Open PhD-Student Position

Photovoltaics (PV) is one of the fastest growing renewable energy technologies. The potential is enormous, and an increased installation of solar cells is expected supported by continuous improvement in performance and reduction in cost. Thin film solar cells have the advantage that the active material can be very thin since sunlight absorption is effective. The Linz Institute for Organic Solar Cells has been active in the field of thin film PV for many years. In the framework of the project ALTAFOS (alternative acceptors for organic solar cells) we are looking for one PhD-student. The project is funded by The Austrian Research Promotion Agency (FFG) and the project consortium comprises the Johannes Kepler University (JKU) and the Graz University of Technology (TUG).

For many years fullerene derivatives have been applied in organic solar cells as photoactive component. Very recently it was found that fullerenes can be replaced by other organic semiconductor materials resulting in higher power conversion efficiencies (up to 14 %). In addition, the synthesis of the new absorber materials is easier and can be done at much lower cost.

The goal of the project is the synthesis of novel absorber materials (TUG), their detailed characterization, their application in organic solar cells and the investigation of the working principles of the novel materials in photovoltaic devices (JKU).

Applicants should have a Master of Science in Physics, Materials Science, Chemistry or equivalent with a solid background in semiconductor device physics and spectroscopy. Strong collaboration spirit and good communication skills in oral and written English are required.

Applications should include a brief description of research interest and past experience, CV, copies of exams, degrees and grades, a copy of your Master thesis (or a draft thereof) and other relevant documents. The candidates are encouraged to provide letter(s) of recommendation and contact information to reference persons.

**Starting date:** 01.08.2018

**Project duration:** 3 years

**Pay:** Local guidelines for salary placement are used

**Type of employment:** Temporary position

**Working hours:** 30

**For more information** please contact Markus C. Scharber, markus_clark.scharber@jku.at, phone +43-732-2468-5845, Johannes Kepler University Linz, Altenbergerstrasse 69, 4040 Linz, Austria.