The Czech Technical University in Prague - University Center for Energy Efficient Buildings offers eight post-doctoral positions in the field of modeling, simulation, assessment and optimization of multi-functional materials and structures.

Start date: as soon as possible after 21 June 2013, until all positions are filled Contract duration: until 30 June 2015 (with a critical evaluation after the first year)

The present project integrates eight different topics, each of which will be supervised by a mentor from the Faculty of Civil Engineering of the Czech Technical University in Prague. The particular topics include

- Drying and desalination of historical buildings using hydrophilic mineral wool Mentor: Robert Černý (e-mail: cernyr@fsv.cvut.cz)
- Low-energy building materials Mentor: Robert Černý (e-mail: cernyr@fsv.cvut.cz)
- **3.** Modeling of coupled cracking, creep and hygrothermal effects in construction materials Mentor: Milan Jirásek (e-mail: Milan.Jirasek@fsv.cvut.cz)
- **4.** Ultra high performance fiber-reinforced concrete in different loading conditions Mentor: Petr Konvalinka (e-mail: stemberk@fsv.cvut.cz)
- **5.** Wood-based materials
 - Mentor: Petr Kuklík (e-mail: petr.konvalinka@fsv.cvut.cz)
- **6.** Numerical and experimental analysis of concrete performance in irradiated environment Mentor: Petr Štemberk (e-mail: stemberk@fsv.cvut.cz)
- 7. Micromechanical modeling of thermal and acoustic insulation materials Mentor: Jan Zeman (e-mail: zemanj@cml.fsv.cvut.cz)
- **8.** Development of FFT-based solvers for homogenization of periodic media Mentor: Jan Zeman (e-mail: zemanj@cml.fsv.cvut.cz)

Interested candidates are invited to send their applications directly to the relevant mentor, using the e-mail address provided above, no later than 31 May 2013.

Additional details are available at http://mech.fsv.cvut.cz/wiki/index.php/ Department_of_Mechanics:_Vacancies:_UCEEB_Postdocs