International Centre for
Numerical Methods in Engineering

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JOB VACANCY ANNOUNCEMENT

VAC-2024-73 – Topology optimization for fluid structure interaction software developer.

Centre Internacional de Mètodes Numèrics a l'Enginyeria ® Q5850006G

Number of places: 1

Category: Innovation Trainee 1

Workplace: CIMNE Barcelona

Salary (gross): 29.322,04 €/yearly

Weekly working hours: 40

Contract type: Temporal

Functions to be developed:

The profile of person to be contracted is a research engineer with high-performance computational mechanics skills, and the ability to implement graphical user interfaces for computational mechanics problems. He/she will be in charge of implementation of topology optimization problems, software development and maintenance, and technical support. He/she also will be in charge of developing and testing an industry ready software environment for topology optimization of structures subject to FSI.

Required skills:

- Computational Fluid Dynamics
- Computational Solid Mechanics
- Python Programming, Fortran Programming
- Finite Element Method

Other valued skills (not mandatory):

- C++, Matlab, TCL-TK

Qualification system:

The requisites and merits will be evaluated with a maximum note of 100 points. Such maximal note will be obtained summing up the following points:

- Academic qualifications: 30%
- Training and development: 30%
- Professional experience: 10%

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- Knowledge of the Catalan language: 0%
- Knowledge of the English language: 10%
- Selective tests and interview: 20%

Candidates must complete the "Application Form" form on our website, indicating the reference of the vacancy and attaching the required documents.

The deadline for registration to the offer ends on December 19th , 2024 at 12 noon.

The preselected candidates may be requested to send the documentation required in the "Requirements" and "Merits" sections, duly scanned, and may be called to go through selection tests (which might be of eliminatory nature) and / or personal interviews.

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Commitment to inclusitvity:

At CIMNE, we champion workplace equity, diversity, and inclusion. We're committed to fostering a culture where everyone can thrive, leveraging diverse talents and backgrounds. We welcome all applicants regardless of color, religion, gender, origin, abilities, gender identity, sexual orientation, pregnancy or any other characteristic. Join us in building a community that values, celebrates, and respects every individual.

HR Excellence in Research:

CIMNE welcomes and supports the principles of European Commission's *European Charter for Researchers* and the *Code of Conduct for the Recruitment of Researchers*, embracing a transparent, attractive, and open labour market in research. The centre's Human Resources Strategy for Researchers (HRS4R) includes an action plan with actionable short and long-term actions to support a high-quality working environment for all. Further information can be found here.

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