

Deputy Director of Computing

1. Position information

Vacancy No.: VN21-14	Department: Computing
Grade: A5	Section: n/a
Job Ref. No.: STF-C/21-14	Reports to: Director of Computing
Publication Date: 5 March 2021	Closing Date: 19 April 2021
Location: Reading, UK	

2. About ECMWF

ECMWF is the European Centre for Medium-Range Weather Forecasts. It is an intergovernmental organisation created in 1975 by a group of European nations and is today supported by 34 Member and Co-operating States, mostly in Europe. The Centre's mission is to serve and support its Member and Co-operating States and the wider community by developing and providing world-leading global numerical weather prediction. ECMWF functions as a 24/7 research and operational centre with a focus on medium and long-range predictions and holds one of the largest meteorological archives in the world. The success of its activities relies primarily on the talent of its scientists, strong partnerships with its Member and Co-operating States and the international community, some of the most powerful supercomputers in the world, and the use of innovative technologies such as machine learning across its operations.

Over the years, ECMWF has also developed a strong partnership with the European Union, and for the past seven years has been an entrusted entity for the implementation and operation of the Climate and the Atmosphere Monitoring Services of the EU Copernicus Programme, as well as a contributor to the Copernicus Emergency Management Service. The collaboration does not stop there and include other areas of work, including High Performance Computing and the development of digital tools. It is enabling ECMWF to now provide data and products covering weather, climate, air quality, fire and flood prediction and monitoring.

ECMWF has recently become a multi-site organisation, with its headquarters based since its creation in Reading, UK, its new data centre opening in 2021 in Bologna, Italy, and new offices, also opening in 2021 in Bonn, Germany.

For additional details, see www.ecmwf.int/.

The Computing Department is responsible for the strategy, design and 24/7 service provision of ECMWF's mission-critical ICT infrastructure and services. State-of-the-art high-performance computing (HPC) facilities, storage solutions to support the world's largest meteorological data archive and ICT solutions for the organisation are core of the Department's mission.

More than 60 technical and engineering staff, located in Reading and Bologna, provide ICT services and support to users of the ECMWF Departments of Research, Forecasts, Copernicus and Administration, as well as ECMWF's external users in Member States and Co-operating States.

The Computing Department actively researches the technology landscape for the benefit of ECMWF's future operations of ECMWF's highly demanding 365/24/7 HPC facility and supporting data archive, ensuring resilient and mission-critical computing services.

3. Summary of the role

ECMWF is recruiting a Deputy Director of Computing. At the core of the department's mission are state-of-the-art high-performance computing (HPC) facilities, storage solutions to support the world's largest meteorological data archive and digital technologies solutions for the organisation.

The role is a senior management position reporting directly to and working closely with the Director of Computing on the strategy, development roadmap and 24/7 service provision of ECMWF's mission-critical ICT infrastructure and services.

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The successful candidate will lead the research of current and emerging technologies and will provide strategic insight into their potential for the strategic planning and development of ECMWF's ICT architecture and technical designs, in particular in the fields of HPC, AI and data handling solutions, and will lead or contribute to relevant proposals for research and innovation actions.

As part of the Computing Department management team, the successful candidate will ensure the smooth running of the Department in the provision and delivery of leading-edge, mission-critical services to its users across the sections for high-performance computing and storage, platform and services, data centre operations and service delivery. They will prepare annual work plans and service development proposals for all areas of the Department's activity in close collaboration with the relevant Heads of Section and will monitor and report on performance and efficiency. They will lead the preparation of the Department's budget and ensure consistency across the different Sections. They will coordinate and oversee the implementation of process improvements.

They will also represent the Department in cross-cutting working groups, lead projects, be responsible for the development of major business cases and acquisitions (such as HPC procurements) and support the Director of Computing in developing strategic thinking and preparing relevant documents such as the 4-year plan and 10-year strategy. They will deputise for the Director of Computing and represent ECMWF externally when required.

In this role, the Deputy Director of Computing develop strong relationships with both internal and external stakeholders in ECMWF's governing body and advisory committees, national meteorological services, HPC user community, HPC centres and related organisations, the relevant research community and ICT companies.

This post offers a wide variety of exciting challenges and opportunities to take the lead in critical activities for the Department and ECMWF.

4. Main duties and key responsibilities

- Advising the Director of Computing and the Computing Department on strategy development and the design and delivery of leading-edge computing and data management technologies and services.
- Driving horizon scanning activities within the Department to identify emerging areas and development opportunities with potential for research and innovation actions and programmes focusing on the mission of the Computing Department, in particular in the fields of HPC, AI and data driven computing
- Managing the further development of a state-of-the-art architecture and technical design of ICT infrastructures and services in close collaboration with the Section Heads
- Providing strategic insight and identifying opportunities for the ongoing development of the Computing Department services to meet the changing needs of the Centre
- Promoting scientific and technical excellence, advising on the identification and adoption of best practice, and driving continuous improvement processes across the Department
- Contributing to the delivery of the ECMWF strategy, notably on key projects, in collaboration with the senior management of the Department and with stakeholders in the wider organisation
- Leading, coordinating or contributing to large cross-cutting internal and external projects, including business cases for major developments and procurements, working groups and meetings
- Fostering collaborations and coordinating services and projects with other ECMWF departments, third-party actives such as Copernicus and Destination Earth, and external organisations
- Representing ECMWF externally in international bodies, formal co-operations, and partner organisations; engaging with the wider HPC community and being responsible for outreach activities such as the Workshop of the use of HPC in Meteorology
- Leading the preparation, implementation and control of the Department's Annual Budget
- Coordinating the preparation, implementation and monitoring of the Department's Annual Plan and objectives
- Supporting the leadership of operational aspects of the Department's work, by monitoring the implementation of key objectives, identifying risks & issues and leading the development and implementation of solutions
- Deputizing for the Director of Computing as required

5. Personal attributes

- Strong leadership skills, with proven ability to lead, influence and motivate based on personal credibility and authority rather than organisational position
- Ability to motivate and facilitate a team to deliver, to coach, mentor and support colleagues as required
- Ability to work collaboratively as well as part of a senior management team to deliver successful outcomes
- Excellent interpersonal skills, including the ability to gain credibility with key stakeholders within the organisation and outside the organisation, and to positively represent the organisation externally
- Proactive approach and attitude
- Adaptability with outstanding analytical skills, interested in being intellectually challenged
- Solution-oriented and ability to demonstrate a complete understanding of how to evaluate the financial, commercial and strategic implications of their decisions in relation to the organisation needs
- Ability to manage a range of conflicting and urgent issues to tight deadlines in a constantly changing and time-constrained operational environment

6. Qualifications and experience required

Education	Advanced university degree (EQF Level 8) in computer science, computational science or another relevant area or equivalent professional experience is required.
Experience	<p>Substantial relevant experience in the main area of work for the Department, in particular HPC and data management, in relevant research and/or operational environments.</p> <p>Demonstrated experience of working with leading-edge digital technologies with a deep understanding of HPC and data management technologies.</p> <p>Experience in initiating and developing research and innovation proposals and projects would be a distinct advantage.</p> <p>Substantial experience of drafting and presenting board level documentation to support business proposals to key stakeholders.</p> <p>Experience of project management, risk management and change management would be considered an advantage.</p> <p>Proven track record in successfully leading and working with multi-national teams and managing projects and budgets.</p> <p>Demonstrated experience of HPC and technology management in research and/or operational environments, would be an advantage.</p> <p>Experience with technology management and large procurements in the IT domain, particularly for HPC services.</p>
Knowledge and skills (including language)	<p>Candidates must be able to work effectively in English and interviews will be conducted in English.</p> <p>A good knowledge of one of the Centre's other working languages (French or German) or Italian would be advantageous.</p>

7. Other information

Grade remuneration

The successful candidate will be recruited at the **A5** grade, according to the scales of the Co-ordinated Organisations and the annual basic salary will be **£103,211.52** net of tax. This position is assigned to the employment category **STF-C** as defined in the Staff Regulations.

Full details of salary scales and allowances are available on the ECMWF website at www.ecmwf.int/en/about/jobs, including the Centre's Staff Regulations regarding the terms and conditions of employment.

Starting date: As soon as possible.

Length of contract: Four years, with the possibility of a further contract.

Location: The position will be based in Reading, Berkshire, United Kingdom.

8. How to apply

Please apply by completing the online application form available at www.ecmwf.int/en/about/jobs.

To contact the ECMWF Recruitment Team, please email jobs@ecmwf.int.

Please refer to the ECMWF Privacy Statement. For details of how we will handle your personal data for this purpose, see: <https://www.ecmwf.int/en/privacy>.

At ECMWF, we consider an inclusive environment as key for our success. We are dedicated to ensuring a workplace that embraces diversity and provides equal opportunities for all, without distinction as to race, gender, age, marital status, social status, disability, sexual orientation, religion, personality, ethnicity and culture. We value the benefits derived from a diverse workforce and are committed to having staff that reflect the diversity of the countries that are part of our community, in an environment that nurtures equality and inclusion.

Staff are usually recruited from among nationals of the following Member States and Co-operating States:

Austria, Belgium, Bulgaria, Croatia, Czech Republic, Denmark, Estonia, Finland, France, Hungary, Germany, Greece, Iceland, Ireland, Israel, Italy, Latvia, Lithuania, Luxembourg, Montenegro, Morocco, the Netherlands, North Macedonia, Norway, Portugal, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.