

The Paul Drude Institute (PDI) performs basic research as a lively symbiosis of materials science and solid state physics. Our research aims at inspiring and demonstrating new functionalities for future information technologies. As a member of the Leibniz-Gemeinschaft and Forschungsverbund Berlin e.V. we are an independent research institute with about 100 employees. We are located in the very heart of the city near Gendarmenmarkt. You may find more details at www.pdi-berlin.de.

PostDoc (m/f/d): Metastable $(\text{In,Ga,Al})_2\text{O}_3$ alloys, deep acceptor-doping, and p -type oxides by MBE growth (G5X)

PDI has excellent expertise and facilities for the growth and investigation of semiconductors and is leading the Berlin-based Leibniz ScienceCampus GraFOx (Growth and Fundamentals of Oxides for electronic applications, <http://grafox.pdi-berlin.de/>) - a network of three Leibniz Institutes, three Universities, one Institute of the Max Planck Society and one Institute of the Helmholtz Center Berlin.

For the second funding period of GraFOx we are seeking you as a PostDoc for project G5X. You will perform basic growth investigations of Ga_2O_3 by plasma-assisted molecular beam epitaxy, exploit solid-state epitaxy to stabilize high-quality $(\text{In,Ga,Al})_2\text{O}_3$ at extreme compositions, and use deep-acceptor (e.g., Ni, N) doping and p -type oxides (e.g., SnO) with Ga_2O_3 for application in high-voltage devices. Your research includes the basic structural and electrical characterization.

You should have a PhD in experimental solid state physics or related fields as well as experience with epitaxy, materials characterization, and publication. We are looking for a team player with a high level of communication skills and the assertiveness to work in a highly motivated team of researchers and technicians, and to collaborate with and help advising PhD students.

The position is available as of now and its duration is presently limited to 2 years with an optional extension. Payment is according to TVöD (Treaty for German public service). PDI is an equal opportunity employer. Therefore, female candidates are encouraged to apply. Among equally qualified applicants preference will be given to disabled candidates.

Please submit your application as PDF via email by **Nov. 30, 2020** to jobs@pdi-berlin.de with reference to project G5X in the subject, including a dedicated cover letter, CV, publication list, letter(s) of recommendation, degree(s) and transcript(s). For questions on the project contact Dr. Oliver Bierwagen, bierwagen@pdi-berlin.de

