

California Building Standards Commission
2525 Natomas Park Drive, Suite 130
Sacramento, CA 95833

RE: Code amendments requiring higher standards for weather-exposed balconies and similar elements

Dear Chair Batjer and Members of the Commission:

At its regular meeting of July 14, 2015, the Berkeley City Council voted to send the following letter:

The City of Berkeley is still in shock and filled with immense grief over the horrific balcony collapse at 2020 Kittredge on June 16, 2015, which claimed the lives of six people and injured seven more. As we try to recover from this tragedy, we must look into ways of preventing such events from ever happening again.

Observations from City staff who examined the structure after the tragedy and from other experts indicate that degradation of the wood framing from exposure to moisture played a part in the collapse of the balcony. Yet review of the inspection records and the approved construction documents give every indication that the balcony was constructed in conformance to both the approved plans and the applicable 1998 Codes in effect at the time of the permit application. Our research into the currently adopted building standards indicates that the regulations applicable to projecting building elements have changed little since then. As a result, balconies matching this failed design can be legally constructed to this day. These indications show that the current building standards, in this specific regard, are not providing an effective safeguard to public health, safety and general welfare.

With most of California's housing growth taking place in urban areas, there will be an increasing number of apartment buildings constructed, many of which will inevitably incorporate weather exposed balconies, decks, stairs or similar elements. With every installation of these elements under the current code standards, which rely on the membrane protection of the cantilevered framing to maintain its integrity for the lifespan of a building, there is a risk that another catastrophic failure could occur.

The Berkeley City Council is of the opinion that measures should be taken to introduce more restrictive building standards as they apply to weather exposed balconies, decks, stairs or similar elements projecting from a structure often without any additional independent supports. While at this time there is no conclusive evidence showing how the moisture was introduced into the balcony assembly, there are several exacerbating factors that can be identified immediately: (1) the use of construction materials that were not resistant to decay; (2) the lack of ventilation of the enclosed cavity; (3) the inability to visually inspect the balcony's structural elements without destructive investigation. The decay of weather exposed elements is an inevitable process that must be addressed by routine maintenance and appropriate preventative measures. Providing regulations to

address the three factors indicated above, OR alternatively requiring these elements to be constructed of corrosion resistant steel, would provide building owners with more resilient structures and allow for corrective action to be taken long before a tragedy strikes. Furthermore, unlike wood, corrosion resistant steel is less likely to deteriorate over time, is better at withstanding the elements, and is a stronger material.

The need for the California Building Standards Commission to take action in response to this tragedy is further intensified due to the following:

- 1) This single incident resulted in a significant loss of life;
- 2) The affected building is of recent construction (less than 10 years old) using modern design, construction materials and methods; an early failure due to structural decay would not be expected;
- 3) The collapse occurred without warning and apparently without any indications such as cracking of finish materials, opening of joints, sagging of the assembly, water staining, etc.;
- 4) Type VA (former V One-Hour) is the most common construction type in this region for multi-story residential buildings;
- 5) Cantilevered balconies without additional independent supports are a popular construction feature on multi-story residential buildings throughout the region;
- 6) The failed balcony assembly was completely enclosed, which is very common in this region, and therefore not accessible for a visual inspection.

We strongly urge the California Building Standards Commission to amend the California Building Standards Code such that balconies, decks, stairs and similar elements, which project from a structure often without any additional independent supports, be constructed to higher standards in order to protect the public health, safety and general welfare of the people of the State of California.

Thank you for considering this request.

Sincerely,

The Berkeley City Council

C.C. Jim McGowan, Executive Director, Building Standards Commission
State Senator Loni Hancock
Assembly member Tony Thurmond