The Dynamics of photosynthetic membranes Group (PI: Dr. Radek Kaňa) at Centre ALGATECH, Institute of Microbiology (Třeboň, Czech Republic) is looking for one POSTDOC & one PhD student to study “Structure and Dynamics of Cyanobacterial Thylakoid” by methods of advanced confocal microscopy.

The project will elucidate the importance of thylakoid membrane protein mobility and the role of membrane heterogeneity in light-harvesting efficiency. The experimental work will include a combination of single-cell life-imaging methods (confocal microscopy, FCS, FRAP) and other fluorescence methods that will be applied to study key factors (proteins) affecting structure and function of thylakoid membrane microdomains.

Requirements:
- Degree/Master in any field of Cell Biology, Plant biology or Biophysics
- Knowledge of Confocal microscopy, advanced methods (FRAP, FCS) will be a plus
- Computer literacy, knowledge of image processing software is a plus, analytical abilities and effective data processing skills
- High level of English and good communication skills, writing skills
- Ability to organise and prioritise own work and organise research within the project schedule, ability to maintain accurate and up to date records, effective team working

We offer:
- Envisaged starting date: February-March 2017
- 2 years PostDoc contract/3 years PhD, competitive salary for PostDoc (scholarship+salary for PhD), working in newly modernized centre of algal science and biotechnology (Centre ALGATECH), international environment
- The project includes international co-operation, Dr. Kana’s group collaborates with laboratories in UK (QMU London), Hungary (BRC Szeged), Germany (EMBL, Heidelberg).
- Stimulating, interdisciplinary research in the field of bioenergetics of thylakoids, high quality international scientific environment in the field of photosynthesis

Interested applicants should send their CV, full academic sheet (including scientific background, training and expertise, research interest, motivation for joining the project), publication list, cover letter and two references to kana@alga.cz.

The Centre ALGATECH (Institute of microbiology, CAS, Czech Republic) represents a word-wide recognized institution for basic research of photosynthesis, phototrophs and algal biotechnology. The institution is situated in Třeboň (South Bohemia) and its research covers various aspects of cell/molecular biology, biophysics, ecophysiology, biotechnology of phototrophs. Centre employs more than 100 people and represents international environment with many international projects of co-operations.

The research of Dr. Radek Kaňa group is focused on basic aspect of thylakoid membrane dynamics and structure, photosynthetic proteins mobility and photoprotection in light-harvesting antennae. It uses microscopic techniques (confocal microscopy, FRAP, FCS) together with fluorescence, biochemical methods and methods of molecular biology for GFP tagging of proteins. The main aim of the group is to explore connection between thylakoid membrane structure and its bioenergetic function in light-harvesting.