing Agency (aka Authority Having Jurisdiction) has the ability to require more stringent requirements than those adopted by HCD. This proposed action provides clarity and consistency to the code user.

SECTION 1610.4 Trap.

HCD proposes to not adopt this model code language from Chapter 16 of the 2009 Uniform Plumbing Code. HCD proposes to delete this model code section because it is not necessary. Currently all plumbing fixtures in a building are required to have traps to prevent gases and odors from entering the building. Chapter 16A does not preclude the drainage system from compliance with the other parts of this code and specifically would not rescind the requirement for all traps inside the structure to be protected by a vent when installing a graywater system. This section would not add any additional protections to the structure because the plumbing system is already required to include traps. This proposed action provides clarity and consistency to the code user.

SECTION 1611A.0 Irrigation, Disposal Field and Mulch Basin Construction.

HCD proposes to adopt the above referenced new California amendment. HCD proposes to amend the section title to clarify that an irrigation field and a disposal field are different and are not constructed the same. The added California amendment language to this section is charging language to indicate to the code user that this section will provide guidance on the proper construction of irrigation field, disposal field and a mulch basin. In addition, this section also clarifies that the intent of HCD is not to prohibit or restrict technologies not specifically covered by this code. This proposed action provides clarity and consistency to the code user.

SECTION 1611A.1 Mulch Basin.

HCD proposes to adopt the above referenced new California amendment. HCD proposes to add this section to clarify to the code user that a mulch basin may be used as an irrigation or disposal field. This new California amendment will further clarify that mulch basins require periodic maintenance and must be sized to accept the rapid flow of water from a clothes washer or bathtub or other fixture which is connected to the graywater system without ponding or runoff. This proposed action provides clarity and consistency to the code user.

SECTION 1611A.2 Irrigation Field.

HCD proposes to adopt the above referenced new California amendment which provides the code user with acceptable methods for design of graywater irrigation fields. These provisions address requirements for filters, emitters, irrigation zones and distribution of water among irrigation zones, materials used for supply and drip feeder lines, pressure control, and back siphonage control. Inclusion of this section also provides a distinction between graywater use for irrigation purposes versus the model code's apparent focus on disposal methods for both irrigation and disposal. These provisions are pursuant to recommendations from technical experts and comments from focus group members and the public.

SECTION 1611A.3 Disposal Field.

HCD proposes to not adopt all of the model code language from Chapter 16 of the 2009 Uniform Plumbing Code and instead proposes to delete some of the model code language and proposes to adopt new California amendment language in its place. This amendment provides distinct requirements for disposal fields versus Chapter 16 of the 2009 Uniform Plumbing Code, which addresses these systems in one section. This amendment also provides for use of properly installed manufactured infiltration systems in disposal systems and proposes changes to acceptable dimensions for bottom width of trenches and depth of earth cover over lines. These changes and other clarifying changes are pursuant to recommendations from technical experts and comments from focus group members and the public.

SECTION 1612A.0 Special Provisions.

HCD proposes to adopt the above referenced new California amendment. This amendment provides a correct reference to a code section addressing use of alternate materials for HCD applications and changes the reference to the local government agency with authority to a term common to other parts of the California Building Standards Code, "Enforcing Agency". HCD also proposes to maintain consistency throughout Chapter 16A by providing the Health and Safety Code authority allowing local authorities to further restrict or prohibit use of graywater systems. Similar references are also included in Sections 1601A.0 and 1603A.1.1. In addition, HCD proposes to add subsection (C) which provides guidance to the code user for installation of graywater stub-out plumbing for future use. The proposed language clarifies that the stub-out plumbing must be properly labeled. These changes are pursuant to recommendations from technical experts and comments from focus group members and the public.

Table 16A -1 Location of Graywater System.

HCD proposes to adopt the above referenced new California amendment table which is based on modifications to UPC Chapter 16, Part I, which is not adopted for California. Model code Table 16-1 has been modified and shown as new text to separately address the distance from specified structures and property features such as property lines, septic tanks, etc. for irrigation and disposal fields. Changes include an increase in the distance some graywater disposal fields must be from streams, lakes and structures, a decrease in the distance irrigation fields may be from a property line, and a decrease in the distance an irrigation or disposal field must be from onsite domestic water service lines. A provision has been added to specify that tanks buried next to the foundation of a structure must be designed for surcharge. In addition, HCD is proposing to modify the previous model code requirement to clarify that for the purpose of this table stating that porches and steps, whether covered or uncovered, breezeways, roofed porte cocheres, roofed patios, carports, covered walks, covered driveways, and similar structures or appurtenances are not to be included in the category of building structures. These changes and changes to distances referenced in the chart and footnotes are pursuant to recommendations from technical experts and comments from focus group members and the public.

Table 16 A-2 Design Criteria of Six Typical Soils.

HCD proposes to adopt the above referenced new California amendment table which is based on modifications to UPC Chapter 16, Part I. Model code Table 16-2 which also included a second table showing metric equivalency has been modified (shown as new text for clarification) by merging the two tables and showing all information in one table. The merging of these two tables into one does not have a change in regulatory effect on the public.

Table 16A-3 Subsurface Drip Design Criteria of Six Typical Soils.

HCD proposes to bring forward this table previously adopted by the Department of Water Resources (DWR) in Appendix G of the California Plumbing Code. This table was previously titled Table G-3 and is being brought forward by HCD without amendment. Because the table is a new adoption by HCD and because the DWR will no longer have authority for graywater in residential occupancies, the table is shown as a new California amendment. However, there is no change in regulatory effect by this proposed adoption.

SECTION 1612A.1 Indoor use of Graywater.

HCD proposes to adopt the above referenced new California amendment which provides guidance on the indoor use of graywater. HCD has received comments from state agencies and stakeholders regarding the use of graywater indoors. The common thread in most of these comments is that untreated graywater use indoors poses a risk to the health and safety of the occupant. Plumbing fixture manufacturers have also expressed concerns regarding the wide range of water quality provided by onsite treatment systems and the effect that the wide range of water quality would have on the seals and mechanisms in the plumbing fixture.

Currently there are no applicable water quality standards for onsite treated graywater and no applicable third party certification standard for the onsite treatment systems. Canada and New South Wales, Australia have developed specific water quality standards for graywater use indoors. NSF International is working on a certification standard for graywater treatment devices which will meet these standards; however, these standards are not complete and ready for use.

Due to the lack of water quality standards for indoor graywater use and the lack of completed equipment certification criteria, HCD proposes to specify that onsite treated graywater meet the State of California recycled water quality criteria contained in Title 22 of the California Code of Regulations. Although the Title 22 standards were not developed for onsite treated graywater and may not be easily met by individual property owners, it is the most feasible reference at this time. HCD believes that as this emerging field becomes further developed and certification of onsite treatment systems becomes possible, a subsequent revision to this section and a reference to the water quality standards developed by Canada or New South Wales may be appropriate. In the future, HCD plans to continue to work with the California Department of Public Health on the appropriateness of these standards and believes that as onsite treatment systems become certified and have the ability to produce a consistent water output quality, manufacturer's concerns will be able to be mitigated.

APPENDIX A RECOMMENDED RULES FOR SIZING THE WATER SUPPLY SYSTEM

HCD proposes to adopt the 2009 UPC, Appendix A, without California amendments, as indicated on the attached Matrix Adoption Table.

APPENDIX B EXPLANATORY NOTES ON COMBINATION WASTE AND VENT SYSTEMS

HCD proposes to not adopt the 2009 UPC, Appendix B, as indicated on the attached Matrix Adoption Table.

APPENDIX D SIZING STORMWATER DRAINAGE SYSTEMS

HCD proposes to adopt the 2009 UPC, Appendix D, without California amendments, as indicated on the attached Matrix Adoption Table.

APPENDIX E MANUFACTURED/MOBILE HOME PARKS AND RECREATIONAL VEHICLE PARKS

HCD proposes to not adopt the 2009 UPC, Appendix E, as indicated on the attached Matrix Adoption Table.

APPENDIX F FIREFIGHTER BREATHING AIR REPLENISHMENT SYSTEMS

HCD proposes to not adopt the 2009 UPC, Appendix F, as indicated on the attached Matrix Adoption Table.

APPENDIX G GRAYWATER SYSTEMS [DWR]

HCD proposes to not adopt the 2009 UPC, Appendix G, as indicated on the attached Matrix Adoption Table.

APPENDIX I INSTALLATION STANDARDS

HCD proposes to adopt the 2009 UPC, Appendix I, with California amendments, as indicated below and on the attached Matrix Adoption Table.

Installation Standard For ABS BUILDING DRAIN, WASTE AND VENT PIPE AND FITTINGS IAPMO IS 5-2006

SECTION 2.2.6 Piping Installed in Fire Resistive Construction

HCD proposes to amend the above referenced section by deleting the reference to Chapter 15 "Firestop Protection". The California amendment is necessary since Chapter 15 is not adopted. Firestop protection regulations are specified in the CBC, Chapter 7.

Installation Standard For CPVC SOLVENT CEMENTED HOT AND COLD WATER DISTRIBUTION SYSTEMS IAPMO IS 20-2006

SECTIONS 1.2 *Special Requirements for CPVC Installation within Residential Structures. [HCD 1]*

1.2.1 Flushing Procedures

1.2.2 Worker Safety Measures

HCD proposes to continue adoption of the above referenced California amendments. There is a spelling correction: the word "withing" should have been "within". These California amendments have been brought forward from the 2007 CPC with no intended change in regulatory effect.

APPENDIX K PRIVATE SEWAGE DISPOSAL SYSTEMS

HCD proposes to adopt the 2009 UPC, Appendix K, without California amendments, as indicated on the attached Matrix Adoption Table.

APPENDIX L ALTERNATE PLUMBING SYSTEMS

HCD proposes to not adopt the 2009 UPC, Appendix L, as indicated on the attached Matrix Adoption Table.

TECHNICAL, THEORETICAL, AND EMPIRICAL STUDY, REPORT, OR SIMILAR DOCUMENTS:

(Government Code Section 11346.2(b)(2) requires an identification of each technical, theoretical, and empirical study, report, or similar document, if any, upon which the agency relies in proposing the regulation(s).)

None.

CONSIDERATION OF REASONABLE ALTERNATIVES

(Government Code Section 11346.2(b)(3)(A) requires a description of reasonable alternatives to the regulation and the agency's reason for rejecting those alternatives. In the case of a regulation that would mandate the use of specific technologies or equipment or prescribe specific action or procedures, the imposition of performance standards shall be considered as an alternative.)

None. There were no alternatives available to HCD. HCD is required by statute to adopt model codes by reference.

REASONABLE ALTERNATIVES THE AGENCY HAS IDENTIFIED THAT WOULD LESSEN ANY ADVERSE IMPACT ON SMALL BUSINESS

(Government Code Section 11346.2(b)(3)(B) requires a description of any reasonable alternatives that have been identified or that have otherwise been identified and brought to the attention of the agency that would lessen any adverse impact on small business. Include facts, evidence, documents, testimony, or other evidence upon which the agency relies to support an initial determination that the action will not have a significant adverse impact on business.)

HCD has determined that this regulatory action would have no significant adverse economic impact on California business enterprises and individuals, including the ability of California businesses to compete with businesses in other states.

FACTS, EVIDENCE, DOCUMENTS, TESTIMONY, OR OTHER EVIDENCE OF NO SIGNIFICANT ADVERSE ECONOMIC IMPACT ON BUSINESS.

(Government Code Section 11346.2(b)(4) requires the facts, evidence, documents, testimony, or other evidence on which the agency relies to support an initial determination that the action will not have a significant adverse economic impact on business.)

None.

DUPLICATION OR CONFLICTS WITH FEDERAL REGULATIONS

(Government Code Section 11346.2(b)(5) requires a department, board, or commission within the Environmental Protection Agency, the Resources Agency, or the Office of the State Fire Marshal to describe its efforts, in connection with a proposed rulemaking action, to avoid unnecessary duplication or conflicts with federal regulations contained in the Code of Federal Regulations addressing the same issues. These agencies may adopt regulations different from these federal regulations upon a finding of one or more of the following justifications: (A) The differing state regulations are authorized by law and/or (B) The cost of differing state regulations is justified by the benefit to human health, public safety, public welfare, or the environment. It is not the intent of this paragraph to require the agency to artificially construct alternatives or to justify why it has not identified alternatives.)

These regulations neither duplicate nor conflict with federal regulations.