

ACI Code Change Proposal for Tolerances in IBC 2018

You might be aware that ACI has introduced a new code change proposal that would add a reference to ACI 117 *Specification for Tolerances for Concrete Construction and Materials* and ITG-7 *Specification for Tolerances for Precast Concrete* in the International Code Council (ICC) *International Building Code* (IBC). This is a new concept being introduced into the building code, and is intended to provide a default where tolerances are not specified in the construction documents.

ACI's code change proposal is prompted by its revised statement "... American Concrete Institute (ACI) is a leading authority and resource worldwide for the development, dissemination, and adoption of its consensus-based standards, technical resources, educational & training programs, certification programs, and proven expertise for individuals..."

Although we support adoption of ACI committee documents, we do not believe ACI 117 or ITG-7 should be adopted into the 2018 International Building Code. We do not support this proposal because (1) the tolerances in ACI 117 and ITG-7 do not directly correlate with life-safety issues, and (2) it would have the unintended consequence of putting reinforced concrete construction at a disadvantage as competing materials do not have specific construction tolerance requirements in the IBC.

ACI 132-14 "Guide for Responsibility of Concrete Construction" states the design professional has the responsibility of including the effect of tolerances within the contract documents to ensure tolerance compatibility.

- **Section 5.3—Coordination:** "A lead licensed design professional has a responsibility to coordinate its services, including the effect of tolerances on other work, with that of other subconsultant licensed design professionals."
- **Section 5.5—Contract documents:** "The licensed design professional is responsible for accommodating individual material, product, and element tolerances at their interface with concrete construction to ensure tolerance compatibility."

Requiring the inclusion of ACI 117 and ITG-7 does not guarantee that these tolerances are compatible with the design or with elements or products interfacing with concrete construction and could be detrimental to the project. If the contract documents do not specify tolerances, it is likely there are other major issues on the project.

In addition, making the Code regulate tolerances through the use of ACI 117 and ITG-7 effectively eliminates the Mandatory Requirements Checklist. The 2018 Technical Committee Manual states that "The mandatory requirements checklist identifies information that is required to be included in Contract Documents because there is no default requirement in the specification". A Code required use of ACI 117 and ITG-7 does not address the major issue of no default requirements.

We support ACI in wanting adoption of its standards and the concrete construction industry has adopted ACI 117 and ITG-7. We do not, however, support the ACI code change proposal to include tolerances in the 2018 IBC.

In addition to ASCC this position is supported by the Concrete Foundations Assn. (CFA), the Tilt-Up Concrete Assn. (TCA), the Concrete Reinforcing Steel Institute (CRSI) and the National Ready Mixed Concrete Assn. (NRMCA).