"California Green Building Trends" – Whitepaper Series by VCA GREEN, CALGreen Commissioners and CALGreen Compliance Consultants

First "Green" Building Code in the Nation

The California Building Official's Guide to Preparing for 2010 CALGreen Building Codes

By Charles "Russ" Russell, VCA GREEN

A state adopted green construction building code, the first in the nation, will go into effect in California on Jan. 1, 2011. For the past three months, I have been involved in introducing the 2010 CALGreen Code (CALGreen) to industry leaders by providing seminars in various cities throughout the state.

The audiences at these seminars have been varied, and have included building officials, planning directors, design professionals, developers, builders, and other industry individuals, all of whom are curious about the impact that the adoption of CALGreen will have on their city and profession.

Minimum Mandatory Measures

California's new green code is not based on a point system or some level of compliance established by a city; instead this new code is a typical code compliance method that sets minimum mandatory measures with which the applicant of each new building must comply. This new green code is applicable to new construction for both residential and non-residential occupancies. It does not apply to additions and remodels. CALGreen has been adopted by Building Standards Commission (BSC), Department of Housing and Community Development (HCD), Division of State Architects Office (DSA), and Office of Statewide Health Planning and Development (OSHPD); however, the State Fire Marshall has not adopted CAL-Green because there are no fire life safety issues within the new code.

Where Does a City Begin?

So where does a city and its building officials begin the process of adopting the new green building code? The journey begins with input being given by the city council, planning director, planning commission, the general plan, and the members of the community. Many cities hold community outreach



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events so city officials can develop a better sense of how community members wish their city to move forward towards a greener environment.

Some California cities have gone so far as to create the position of green manager, who is responsible for overseeing the advancement of green ideas and introduces them at staff meetings, where they can be vetted and incorporated into the appropriate policies and procedures.

CALGreen Has a Different Format

In comparison to other model codes, the CALGreen Code has a different format that requires building and planning departments to collaborate in the review of plans and develop a process of verification of code requirements. The CALGreen code also requires certification documents for the various elements within the new code. CALGreen provides guidance on what types of documents are acceptable, but leaves the decision as to what exactly is required to the local city government.

As a result, building officials up and down the state are busy reviewing the new codes to better understand the various components of the code and to assess what the process for enforcement will be. The planning department needs to review building site designs since requirements of the new code include site planning issues, such as bicycle and low emission vehicle parking and building location/orientation for photovoltaic systems.

Incorporated Into One Code

Additionally, storm water pollution prevention plans, grading and drainage plan review, and site lighting are addressed. These elements are typically reviewed by either the planning or engineering departments, but CALGreen now incorporates these various components into one code.

The building official should work side-by-side with the city attorney to create the language for the adoption of the various parts of the California Building Standard Code (Title 24). Generally speaking, the adoption of a building code is somewhat simple, however CALGreen has introduced some new language under the code adoption section.

CALGreen Adds "Environmental" Interpretation

In the past, the categories of climatic, topographic, and geological were the only categories



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where a code could be amended. Such amendments required the development of findings of fact which were filed with the state Building Standard Commission. Now, CALGreen has introduced the category of "environmental," which is interpreted to include the local environmental issues that are significant to the city. With this new category, findings of fact must still be developed, adopted by the local jurisdiction, and then filed at the state. With this new liberal means of introducing local CALGreen deliverable goals, a city can customize CALGreen to meet its future goals.

Based on the direction given to the building official, the adoption of the green building code will consist of evaluating the minimum mandatory measures and considering if they are applicable to the city. The new code may need some minor local amendments to make it more in alignment with the goals of the city. Additionally, the city needs to evaluate if the adoption of the Tiers process, a checklist of higher green measures in two advancing levels, is suitable to meet its long term green objectives.

Enforcement is a Consideration An issue that is currently being

evaluated is enforcement of the new code. How will it be handled and what department will inspect which portion of the code requirements? Who will verify that proper irrigation controls have been installed? Who evaluates the site lighting vs. the approved plan? Will public works visit the finished site to ensure that the site conforms to the approved grading and drainage plan? These questions and many more will need to be resolved by each city community development department for the enforcement of CALGreen.

Another question to be addressed is whether or not new fees are needed for the enforcement of the new code. When the California Energy Code was introduced, building departments assessed a fee of 10% of the permit fee for the review and field verification of the energy code requirements.

How Will Fees Be Handled?

This same process is being discussed in many cities that are preparing to adopt CALGreen. Some cities are not raising any fees for the new code and are trying to absorb the additional cost with existing fees, while others are proposing a fee of 25% of the permit fee to implement CALGreen. Each city will have to evaluate its local



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financial environment and assess the impact that a fee will have on the local home building economy.

Verifying Processes Will Need to be Created

Many of the new verifying processes described in the new code will have to be created by local government. Because of this structure, CALGreen has wide latitude in the code format. The code is intended to give the local city government the ability to go beyond the code mandated minimum standards, by permitting the city to be more aggressive with local CALGreen agendas.

Local governments will need to create some type of outreach program that will focus on developers and owners. The project approval process begins with an application submitted to the planning. From the original planning department submittal to approval may take 3, 6, or 12 months before the plan can be submitted to the building department for plan review. With

this time-line, the new project application will be required to comply with the CALGreen requirements that go into effect January 1, 2011.

Are You Ready?

Is your city ready to assist developers, architects, contractors, and homeowners in meeting the measures going to be adopted by your local jurisdiction? Are your local developers aware of the pending CALGreen code adoption and the pending mandatory measures? The sooner these questions are addressed, the better prepared you will be for CALGreen.

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