



Two (2) PhD student position in the project

NEP

Nanoscience Foundries and Fine Analysis - Europe | PILOT

(Call: H2020-INFRAIA-2020-1, RIA, GA 101007417)

Funded under H2020-EU.1.4.1.2.



European
Commission

Horizon 2020
European Union funding
for Research & Innovation

Ref. 64542

Heraklion 3/11/2021

The Institute of Electronic Structure and Laser (IESL) of the Foundation for research and Technology Hellas (FORTH), in the framework of the project NEP, (P.I. Emm. Stratakis, Call: H2020-INFRAIA-2020-1, GA number: 101007417), funded under RIA, H2020-EU.1.4.1.2. – Integrating and opening existing national and regional research infrastructures of European interest, is seeking to recruit two PhD students.

Job 1

Micro-photoluminescence and time decay measurements in semiconductor nanostructures.

The candidate will apply micro-photoluminescence, time-resolved photoluminescence and photon-correlation spectroscopy techniques on various types of semiconductor nanostructures such as quantum dots and nanowires.

Required qualifications

- Master of Science in Physics, Materials Science or Electrical Engineering (20%)
- Experience in optical, electrical and structural characterization of semiconductors (40%)
- Experience in the optical characterization of single semiconductor nanostructures with microscopy techniques (40%)

Job 2

GaN polariton structures and their use as sources of entangled photons.

The candidate will design, fabricate and characterize GaN polariton structures in view of detecting entangled photon pairs produced by parametric scattering of polaritons. The main techniques that will be used are photo-electrochemical etching, micro-photoluminescence, micro-reflectivity and angle-resolved photoluminescence.

Required qualifications

- Master of Science in Physics, Materials Science or Electrical Engineering (20%)
- Experience in optical, electrical and structural characterization of gallium nitride (40%)
- Experience in the photo-electrochemical etching of GaN membranes (40%)

Location: IESL-FORTH, Heraklion Crete GREECE

Start Date (earliest): January 1, 2022

Project Duration: 3 Months with possibility of extension according to the needs of the project

Application Submission

Interested candidates who meet the aforementioned requirements are kindly asked to submit their applications, no later than **November 18, 2021, 23:59 local Greece time** to the address (hr@iesl.forth.gr), with cc to Prof. Nikolaos Pelekanos (pelekano@materials.uoc.gr).

In order to be considered, the application must include:

- Application Form (please download file from the job announcement webpage <https://www.iesl.forth.gr/en/jobs-bids/jobs/job-positions>)
- Detailed curriculum vitae (CV) of the candidate
- Scanned Copies of academic titles
- Certificate for enrollment in PhD program

Any application received after the deadline will not be considered for the selection

Contact

For information and questions regarding the application and selection procedure, candidates are asked to contact the secretariat (hr@iesl.forth.gr), tel. +30 2810-391301.

For information and questions about the advertised position and the research activity of the group or the institute, candidates are asked to contact Prof. Nikolaos Pelekanos (pelekano@materials.uoc.gr), tel. +30 2810-394107.

Selection Announcement

The result of the selection will be announced on the website of IESL-FORTH.

Candidates have the right to appeal the selection decision, by addressing their written objection to the IESL secretariat within five (5) working 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 IESL-FORTH in line with the Hellenic Data Protection Authority.

GDPR

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.