If you are interested in developing your carrier in science closely related to the R&D of food/fruit sector we invite you to our labs. We offer the opportunity to participate in research projects carried out in newly established and very well equipped research environment located in beautiful and friendly Lublin/Poland.

Responsibilities/Requirements:

The Department of Microstructure and Mechanics of Biomaterials (MMB) in the Institute of Agrophysics PAS (IAPAS) is looking for experienced researchers interested in 2 years post-doc position founded by a Marie Curie fellowship (IEF Or IIF). The candidate is asked to write a Marie Curie proposal in collaboration with us to undertake research on one of the following topics:

a) **Plant biomechanics:** Study on biomechanics of parenchyma tissue of fruits and vegetables in relation to consumer demands.
b) **Biomodeling:** Modeling of structure-related properties of biomaterials.
c) **Optical properties of perishable plant food:** Study on innovative optical methods for nondestructive evaluation of perishable plant foods.

The candidate will have PhD or at least four years of full-time equivalent experience in the mentioned above areas. The candidate is asked to prove his/her scientific excellence by multiple peer-reviewed publications in leading professional journals.

The deadline for application to MMB-IAPAN is May 31st, 2012. Further information on Marie Curie Actions is available at: http://cordis.europa.eu/fp7/mariecurieactions/

Applications

Full CV & covering letter please send to:

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About MMB-IAPAN

The Department of Microstructure and Mechanics of Biomaterials (MMB) in the Institute of Agrophysics PAS (IAPAS) investigates the structure-related properties of biomaterials, particularly plant food, like fruits and vegetables (f&v). Multi-scale imaging and biomechanics are aiming on prediction the f&v quality at the macro-scale. The multi-scale approach consists of the cell wall topography, cellulose crystallinity, pre- and post-harvest inter-polysaccharides linkage and cleavage, cell and intercellular spaces size and orientation, and tissue macro-morphology. At the macro-scale, the f&v quality is measured with use of both sensory evaluation and instrumental methods. MMB innovates also new methods for evaluation of the f&v quality.

MMB is equipped in various microscopic techniques like AFM, CLSM, Raman microspectroscopy, macroscopy, etc, combined with image analysis and FEM modeling software. The imaging equipment is collected to cover the full-scale properties of plant tissue. We measure the mechanical properties by universal testing machine and microtester combined with imaging system, whereas sensory texture we evaluate by trained sensory panel. The above is completed with biochemical equipment: FT-IR, Flow Continuous Analysis, etc.. Further information (labs equipment, publications, on-going projects) can be found at www.mam.ipan.lublin.pl.

Microstructure and Mechanics of Biomaterials

www.mam.ipan.lublin.pl