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<td><strong>Docket Number:</strong> 19-BSTD-03</td>
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<td><strong>Project Title:</strong> 2022 Energy Code Pre-Rulemaking</td>
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BayREN Comments on December 8 Workshop Proposals

Additional submitted attachment is included below.
December 18, 2020

California Energy Commission
Dockets Office MS-4
1516 Ninth Street
Sacramento, CA 95814-5512
Submitted via Docket No. 19-BSTD-03, 2022 Energy Code Pre-Rulemaking

Re: Comments on December 8 Workshop Proposals for 2022 Energy Code Update

Dear Commissioners and Staff,

The San Francisco Bay Area Regional Energy Network (BayREN) Codes and Standards Program is pleased to submit these comments and recommendations as part of the pre-rulemaking process for the 2022 Building Energy Efficiency Standards. BayREN is a collaboration of the Association of Bay Area Governments (ABAG) and the nine Bay Area counties, and BayREN’s Codes and Standards Program works to save energy by improving compliance with the Title 24 Parts 6 and 11, and by supporting and encouraging local energy policies such as reach codes. We work closely with local government staff from building departments and sustainability offices in particular. Our specific comments are as follows.

More can be done to ensure that the baselines in the 2022 Energy Code support local reach code efforts, and statewide climate goals.

Over a third of local jurisdictions in the San Francisco Bay Area have adopted reach codes that either require or encourage efficient all-electric construction, and more jurisdictions within our territory are considering similar reach codes. These efforts are informed by and support state climate goals. The momentum for this type of local reach code adoption and implementation will likely continue into the 2022 Energy Code cycle.

With the 2022 Energy Code update, the Energy Commission has the opportunity to support these efforts by ensuring that all-electric buildings have a straightforward pathway to compliance by providing an electric baseline for all building types, either as the primary baseline or together with a dual-fuel baseline. For example, providing an electric space heating baseline for buildings that often use central gas boiler systems, such as medium and large office buildings, would be beneficial. Several studies have examined different types of electric heating systems and found that they may be reasonable in terms of efficiency and cost.\(^1\)\(^2\)\(^3\) We suggest

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3 Raftery P. et al., “Quantifying energy losses in hot water reheat systems,” Energy and Buildings, 179, https://escholarship.org/uc/item/3qs8f8qx
CEC staff consider how the findings from these studies can be used to develop an electric baseline for these types of buildings.

**Including electrification-ready requirements for at least space and water heating for all building types in the 2022 Energy Code makes sense.**

There are different regulatory proceedings at the CEC and the California Public Utilities Commission (CPUC) that are focusing on transitioning away from natural gas, in furtherance of state climate goals.\(^4\) BayREN is an active participant in these proceedings. Feedback from local jurisdictions about the difficulties of addressing energy use and GHG emissions from existing buildings, however, provides the “boots on the ground” perspective, and should be considered. Once a building is constructed, it will be part of the built environment for decades, and changes to its structure and systems will usually be difficult and costly.

The CEC is in a position to help building owners and local governments by requiring that buildings built under the 2022 Energy Code be designed and constructed to accommodate foreseeable changes to California’s energy system by being electrification-ready. This is particularly important for space and water heating, which comprise the bulk of the energy load for most buildings. Model local reach code ordinances have been developed that include electric-ready requirements\(^5\); similar language could readily be used as part of the 2022 Code.

**Conclusion**

Thank you for the opportunity to provide this input, and for your careful consideration of these comments. We look forward to continuing to be involved in these important issues.

Respectfully Submitted,

Karen Kristiansson
BayREN Codes & Standards Program Manager

Cc: Judy Roberson, CEC-BayREN Liaison

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\(^4\) E.g. CPUC R. 20-01-007 and R.19-01-011; and CEC Docket 19-DECARB-01

\(^5\) [https://localenergycodes.com/content/reach-codes/electric-ready/](https://localenergycodes.com/content/reach-codes/electric-ready/)