

MARIN COUNTY GREEN BUILDING ORDINANCE UPDATE



California sets mandatory regulations for building activity under **Title 24**. Title 24 is updated triennially, with the next cycle starting **January 1, 2020**.

Part 11 of Title 24 (also known as **CALGreen**) contains green building requirements for residential and nonresidential construction.

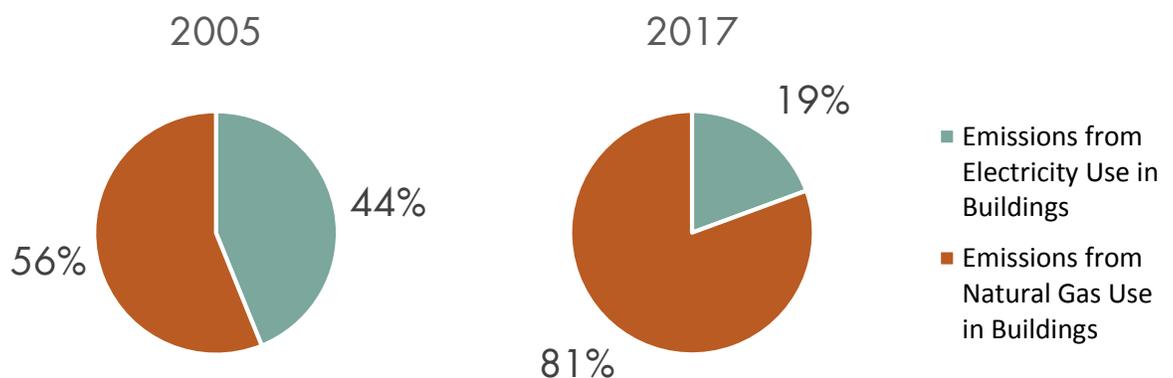
CALGreen includes a framework called **Tier 1** through which local governments in California can adopt **reach codes**. Reach codes are local green building standards that exceed state requirements.

Green Building Ordinance Update Objectives

- Update existing Marin County reach code to comply with statewide Title 24 changes coming in 2020
- Coordinate with other cities in Marin County to achieve more consistent standards (which supports success of the policy by reducing administrative burden on the building community)
- Make targeted updates to the County's 2018 Green Building Ordinance overhaul, based on lessons learned through implementation of these standards.

Climate Action Context for the Reach Code – Energy Efficiency and Electrification

- Energy use in buildings (from natural gas and electricity use) generates **about a third of greenhouse gas emissions** in Marin County.
- As electricity gets cleaner, and with long-term, statewide targets for 100% renewable electricity in California, a higher share of emissions from energy use in buildings comes from natural gas.
- In unincorporated Marin County, despite an overall decrease in natural gas usage, **natural gas emissions as a share of total building energy use emissions increased 25% from 2005 to 2017**



- In the 2018 Green Building Ordinance overhaul, the County of Marin addressed the growing portion of emissions from natural gas by introducing an **“electric-favored”** reach code, covered in more detail on the next page. This model is now under consideration by multiple jurisdictions across the Bay Area.

Climate Action Context for the Reach Code – Electric Vehicles

- CALGreen standards are aimed at increasing readiness for EVs. The multifamily and commercial standards outlined in Tier 1 do not require readiness sufficient for the higher adoption rates in Marin County.
- The revised requirements are detailed on the next page, outlining higher standards for certain projects and specific triggers for EV readiness in additions and alterations.

PROPOSED GREEN BUILDING ORDINANCE UPDATES

Adopt CALGreen Tier 1 with local enhancements. The standards apply to:

- All new buildings (residential and nonresidential, including tear down/rebuilds)
- Residential additions and alterations > 1,200 square feet*
- Commercial additions and alterations >3,000 square feet*

Electrification & Energy Efficiency – New Construction

Project Type	Natural Gas Appliances Allowed	Additional Efficiency Required
All-electric	None	None
Limited Mixed Fuel	Cooktops and fireplaces only	Some
Mixed Fuel	Any	Most

Note: The State requires local governments to submit a **cost effectiveness study demonstrating that additional costs for achieving energy efficiency requirements will pay the project occupant back over time in money saved on energy bills. Because remodel and addition projects vary greatly, there is not currently a cost effectiveness study for these project types.*

This “electric favored” framework encourages electrification by requiring additional energy, solar, and/or storage for homes that use natural gas. The “limited mixed fuel” path is a result of lessons learned from the implementation of the County’s current electric favored reach code, in which multiple applicants abandoned electric appliances entirely because they wanted to install a gas stove and/or fireplace. This path avoids new natural gas appliances in for the most intensive gas users (space and water heating) This codes is an opportunity for ongoing education about all-electric homes to the general public and building community. The County has rebates available through Electrify Marin to replace natural gas appliances from homes that are already built and are not subject to the ordinance.

Electric Vehicle Readiness – New Construction

Project Type	CALGreen Tier 1 Requirement	County of Marin Proposed Requirement
Single- and Two-Family Residential	Home is ready for a Level 2 charger to be plugged in, including service panel capacity, conduit, and wiring (“EV Ready”).	Same as CALGreen Tier 1 Requirement.
Multifamily Residential	15% of parking spaces are EV Ready.	One EV Ready space per dwelling unit, to provide equitable access to EV charging for every multifamily resident.
Nonresidential	Requirement scales based on the number of parking spaces, scales from zero required EV Ready spaces for parking lots with less than 10 spots, to 8% of total spaces being EV ready for parking lots of greater than 200 spots.	Two options for nonresidential projects: <ul style="list-style-type: none"> • Build 10% of spaces to be EV Ready and build the remaining spaces to be EV Capable (<i>current nonresidential policy</i>) OR <ul style="list-style-type: none"> • Build 20% of spaces to be EV Ready and install EV Chargers in 5% of spaces

Electric Vehicle Readiness – Alterations and Additions

Project Type	CALGreen Tier 1 Requirement	County of Marin Proposed Requirement
Single- and Two-Family Residential	None	Home is ready for a Level 2 charger to be plugged in, including service panel capacity, conduit, and wiring (“EV Ready”), <i>only when the electrical service panel is upgraded.</i>
Multifamily Residential & Nonresidential		<ul style="list-style-type: none"> • If the service panel is modified, add designated electrical capacity for 20% of onsite parking spaces to be EV Capable. • When parking lot surface is modified (paving material and curbing removed), add conduit <i>to all exposed parking spaces</i> and designate existing available service panel capacity for future EVs..