



CODE_ASTER TRAINING

Mar. 13th — Mar. 16th

By EDF Code_Aster Development team

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Jointly organized by
Electricite De France Group
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Code_Aster IS EDF'S GENERAL PURPOSE, OPEN SOURCE STRUCTURAL AND THERMOMECHANICS ANALYSIS SOFTWARE. www.code-aster.org

THERMO-MECHANICAL ANALYSES IN LINEAR AND NON-LINEAR STATICS AND DYNAMICS

Training Program

* NUMBER OF PARTICIPANTS IS LIMITED TO 40 PERSONS

DATE	LEVEL	MORNING	AFTERNOON
Mar.13 th	Basic	Introduction of Code_Aster and Salome-Meca : Basic theory, applications, framework, service etc. EDF software development policy	Introduction to FEM for solving mechanic problems A simple mechanical study Exercise 1: Calculation of an elastic perforated plate and mesh adaption
Mar.14 th	Basic	Introduction to FEM for solving thermo-mechanical problems A simple thermal study Exercise 2: Pipe elbow under thermal-mechanical stress	Introduction to FEM for solving non-linear problems Presentation of Code_Aster industrial application Exercise 3: Yield-point load of a perforated plate
Mar.15 th	Advanced	Introduction to FEM for dynamics problems Exercise 4: Modal analysis of a plane mock-up	Advanced dynamics & Fluid Structure Interaction Exercise 5: Seismic analysis of a dam and its reservoir
Mar.16 th	Advanced	Introduction to FEM for Fracture mechanics & XFEM Exercise 6: Crack plate in tension Exercise 7: Circular crack in infinite body	Introduction of development within Code_Aster and HPC feature Presentations of Code_Saturne & Telemac and cloud platform. Discussion

Code_Aster is integrated in platform Salome, with user-friendly graphical interface and easy installation of a complete framework. It contains a wide range of constitutive laws (Elasticity, Elasto-plasticity, Elasto-visco-plasticity, fuel rods and metal under irradiation). It is also possible to carry out parallel calculations.

Disclaimer: Code_Aster is an open-source software. EDF has the right to use it and share its experience on the use of Code_Aster with third parties. The training will focus on the use of Code_Aster and by participating in the seminar the attendees intend to share related experience. The software and its documentation are in the public domain and are provided "as is". EDF, its affiliates, offices, employees, and agents make no warranty, express or implied, as to the usefulness of the software and documentation for any purpose and they assume no responsibility (1) for the use of the software and documentation; or (2) to provide technical support to users.

