Integrated NanoMaterials Core Facility @ California NanoSystems Institute (CNSI) at UCLA

Research Scientist

This exciting position is funded through the California Nanosystems Institute (CNSI). Research topics are very broad and flexible. Quantum structures, quantum dots and nanowires based in III-As,N,Sb are of central interest for a broad range of optoelectronic and electronic devices including PVs, photodetectors, emitters, transistors. The researcher will be responsible for leading a multidisciplinary team of graduate and undergraduate associates. Strong experimental skills are required in some, but not all of the following: optical/electrical test and measurement, micro/nanofabrication, electromagnetic simulations, MBE epitaxy. Other responsibilities include generating an outstanding research record, intellectual property, conference presentations, publications and proposals. Entrepreneurial interests and ability to build collaborative networks are strongly encouraged.

Desired skills:
- Expertise in some, but not all of the following: optical/electrical test and measurement, micro/nanofabrication, electromagnetic simulations, MBE epitaxy.
- Effective and demonstrated written and oral communication is absolutely necessary.
- Interest in project leadership, grant-writing and cross-disciplinary collaboration.

Position is available immediately.

Research Center:
The Integrated NanoMaterials Core Facility is established to enable nanoscale integration of dissimilar materials using epitaxial processes. Our mission is to offer excellent and highly flexible capability at a state-of-the-art facility built around a molecular beam epitaxy system capable of both III-V and Si crystal growth. The facility attracts industrial, military and academic constituents interested in CMOS integration, mid-wave infrared device development, renewable energy platforms along with others. Core capabilities include quantum structure epitaxy (quantum dots, nanopillars) along with IIIIV on Si.

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