



---

GREEN BUILDING INFORMATIONAL HANDOUT

## 2016 CALGREEN + TIER 1 CHECKLIST for NEW RESIDENTIAL & MAJOR REMODELS

**Scope:** Applies to new homes, replacement homes and major remodels of low-rise dwellings (3 stories or less). Major remodel includes those redevelopment projects with structural modifications or additions made to a dwelling that are greater than 50% of either: (1) the current square footage of such dwelling; or (2) the current exterior roof structure and exterior walls of such dwelling.

All other residential additions and alterations should use the Residential Alteration CALGreen checklist. Detached "U" occupancy buildings are not subject to CALGreen.

**NOTE:** The City of Mill Valley has adopted the Tier 1 provisions of CALGreen as mandatory requirements which must be implemented in the project, including the Tier 1 Energy Efficiency measures provided in Section A4.2. See Mill Valley Municipal Code for additional requirements.

### **Instructions:**

1. The Owner or the Owner's agent may employ a certified Green Building Rater to perform CALGreen services and to verify and assure the Owner and the Building Department that all required work described herein is properly planned and constructed in the project.
2. The Green Building Rater must verify their certification through a green building organization such as Build It Green, LEED, or Cal Green, and provide documentation such as a certificate or license number.

#### *Incorporation into Design:*

3. The certified Green Building Rater, in collaboration with the owner and the design professional shall review and incorporate all applicable provisions of **Columns 1 and 2** of this checklist into the project, sign and date the signature page under **Design Verification** at the end of this checklist
4. Include this checklist on the approved set of plans for the project. The Green Building Rater must indicate in **Column 2** of the checklist all applicable measures which must be met and incorporated into the project.

#### *Verification Prior to Final Construction:*

5. Review and revise checklists, as needed during construction. Prior to final inspection by the Building Department, certified Green Building Rater shall complete **Column 3** and sign and date signature page under **Final Construction Verification** at the end of this checklist.

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>	
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>	
<p align="center"><b>A4.1</b> <b>PLANNING AND DESIGN</b></p>		<p align="center"><i>All checked items are required</i></p>	<p align="center"><i>Select at least two (2)</i></p>	<p align="center"><i>Select all measures verified as constructed</i></p>
<p><b>Site Selection</b></p>			<p align="center">Section A4.1</p>	
<p><b>A4.103.1</b> A site which complies with at least one of the following characteristics is selected:            1. An infill site is selected.            2. A greyfield site is selected.            3. An EPA-recognized Brownfield site is selected.</p>		<p align="center"> <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/> </p>	<p align="center"> <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/> </p>	
<p><b>A4.103.2</b> Facilitate community connectivity by one of the following methods:            1. Locate project within a 1/4-mile true walking distance of at least 4 basic services;            2. Locate project within 1/2-mile true walking distance of at least 7 basic services;            3. Other methods increasing access to additional resources.</p>		<p align="center"> <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/> </p>	<p align="center"> <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/> </p>	
<p><b>Site Preservation</b></p>			<p align="center">Section A4.1</p>	
<p><b>A4.104.1</b> An individual with oversight responsibility for the project has participated in an educational program promoting environmentally friendly design or development and has provided training or instruction to appropriate entities.</p>		<p align="center"> <input type="checkbox"/> </p>	<p align="center"> <input type="checkbox"/> </p>	
<p><b>Deconstruction and Reuse of Existing Materials</b></p>			<p align="center">Section A4.1</p>	
<p><b>A4.105.2</b> Existing buildings are disassembled for reuse or recycling of building materials. The proposed structure utilizes at least one of the following materials which can be easily reused:  <input type="checkbox"/>1. Light fixtures  <input type="checkbox"/>2. Plumbing fixtures  <input type="checkbox"/>3. Doors and trim  <input type="checkbox"/>4. Masonry  <input type="checkbox"/>5. Electrical devices  <input type="checkbox"/>6. Appliances  <input type="checkbox"/>7. Foundations or portions of foundations</p>		<p align="center"> <input type="checkbox"/> </p>	<p align="center"> <input type="checkbox"/>            Verify at least one if required  <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/>  <input type="checkbox"/> </p>	

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>Site Development</b></p>		<p align="center">Section A4.1</p>	
<p><b>4.106.2</b> A plan is developed and implemented to manage storm water drainage during construction.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.106.3</b> Construction plans shall indicate how site grading or a drainage system will manage all surface water flows to keep water from entering buildings.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.106.2.1</b> Soil analysis is performed by a licensed design professional and the findings utilized in the structural design of the building.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.106.2.2</b> Soil disturbance and erosion are minimized by at least one of the following:</p> <ol style="list-style-type: none"> <li>1. Natural drainage patterns are evaluated and erosion controls are implemented to minimize erosion during construction and after occupancy.</li> <li>2. Site access is accomplished by minimizing the amount of cut and fill needed to install access roads and driveways.</li> <li>3. Underground construction activities are coordinated to utilize the same trench, minimize the amount of time the disturbed soil is exposed and the soil is replaced using accepted compaction methods.</li> </ol>		<p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p>
<p><b>A4.106.2.3</b> Displaced topsoil is stockpiled for reuse and covered and protected from erosion. (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.106.3</b> Post construction landscape designs accomplish one or more of the following:</p> <ol style="list-style-type: none"> <li>1. Areas disrupted during construction are restored to be consistent with native vegetation species and patterns.</li> <li>2. Utilize at least 75 percent native Californian or drought tolerant plant and tree species appropriate for the climate zone region.</li> </ol>		<p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p> <p align="center"><input type="checkbox"/></p>
<p><b>A4.106.4</b> Permeable paving is utilized for not less than 20 percent of the total parking, walking, or patio surfaces.(Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.106.5</b> Roofing materials for high rise residential buildings, hotels and motels shall have a minimum 3-year aged solar reflectance and thermal emittance or a minimum aged Solar Reflectance Index (SRI) equal to or greater than the values specified in Tables A4.106.5.1(3). (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.106.6</b> Install a vegetated roof for at least 50 percent of the roof area. Vegetated roofs shall comply with requirements for roof gardens and landscaped roofs in the California Building Code, Chapters 15 and 16.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p align="center"><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p align="center"><b>Tier 1 Elective Measures</b></p>	<p align="center"><b>Verification of Construction</b></p>
<p><b>A4.106.7</b> Reduce nonroof heat islands for 50 percent of sidewalks, patios, driveways or other paved areas by using one or more of the methods listed.</p>		<input type="checkbox"/>	<input type="checkbox"/>
<p><b>A4.106.8.1</b> For one- and two-family dwellings and townhouses with attached private garages, install a dedicated 208/240-volt branch circuit, including an overcurrent protective device rated at 40 amperes minimum per dwelling unit for future EV charging. (Tier 1)</p>	<input checked="" type="checkbox"/>		<input type="checkbox"/>
<p><b>A4.106.8.2</b> For multi-family dwellings, provide capability for future electrical vehicle charging in 5 percent of total parking spaces, as specified. (Tier 1)</p>	<input checked="" type="checkbox"/>		<input type="checkbox"/>
<p><b>A4.106.9</b> Provide bicycle parking facilities as noted below. Number of bicycle parking spaces may be reduced, as approved by the enforcing agency, due to building site characteristics, including but not limited to, isolation from other development.</p> <ol style="list-style-type: none"> <li>1. Provide short-term bicycle parking, per Section A4.106.9.1.</li> <li>2. Provide long-term bicycle parking for multifamily buildings, per Section A4.106.9.2.</li> <li>3. Provide long-term bicycle parking for hotel and motel buildings, per Section A4.106.9.3.</li> </ol>		<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>	<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>
<p><b>A4.106.10 [HR]</b> Outdoor lighting systems shall be designed and installed to comply with:</p> <ol style="list-style-type: none"> <li>1. The minimum requirements in the California Energy Code for Lighting Zones 1-4; and</li> <li>2. Backlight, Up light and Glare (BUG) ratings as defined in IES TM-15-11; and</li> <li>3. Allowable BUG ratings not exceeding those shown in Table A4.106.10; or</li> </ol> <p>Comply with a lawfully enacted local ordinance, whichever is lawfully enacted local ordinance, whichever is more stringent.</p>		<div style="display: flex; align-items: center; justify-content: center;"> <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/> </div> <p align="center">or</p> <div style="display: flex; align-items: center; justify-content: center;"> <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/> </div>	<div style="display: flex; align-items: center; justify-content: center;"> <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/> </div> <p align="center">or</p> <div style="display: flex; align-items: center; justify-content: center;"> <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/>   <span style="font-size: 2em; margin-right: 10px;">}</span> <input type="checkbox"/> </div>
<p><b>Innovative Concepts and Local Environmental Conditions</b></p>		<p>Section A4.1</p>	
<p><b>A4.108.1</b> Items in this section are necessary to address innovative concepts or local environmental conditions These items must be approved by the Building Department prior to listing here.</p>			
<p>Item 1:</p>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>Item 2:</p>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>A4.2</b> <b>ENERGY EFFICIENCY</b></p>			
<p><b>4.203.1</b> Single Family Residential and Second Units: 15% or greater reduction in its energy budget component compared to the standard Title 24 energy requirements.</p>	<p><input checked="" type="checkbox"/></p>	<p>N/A</p>	<p><input type="checkbox"/></p>
<p>Multi-Family Residential Units: 10% or greater reduction in its energy budget component compared to the standards Title 24 energy requirements.</p>		<p>N/A</p>	
<p><b>A4.3</b> <b>WATER EFFICIENCY AND CONSERVATION</b></p>			
<p><b>Indoor Water Use</b></p>		<p>Section A4.3</p>	
<p><b>4.303.1</b> Plumbing fixtures (water closets and urinals) and fittings (faucets and showerheads) installed in residential buildings shall comply with the prescriptive requirements of Sections 4.303.1.1 through 4.303.1.4.4.</p>	<p><input checked="" type="checkbox"/></p>		<p><input type="checkbox"/></p>
<p><b>4.303.2</b> Plumbing fixtures and fittings required in Section 4.303.1 shall be installed in accordance with the California Plumbing Code, and shall meet the applicable referenced standards.</p>	<p><input checked="" type="checkbox"/></p>		<p><input type="checkbox"/></p>
<p><b>A4.303.1</b> Kitchen sink faucet shall have a maximum flow rate not greater than 1.5 gallons per minute at 60 psi. (Tier 1) <i>(See exceptions)</i></p>		<p><input type="checkbox"/></p>	<p><input type="checkbox"/></p>
<p><b>A4.303.2</b> Alternate water source for nonpotable applications. Alternate nonpotable water sources are used for indoor potable water reduction. Alternate nonpotable water sources shall be installed in accordance with the <i>California Plumbing Code</i>. (Tier 1)</p>		<p><input type="checkbox"/></p>	<p><input type="checkbox"/></p>
<p><b>A4.303.3</b> Install at least one qualified ENERGY STAR dishwasher and clothes washer.</p>		<p><input type="checkbox"/></p>	<p><input type="checkbox"/></p>
<p><b>A4.303.4</b> Nonwater supplied urinals or waterless toilets are installed.</p>		<p><input type="checkbox"/></p>	<p><input type="checkbox"/></p>
<p><b>A4.303.5 Hot water recirculation systems.</b> One- and two-family dwellings shall be equipped with a demand hot water recirculation system, as defined in Chapter 2. The demand hot water recirculation system shall be installed in accordance with the California Plumbing Code, California Energy Code, and the manufacturer's installation instructions.</p>		<p><input type="checkbox"/></p>	<p><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>Outdoor Water Use</b></p>		<p align="center">Section A4.3</p>	
<p><b>4.304.1</b> New residential developments with an aggregate landscape area equal to or greater than 500 square feet shall comply with one of the following options:</p> <ol style="list-style-type: none"> <li>1. A local water efficient landscape ordinance or the current California Department of Water Resources' Model Water Efficient Landscape Ordinance (MWEL0), whichever is more stringent; or</li> <li>2. Projects with aggregate landscape areas less than 2,500 square feet may comply with the MWEL0's Appendix D Prescriptive Compliance Option.</li> </ol>	<p align="center"><input checked="" type="checkbox"/></p>	<p align="center"><input type="checkbox"/>  <input type="checkbox"/></p>	<p align="center"><input type="checkbox"/>  <input type="checkbox"/></p>
<p><b>A4.304.1 Rainwater catchment systems.</b> An approved rainwater catchment system is designed and installed to use rainwater generated by at least 65 percent of the available roof area. Rainwater catchment systems shall be designed and installed in accordance with the California Plumbing Code.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.304.2 Potable water elimination.</b> When landscaping is provided and as allowed by local ordinance, a water efficient landscape irrigation design that eliminates the use of potable water beyond the initial requirements for plant installation and establishment should be provided. Methods used to accomplish the requirements of this section must be designed to the requirements of the California Building Standards Code and shall include, but not be limited to, the following:</p> <ol style="list-style-type: none"> <li>1. Use of captured rainwater.</li> <li>2. Use of recycled water.</li> <li>3. Water treated for irrigation purposes and conveyed by a water district or public entity.</li> <li>4. Use of graywater.</li> </ol>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.304.3</b> For new water service connections, landscaped irrigated areas less than 5,000 square feet shall be provided with separate submeters or metering devices for outdoor potable water use.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>Water Reuse Systems</b></p>		<p align="center">Section A4.3</p>	
<p><b>A4.305.1</b> Piping is installed to permit future use of a graywater irrigation system served by the clothes washer or other fixtures.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.305.2</b> Recycled water piping is installed.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.305.3</b> Recycled water is used for landscape irrigation.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>Innovative Concepts and Local Environmental Conditions</b></p>		<p>Section A4.3</p>	
<p><b>A4.306.1</b> Items in this section are necessary to address innovative concepts or local environmental conditions. These items must be approved by the Building Department prior to listing here.</p>			
<p>Item 1:</p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p>Item 2:</p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.4</b> <b>MATERIAL CONSERVATION AND RESOURCE EFFICIENCY</b></p>			
	<p align="center"><i>All checked items are required</i></p>	<p align="center"><i>Select at least two (2) elective measures from A4.4</i></p>	<p align="center"><i>Select all measures verified in the completed project</i></p>
<p><b>Foundation Systems</b></p>		<p>Section A4.4</p>	
<p><b>A4.403.1</b> A Frost-Protected Shallow Foundation (FPSF) is designed and constructed.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.403.2</b> Cement use in foundation mix design is reduced by not less than a 20 percent. (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Efficient Framing Techniques</b></p>		<p>Section A4.4</p>	
<p><b>A4.404.1</b> Beams and headers and trimmers are the minimum size to adequately support the load.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.404.2</b> Building dimensions and layouts are designed to minimize waste.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.404.3</b> Use pre-manufactured building systems to eliminate solid sawn lumber whenever possible.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.404.4</b> Material lists are included in the plans which specify material quantity and provide direction for on-site cuts.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>Material Sources</b></p>		<p>Section A4.4</p>	
<p><b>A4.405.1</b> <u>One</u> or more of the following building materials, that do not require additional resources for finishing are used:</p> <p><input type="checkbox"/> Exterior trim not requiring paint or stain.</p> <p><input type="checkbox"/> Windows not requiring paint or stain.</p> <p><input type="checkbox"/> Siding or exterior wall coverings which do not require paint or stain.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>A4.405.2</b> Floors that do not require additional coverings are used including but not limited to stained, natural, or stamped concrete floors.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.405.3</b> Postconsumer or preconsumer recycled content value (RCV) materials are used for a minimum of 10 percent of the total value, based on the total estimated cost of materials on the project. (Tier 1) <i>[See CalRecycle for recycled content levels for some materials <a href="http://www.calrecycle.ca.gov/greenbuilding/materials/matrix.htm">http://www.calrecycle.ca.gov/greenbuilding/materials/matrix.htm</a> ]</i></p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.405.4</b> Renewable source building products are used.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>Enhanced Durability and Reduced Maintenance</b></p>		<p align="center">Section A4.4</p>	
<p><b>4.406.1</b> Annular spaces around pipes, electric cables, conduits, or other openings in plates at exterior walls shall be protected against the passage of rodents by closing such openings with cement mortar, concrete masonry or similar method acceptable to the enforcing agency.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Water Resistance and Moisture Management</b></p>		<p align="center">Section A4.4</p>	
<p><b>A4.407.1</b> Install foundation and landscape drains.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.407.2</b> Install gutter and downspout systems to route water at least 5 feet away from the foundation or connect to landscape drains which discharge to a dry well, sump, bioswale, rainwater capture system or other approved on-site location.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.407.3</b> Provide flashing details on the building plans and comply with accepted industry standards or manufacturer's instructions.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.407.4</b> Protect building materials delivered to the construction site from rain and other sources of moisture.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.407.6</b> Exterior doors to the dwelling are protected to prevent water intrusion.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.407.7</b> A permanent overhang or awning at least 2 feet in depth is provided.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>Construction Waste Reduction, Disposal and Recycling</b></p>			
<p><b>A4.408.1</b> Construction waste generated at the site is diverted to recycle or salvage in compliance with at least a 65 percent reduction. Any mixed recyclables that are sent to mixed-waste recycling facilities shall include a qualified third party verified facility average diversion rate. Verification of diversion rates shall meet minimum certification eligibility guidelines, acceptable to the local enforcing agency. (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>



<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>Building Maintenance and Operation</b></p>			
<p><b>4.410.1</b> An operation and maintenance manual shall be provided to the building occupant or owner.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.410.2</b> Where 5 or more multifamily dwelling units are constructed on a building site, provide readily accessible areas that serve all buildings on the site and is identified for the depositing, storage and collection of non-hazardous materials for recycling, including (at a minimum) paper, corrugated cardboard, glass, plastics, organic waste, and metals.</p>	<p align="center"><input checked="" type="checkbox"/></p>		
<p><b>Innovative Concepts and Local Environmental Conditions</b></p>		<p align="center">Section A4.4</p>	
<p><b>A4.411.1</b> Items in this section are necessary to address innovative concepts or local environmental conditions.</p>			
<p>Item 1:</p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p>Item 2:</p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p align="center"><b>A4.5</b> <b>ENVIRONMENTAL QUALITY</b></p>	<p align="center"><i>All checked items are required</i></p>	<p align="center"><i>Select at least one (1)</i></p>	<p align="center"><i>Select all measures verified as constructed</i></p>
<p><b>Fireplaces</b></p>		<p align="center">Section A4.5</p>	
<p><b>4.503.1</b> Install only a direct-vent sealed-combustion gas or sealed wood-burning fireplace, or a sealed woodstove meeting the requirements of Mill Valley Municipal Code 14.40 (Wood Burning Appliances).</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Pollutant Control</b></p>		<p align="center">Section A4.5</p>	
<p><b>4.504.1</b> Duct openings and other related air distribution component openings shall be covered during construction.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.504.2.1</b> Adhesives, sealants and caulks shall be compliant with VOC and other toxic compound limits.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.504.2.2</b> Paints, stains and other coatings shall be compliant with VOC limits.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.504.2.3</b> Aerosol paints and other coatings shall be compliant with product weighted MIR Limits for ROC and other toxic compounds.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.504.2.4</b> Documentation shall be provided to verify that compliant VOC limit finish materials have been used.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>4.504.3</b> Carpet and carpet systems shall be compliant with VOC limits.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.504.4</b> (NOT USED) See A4.504.2 below.</p>			
<p><b>4.504.5</b> Particleboard, medium density fiberboard (MDF), and hardwood plywood used in interior finish systems shall comply with low formaldehyde emission standards.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.504.1</b> Use composite wood products made with either California Air Resources Board approved no-added formaldehyde (NAF) resins or ultra-low emitting formaldehyde (ULEF) resins.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.504.2</b> Ninety (90) percent of floor area receiving resilient flooring shall comply with the VOC-emission limits established in section A4.504.2. (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.504.3</b> Install thermal insulation in compliance with the VOC-emission limits established in section A4.504.3. (Tier 1)</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Interior Moisture Control</b></p>		<p align="center">Section A4.5</p>	
<p><b>4.505.2</b> Vapor retarder and capillary break is installed at slab on grade foundations.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>4.505.3</b> Moisture content of building materials used in wall and floor framing is checked before enclosure.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Indoor Air Quality and Exhaust</b></p>		<p align="center">Section A4.5</p>	
<p><b>4.506.1</b> Each bathroom (with tub or shower) must be mechanically ventilated with a humidity controlled Energy Star compliant exhaust fan which terminates outside of the building unless otherwise a component of a whole house ventilation system.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>A4.506.1</b> Return air filters with a value greater than MERV 6 shall be installed on HVAC systems. Pressure drop across the filter shall not exceed 0.1 inches water column.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.506.2 [HR]</b> Provide filters on return air openings rated MERV 6 or higher during construction when it is necessary to use HVAC equipment.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p><b>A4.506.3</b> Direct vent appliances are used unless the equipment is isolated from the conditioned space in a mechanical room.</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>

<p align="center"><b>Column 1</b> <b>Feature or Measure</b></p>	<p align="center"><b>Column 2</b> <b>Design Requirements</b> <i>When checked, these items become a part of the approved plans and must be installed or incorporated into the project.</i></p>		<p align="center"><b>Column 3</b> <b>Construction Verification</b> <i>Complete prior to final inspection</i></p>
<p><i>See Chapter 4 and Appendix A4 of the 2016 California Green Building Code for complete descriptions of features and measures listed here. Checklist may be submitted by certified Green Building Rater only.</i></p>	<p><b>Mandatory &amp; Tier 1 Prerequisites</b></p>	<p><b>Tier 1 Elective Measures</b></p>	<p><b>Verification of Construction</b></p>
<p><b>Environmental Comfort</b></p>		<p>Section A4.5</p>	
<p><b>4.507.2.</b> Duct systems are sized and designed and equipment is selected using the following methods:</p> <ol style="list-style-type: none"> <li>1. Establish heat loss and heat gain values according to ANSI/ACCA 2 Manual J-2011 or equivalent.</li> <li>2. Size duct systems according to ANSI/ACCA 1 Manual D - 2014 or equivalent.</li> <li>3. Select heating and cooling equipment according to ANSI/ACCA 3 Manual S-2014 or equivalent.</li> </ol>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Innovative Concepts and Local Environmental Conditions</b></p>		<p>Section A4.5</p>	
<p><b>A4.509.1</b> Items in this section are necessary to address innovative concepts or local environmental conditions.</p>			
<p>Item 1:</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p>Item 2:</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p>Item 3:</p>		<p align="center"><input type="checkbox"/></p>	<p align="center"><input type="checkbox"/></p>
<p align="center"><b>INSTALLER AND CALGreen SPECIAL INSPECTOR QUALIFICATIONS</b></p>			<p align="center"><i>Select all measures verified as constructed</i></p>
<p><b>Qualifications</b></p>		<p>Section A4.7</p>	
<p><b>702.1</b> HVAC system installers are trained and certified in the proper installation of HVAC systems.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>702.2</b> The CALGreen Special Inspector for this project is qualified and able to demonstrate competence in the discipline they inspect and verify.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>
<p><b>Verifications</b></p>		<p>Section A4.7</p>	
<p><b>703.1</b> Verification of compliance with CALGreen +Tier 1 may include construction documents, plans, specifications builder or installer certification, inspection reports, or other methods acceptable to the enforcing agency which show substantial conformance. Implementation verification shall be submitted to the Building Department after implementation of all required measures and prior to final inspection approval.</p>	<p align="center"><input checked="" type="checkbox"/></p>		<p align="center"><input type="checkbox"/></p>

## Green Building Signature Page

City of Mill Valley Requirements - Based on the Appendix A4 2016 CAL Green Building Code (CALGreen) + Tier 1

Project Address & Permit Number: \_\_\_\_\_

Green Building Rater (First & Last Name): \_\_\_\_\_

Green Building Rater Certification  
(Attach Documentation): \_\_\_\_\_

### Section 1 - Design Verification

Complete Section 1 below and submit the checklist (**Columns 1 and 2**) with the plans at building permit application.

The owner, design professional and the certified Green Building Rater inspector (**all signatures required**) have reviewed the plans and certify that the items checked above are hereby incorporated into the project plans and will be implemented into the project in accordance with the requirements set forth in the 2016 California Green Building Standards Code as amended by Chapter 14 of the Mill Valley Municipal Code.

Owner's Signature \_\_\_\_\_ Date \_\_\_\_\_

Owner Name (*Please Print*) \_\_\_\_\_

Design Professional's Signature \_\_\_\_\_ Date \_\_\_\_\_

Design Professional's Name (*Please Print*) \_\_\_\_\_

Signature of Certified Green Building Rater for the Project \_\_\_\_\_ Date \_\_\_\_\_

Green Building Rater Name (*Please Print*) \_\_\_\_\_ Phone \_\_\_\_\_

Green Building Rater E-mail Address \_\_\_\_\_ Green Building Certification \_\_\_\_\_

All Signatures Required

### Section 2 - Final Construction Verification

Complete, sign and submit Section 2 below with the completed checklist, **including Column 3**, to the Building Department prior to Building Department final inspection.

I have inspected the work and have received sufficient documentation to verify and certify that the project above was constructed in accordance with this Green Building Checklist and in accordance with the requirements set forth in the 2016 California Green Building Standards Code as amended by Chapter 14 of the Mill Valley Municipal Code.

Signature of Certified Green Building Rater for the Project \_\_\_\_\_ Date \_\_\_\_\_

Green Building Rater Name (*Please Print*) \_\_\_\_\_ Phone (*if different than above*) \_\_\_\_\_

Green Building Rater E-mail Address (*if different than above*) \_\_\_\_\_ Green Building Certification & No. \_\_\_\_\_