

Title: Postgraduate(s) in Mechanical Engineering PGT-3333

Description:

Application Deadline: 17/05/2026

Department: Engineering Services Department

Job Grade: P1 (**SALARY SIMULATOR**)

Language Requirements: Fluent in English (written & spoken)

Contract Duration: 2 years

*The ITER Organization is opening multiple vacancies for postgraduates. The selection process will be conducted with the objective of filling **multiple positions**, also with the purpose of drawing up a reserve list of rostered candidates for future vacant positions.*

The Postgraduate Program offers early-career professionals the opportunity to gain practical experience in an international environment and contribute to meaningful work. It is designed for recent postgraduates who want to strengthen their technical foundations, develop professional skills, and grow through hands-on responsibilities within a team.

Overview

Are you looking for an exciting **early-career professional opportunity** at the heart of an ambitious fusion energy project?

Join us as a **Mechanical Engineer**.

Depending on the scope of activity, your goals may include:

- Contributing to the entire engineering life cycle (specification, design, qualification, procurement, installation, integration, commissioning and maintenance) for the scope of activity.
- Performing mechanical analyses of structures, including pressure vessels, piping systems and supporting structures.
- Developing, under the leadership of your discipline manager, your skills and experience for the benefit of the Project.

Typical Key Duties & Responsibilities:

Primary Responsibilities:

- Contributing to the delivery of mechanical designs and supporting engineering activities for the scope of activity (e.g. structures, cooling, buildings, remote handling, rotating machinery etc.).
- Performing mechanical / stress analyses, in addition to thermal and structural analyses.
- Contributing to the preparation of technical specifications as required for the procurement, fabrication, qualification and testing of the equipment, and of relevant tenders.
- Following up on the manufacturing for the scope of activity including qualification tests and final acceptance tests.

Additional Responsibilities:

- Providing assistance to the Domestic Agencies, contractors and ITER groups to carry-out engineering, R&D, interface control and procurement work as required.
- Issuing inspection and observation reports when and where required.

Please note that job descriptions cannot be exhaustive, and the staff member may be required to undertake other duties, which are broadly in line with the above primary responsibilities.

Experience, Competencies & Knowledge

Essential

- **Mechanics of materials:** Understanding of concepts such as stress, strain, fatigue and fracture.
- **Structural analysis:** Knowledge of beam and shell theory, as well as basic load cases.
- **Structural dynamics:** Understanding of dynamic systems and vibrations.
- **Mathematics:** Familiarity with engineering mathematics such as differential equations and linear algebra.
- **Manufacturing technics:** Basic understanding of techniques for manufacturing and joining metallic and non-metallic components.

- **Interpersonal Savy:** Ability to develop effective relationships with others, including excellent English skills in both oral and written communication.
- **Nimble Learning:** Applies lessons from different experiences to new situations and is curious to ask questions to learn from others.

Desirable:

- **Experience (incl. internship)** in elements of analyzing, designing, manufacturing, testing, installing and maintaining mechanical components, systems and interfaces.
- **Codes & Standards:** Understanding and applying industry, discipline or job-specific codes, standards and regulations to ensure that products, services, and processes comply with applicable requirements and legal frameworks such as ASME, RCC-MR or similar.
- **Knowledge of software such as:**
 - Mechanical engineering (e.g. ANSYS, ABAQUS, CAESAR II, STAAD PRO or similar).
 - CAD activities (e.g. CATIA (ENOVIA), SMART PLANT, AVEVA E3D/Diagrams or similar)

Qualifications

- Master's degree or equivalent in Mechanical, Civil or Structural Engineering field or other relevant discipline.

The following items apply to all jobs and job holders for the duration of tenure at ITER Organization:

- **The CARE Values are a framework of principles that guide our actions and define the culture and spirit of the ITER Project:**

Collaboration: We collaborate with commitment and flexibility using the power of teamwork, building partnerships, and working with others to reach shared objectives;

Accountability: We are accountable for the whole project - we take responsibility for our specific actions and are transparent in our daily work, holding self (ourselves) and others accountable to meet commitments;

Respect: We treat each other with respect and dignity at all times, knowing that all of us belong here. We appreciate the value that our multicultural and diverse community brings to the ITER Project;

Excellence: We are driven by excellence; we are agile and innovative while maintaining the highest standards of safety, quality and integrity;

- **ITER Core Technical Competencies:**

- 1) **Nuclear Safety, Environment, Radioprotection and Pressured Equipment**
- 2) **Occupational Health, Safety & Security**
- 3) **Quality Control & Quality Assurance Processes**

- **Knowledge of these competencies may be acquired through on-board training at basic understanding level for all ITER staff members;**

- Implements the technical control of the Protection Important Activities, as well as their propagation to the entire supply chain;
- May be requested to perform other duties in support of the project as defined by your line manager, and when relevant upon the request of the matrix manager;
- May be requested to work outside the ITER Organization reference working hours, including nights, weekends and public holidays, due to business needs - this may include on-call, shift work, etc.
- May be requested to be part of any of the project/construction teams and to perform other duties in support of the project;
- For staff expected to perform on-call, shift hours, or other work outside ITER Organization reference working hours, including nights, weekends, and public holidays, **the possession of a driving license valid in France is required. no commuting vehicle will be provided by the ITER Organization.**
- Informs management of any important and urgent issues that cannot be handled by line or matrix management and that may jeopardize the achievement of the Project's objectives;