Call for expression of interest for one (1) BSc holder in Computer Science, in the Institute of Computer Science (ICS) Foundation for Research and Technology – Hellas (FORTH)

Position(s): One (1) BSc holder in Computer Science

Project: “Optimizing Manufacturing Processes through Artificial Intelligence and Virtualization” (OPTIMAI) (Grant Agreement number: 958264), funded under Horizon 2020, DT-FOF-11-2020 Quality control in smart manufacturing (IA)

Desired starting date: October 1st, 2022
Duration: 12 months on a full-time basis with possibility of extension
Location: Heraklion, Crete, Greece

Opening date: 10/08/2022
Closing date: 25/08/2022
Ref.: “OPTIMAI-Aug2022”

Description
We seek one experienced member for our team, with a background in Computer Science. The candidate will participate in the R&D activities of FORTH in the context of the project “Optimizing Manufacturing Processes through Artificial Intelligence and Virtualization” (OPTIMAI), funded under Horizon 2020, DT-FOF-11-2020 Quality control in smart manufacturing (IA).

OPTIMAI is coordinated by CERTH and FORTH-ICS is a member of the project consortium. The project aims to create an industry ecosystem that will optimize production through Smart Instrumentation, Metrology, Artificial Intelligence, Virtualization and Augmented Reality. To this direction, a multimodal sensorial network will be integrated in the production line, enhanced with edge-processing capabilities for improved acquisition and pre-processing. A sensors’ network will be orchestrated by a middleware layer, enabling the collection of time-stamped, registered and semantically fused data while supporting two-way communication both for actuation and data collection. OPTIMAI will be secured through a designated cyber-
defence module and a distributed ledger mechanism that will ensure data validity and monitor communication transactions ensuring accountability and traceability. Artificial Intelligence methodologies will be developed for zero defect manufacturing through the analysis of multisensorial quality inspection data, the detection of defects and the identification of defects’ causes upstream in the manufacturing process. For rapid reconfiguration of production parameters cutting edge Human-Computer Interfaces (HCI) will be developed based on computer vision methodologies and AI in order to understand operator’s intentions and proceed with actuation or recalibration.

Position: BSc holder in Computer Science

Required qualifications:

- BSc degree in Computer Science
- Experience in full-stack development using MERN and/or MEAN stack
- Excellent knowledge of JavaScript, HTML, CSS, SQL, Java, C++, C#, C, Python, Unity3D
- Excellent knowledge of Angular/React application development platform
- Experience in Git source code control system
- Experience in Gitlab CI/CD process
- Thorough knowledge of human-centred design and design for all principles and their implementation
- Good knowledge of developing Application Programming Interfaces (APIs) that conform to the constraints of REST architectural style (knowledge of Postman platform is required too)
- Excellent knowledge of English
- Physical presence at FORTH, Heraklion, Crete for the duration of the position

Desired qualifications:

- Previous experience with EU- and/or national - funded RTD projects
- Experience in the implementation of Virtual Reality applications
- Experience in the implementation of Augmented Reality applications
- Experience in the design and development of software applications for ambient intelligence environments
- Experience in the deployment of applications using Kubernetes and Docker
- Experience in the Flask micro web framework

Application Submission

Interested candidates can submit their applications via http://www.ics.forth.gr/jobs/en/ using the link “Apply for the position” under the announcement. Applications must include:

- Detailed CV, including qualifications and interests in the above areas;
- Scanned copies of academic titles;
- Detailed presentation of prior work, studies and/or publications, references etc. demonstrating knowledge of desired skills (e.g. experience on specific programming languages and hardware platforms).

Contact Information:

For information and questions about the advertised position, the activity of the group or the Institute, please contact Iosif Klironomos at iosif@ics.forth.gr.

Selection Announcement

The result of the selection will be announced on the website of ICS-FORTH. Candidates have the right to appeal the selection decision, by addressing their written objection to the ICS secretariat within five (5) days.
since the results announcement on the web. They also have the right to access (a) the files of the candidates as well as (b) the table of candidates’ scores (ranking of candidates results). All the above information related to the selection procedure will be available at the secretariat of ICS-FORTH in line with the Hellenic Data Protection Authority. Access to personal data of co-candidates shall be limited to personal data (and relevant data) and supporting documents which have been the basis of the evaluation of the candidates for the specific post(s). Prior to the announcement of the personal data and/or documents of the co-candidates to the applicant, FORTH will inform the data subjects in an appropriate way.

Disclaimer

FORTH is compliant with all legal procedures for the processing of personal data as defined by the Regulation EU/2016/679 on the protection of natural persons with regard to the processing of personal data.

FORTH processes the personal data and relevant supporting documents that you have submitted to us. Processing of that data is carried out exclusively for the needs and purposes of this specific call. Such data shall not be transmitted to or communicated to any third party unless required by law.

FORTH retains the above data up to the announcement of the final results of the call, unless further process and reservation is required by law or for purposes of exercise, enforcement, prosecution of certain one’s legitimate legal rights’ as defined in the Regulation EU/2016/679 and/or in national law.

We inform you that under the Regulation EU/2016/679 you have the rights to be informed about your personal data, access to, rectification and erasure, restrictions of process and objection to as provided by applicable regulation and national laws.

We acknowledge also to you, that you have the right to file a complaint to the national Data Protection Authority. For any further information regarding exercise of your personal data protection rights, you may contact the Data Protection Officer at FORTH at dpo@admin.forth.gr.

You have the right to withdraw your application and consent for the processing of your personal data at any time. We inform you that, in this case, FORTH shall destroy such documents and/or supporting documents submitted and shall delete the related personal data.