Experimentální centrum Fakulty stavební ČVUT v Praze
Experimental Centre, Faculty of Civil Engineering, CTU in Prague

si Vás dovoluje pozvat na / would like to invite you for

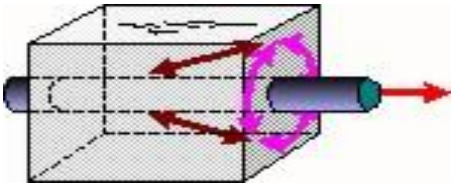
Seminář / Seminar

Seminář proběhne ve čtvrtek 9.6.2011 od 13:00 do 14:00, v místnosti B161 v budově Fakulta stavební, ČVUT v Praze,
Thákurova 7, Praha 6, 166 29

The seminar will be held on Thursday 9th of June 2011, from 13:00 to 14:00, in the room B161 at Faculty of Civil Engineering, CTU in Prague
Thákurova 7, Praha 6, 166 29

fib Model Code 2010 : Bond and anchorage of embedded reinforcement

dr. John J. Cairns
Senior Lecturer,
School of the Built Environment, Heriot-Watt University

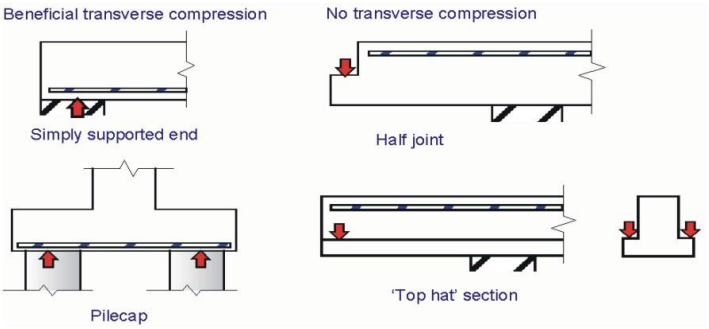


fib is currently updating its Model Code for Concrete Structures, and the first complete draft of the *fib* Model Code 2010 is now published in two volumes as *fib* Bulletins 55 and 56.

As part of this process, *fib* Task Group 4.5 'Bond Models' has undertaken this review of the content for bond of embedded steel reinforcement. A new model for strength of laps and anchorages in a splitting failure mode is proposed and a semi-empirical expression rigorously calibrated against extensive test databases for tension and compression laps and for straight and bent anchorages to provide a rationale and consistent treatment of laps and anchorages. Design rules for hooks and bends have been re-formulated and the scope of the Model Code extended to cover HSC, high strength reinforcement, epoxy coated bars and laps of bars in bundles. The scope of the sections addressing 'Special Circumstances' is extended and new content added on Conditions of Service and Degradation added. The representation of splitting behaviour in the local bond-slip model has also been improved.

The study has identified two areas in which the design rules of fib Model Code 1990 (and also EC2, which draws heavily on the Model Code) EC2 may be unsafe.

The seminar will describe the background to the rules proposed for MC2010 and their rationale, and demonstrate the impact of these revisions on detailing of laps and anchorages in reinforced concrete structures.



Dr John Cairns is a Senior Lecturer in Structural Engineering in the School of the Built Environment at Heriot-Watt University, Edinburgh, UK. He is a member of Commissions 4 and 5, and convenor of Task Group 4.5 "Bond Models" of fib (Federation Internationale du Beton).

Pro vice informací prosím kontaktuje / For more information please contact:

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