



## Safety Culture and Safety Climate in Construction: A Review of Current Literature

### Understanding Safety Culture and Safety Climate in Construction: Existing Evidence and a Path Forward, Literature Review Summary for Safety Culture/Climate Workshop

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#### Overview

The terms “safety culture” and “safety climate” are used with increasing frequency by construction industry practitioners and researchers in academia even though there is currently no definitional agreement on job sites or in literature. The terms evolved from the broader concepts of “organizational culture” and “organizational climate” that became part of the business vocabulary in the 1980s due in part to a number of industrial catastrophes. Researchers conducted a literature review on the state of safety culture and safety climate in general industry and more specifically the construction industry. They prepared a summary of their findings and provided it to 70 industry practitioners, safety and health professionals, academics and government officials attendees at an invitation-only, two-day workshop on construction-related safety culture and safety climate in Washington, D.C., June 2013, co-hosted by CPWR – The Center for Construction Research and Training. The document provided insight into current definitions and measurement methods, use of behavior-based safety and other construction-specific interventions.

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#### See full report:

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#### Key Findings

- The two terms are distinct but are related. Safety “culture” reflects the organization’s core values and assumptions about safety (espoused, a fixed state, qualitative), while safety “climate” refers to the shared perceptions about safety among a homogeneous group on site at a given point in time (enacted, variable, quantitative).
- Time and cost often dictate what can be feasibly measured. Workplace surveys are more frequently used to measure safety climate rather than conducting in-depth interviews, observation, or other ethnographic methods to measure safety culture.
- Safety climate survey data can provide insight into the underlying safety culture, particularly when results show different perceptions about site safety among various groups. Research suggests some safety climate measures can predict safety outcomes.
- Typical leading indicators (or factors) of safety climate that can be measured include *supervisory leadership, safety aligned with production, management commitment, employee empowerment and involvement, accountability, communication, training, owner/client involvement*.
- Construction organizations of all sizes can improve factors that strengthen safety climate and culture, although small contractors with fewer resources may need different paths. Innovative efforts such as green building practices, prevention through design, and safety prequalification programs may leverage gains.
- Trade cultures are strong, developed over time, and need to be engaged in safety culture change efforts.



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