

Curriculum vitae

Personal data

Name: Mgr. Agáta Dujavová, PhD.
Marital statuses: single
Nationality: Slovak

Education and Qualifications

2001-2006 Department of Inorganic Chemistry, Faculty of Natural Sciences, Department of Inorganic Chemistry, Comenius University, Bratislava

Diploma thesis: The influence of the reaction conditions on the preparation of the Tl(Re)-Ba-Ca-Cu-O superconducting thin film in open system.

2006-2010 PhD study Institute of Electrical Engineering, Slovak Academy of Sciences (IEE SAS)

PhD thesis: [Preparation and properties of thin oxide superconducting films based on TI and possibilities of their applications in cryoelectronics](#)"

Thesis defense: September 22, 2010

present Research Scientist at Department of Optoelectronics, IEE SAS, Bratislava

Research Interests

- Preparation of thallium based high-temperature superconductors by on-axis RF magnetron sputtering and ex-situ thallination
- Study of thallination process
- Study of the structural and electrical properties of TI -based superconducting films
- Patterning of TI -based superconducting films
- Sol-gel fabrication of the oxide powders (Ba-Ca-Cu-O)
- Preparation of tandem solar cells
- SEM characterization.

Research Projects (involved)

APVV Monolithically integrated circuits based on GaAs (GaN) with passive superconducting filters for millimeter wave band (2006 - 2009)

VEGA Perspective thin films and structures for cryoelectronics on superconducting substrates (2008 - 2010)
Thin films and structures perspective for electronics (2005 - 2007)

Štrukturálne fondy EU (ERDF EU) Effective control of production and consumption of energy from renewable sources - ENERGOZ (2010 - 2013)

International Conference Presentations

SSSI 2006, Smolenice, Slovakia

Dujavová, A., Valeriánová, M., Štrbík, V., Matkovičová, Z., Plesch, G.: *The influence of the reaction conditions on the formation of Tl(Re)-Ba-Ca-Cu-O superconducting thin films by thallination in open system.* Poster.

Matkovičová, Z., Štrbík, V., Plesch, G., Valeriánová, M., **Dujavová, A.**: *Tl-based superconducting films prepared by aerosol spray deposition and thallinated in an open system.* Poster.

SSC 2008, Bratislava, Slovakia

Dujavová, A., Valeriánová, M., Štrbík, V., Chromik, Š., Kostič, I.: *The influence of the precursor composition on the properties of the thin superconducting films based on thallium.* Poster.

SSSI 2008, Smolenice, Slovakia

Dujavová, A., Sojková, M., Štrbík, V., Polák, M., Gaži, Š., Abaloševa, I., Chromik, Š.: *The influence of the rhenium in the precursor film on the properties of the thin superconducting films based on thallium.* Poster.

SURFINT-SREN II 2009, Florence, Italy

Dujavová, A., Sojková-Valeriánová, M., Chromik, Š., Štrbík, V., Kostič, I.: *Tl-based patterned superconducting structures – fabrication and study.* Poster.

Sojková-Valeriánová, M., **Dujavová, A.**, Abaloševa, I., Chromik, Š., Štrbík, V.: *Study of the Re-free and Re-based Tl-Ba-Ca-Cu-O superconducting films.* Poster.

CPEM 2010, Daejeon, Korea

Benačka, Š., Štrbík, V., Gaži, Š., Šmatko, V., Chromik, Š., **Dujavová, A.**, Vávra, I., and Vrabček, P.: *Transport properties of $YBa_2Cu_3O/La_{0.67}Sr_{0.33}MnO_3$ heterostructures for JAVS.* Poster.

Language skills

- English
- Spanish