

Special Session

on

NUMERICAL SIMULATIONS AND BACK ANALYSIS IN CIVIL AND MECHANICAL ENGINEERING

ABSTRACT

This special session will highlight applications of numerical simulations and back analysis to a broad range of engineering problems:

- complex numerical multi field simulations;
- optimization and back analysis in engineering problems involving coupled phenomena, e.g. piezoelectric materials, porous natural and biological materials, etc.;
- sensitivity analysis and reliability for engineering applications;
- optimization and back analysis in biomechanics;
- back analysis in geotechnics;
- numerical simulations via BIEM.

We are especially encouraging young people whose research involves solving engineering problems and who may benefit most from a fruitful meeting with researchers with outstanding experience in the field of numerical methods to present and discuss their current work at this forum.