

Assoc. prof. Jan Paleček, Dr.

ResearcherID: D-6864-2012

WORK EXPERIENCE

since 2012 Associate professor

Masaryk University (Brno, Czech Republic)

CEITEC: group of Chromatin molecular complexes (program of Genomics and proteomics of plant systems)

Faculty of Science: Department of Functional genomics and proteomics (head of group: Structural proteins of eukaryotic chromosomes)

- Research and teaching
- Research group and project management
- Mentoring postdocs
- Supervising bachelor, master and PhD students
- Teacher: “Proteomics” and “Methods in proteomics”,
- Guarantor/teacher: “Structure and function of protein complexes” and “Biology of yeasts” - regular semestral courses

2006 – 2012 Assistant professor

Masaryk University (Brno, Czech Republic)

Department of Functional genomics and proteomics

2002 – 2006 Postdoctoral research fellow

Sussex University (Brighton, United Kingdoms)

Genome damage and stability centre (MRC UK)

Prof. A.R. Lehmann, FRS, FMedSci

1998 – 2002 Postdoctoral research fellow

Institute of Biophysics (AS CR, Brno, Czech Republic)

Laboratory of Biophysical Chemistry and Molecular Oncology

EDUCATION AND TRAINING

1992 - 1997 Dr. rer. nat. (Ph.D.) degree in Biochemistry

Vienna University, Biocentrum (Prof. H. Ruis)

Dept. of Biochemistry and Molecular Cell Biology, (Vienna, Austria)

- PhD thesis: Rpg1, a subunit of the eIF3 initiation factor complex, specifically interacts with the actin-associated protein Sla2p/End4p

1985 - 1991 MSc. degree in Biochemistry

Masaryk University and Institute of Biophysics (Brno, Czech Republic) Department of biochemistry

- Master thesis: New approaches to study DNA structures in eukaryotes

RESEARCH TOPICS

Research interests

architecture, structure, function, and evolution of protein complexes; analysis of protein-protein and DNA-protein interactions; protein posttranslational modifications; DNA repair and recombination; DNA structure, chromatin structure and dynamics; protein complexes in human health

Projects

- 1999 – 2002: Role of domains and oligomeric state of p53 protein for its molecular interactions; Czech Science Foundation (GA301/99/D078; 25 000€) postdoctoral fellowship – excellent rating
- 2009 – 2011: Characterization of MAGE proteins: cofactors for E3 ubiquitin ligases?; Grant agency of Academy of Sciences (IAA501630902; 110 000 €), PI - excellent rating
- 2013 – 2016: Role of non-SMC proteins in stabilization and processing of stalled replication forks; Czech Science Foundation (GA13-00774S; 275 000€), PI
- Plus number of projects as a coPI or team member

Publications most related papers

H-index (WoS): 11; Peer reviewed publications (WoS): 18; citations (WoS): 580;

- Wesp, A., L. Hicke, J. Palecek, R. Lombardi, T. Aust, A.L. Munn, and H. Riezman. End4p/Sla2p interacts with actin-associated proteins for endocytosis in *Saccharomyces cerevisiae*, (1997) *Mol Biol Cell*, 8:2291, **IF = 8.3**, citations = 160
- Brazdova, M. *, Palecek, J. *, Cherny, D.I., Billova, S., Fojta, M., Pecinka, P., Vojtesek, B., Jovin, T.M. and Palecek, E.: Role of tumor suppressor p53 domains in selective binding to supercoiled DNA, (2002) *Nucl Acids Res*, 30: 4966-4974, **IF = 7.1**, citations = 40; *First two authors (MB and JP) contributed equally to this work.
- Sergeant, J. *, Taylor, E. *, Palecek, J. *, Fousteri, M., Andrews, E.A., Sweeney, S., Shinagawa, H., Watts, F.Z., Lehmann, A.R.: Composition and architecture of the *Schizosaccharomyces pombe* Rad18 (Smc5-6) complex, (2005) *Mol Cell Biol* 25: 172-84, **IF = 7.1**, citations = 67; *First three authors (JS, ET and JP) contributed equally to this work
- Schrupfová PP, Kuchar M, Palecek J, Fajkus J.: Mapping of interaction domains of putative telomere-binding proteins AtTRB1 and AtPOT1b from *Arabidopsis thaliana*, (2008) *FEBS Lett.* 582:1400-6, **IF = 3.3**, citations = 16
- Palecek, J. and Gruber, S.: Kite Proteins: a Superfamily of SMC/Kleisin Partners Conserved Across Bacteria, Archaea, and Eukaryotes. (2015) *Structure*, 23(12): 2183-90. **IF = 6.8**
- Palecek, E., Tkac, J., Bartosik, M., Bertok, T., Ostatna, V., Palecek, J.: Electrochemistry of Nonconjugated Proteins and Glycoproteins. Toward Sensors for Biomedicine and Glycomics, *Chemical Reviews*, 115(5): 2045-108. **IF = 46.6**, citations = 17

International collaborations

- Prof. H. Riezman, Biozentrum of the University of Basel, Basel, Switzerland
- Dr. T.M. Jovin, Max Planck Institute for Biophysical Chemistry, Gottingen, Germany
- Prof. C.M. Sanderson, Liverpool University, Liverpool, United Kingdom
- Dr. S. Gruber, Max Planck Institute of Biochemistry, Munchen, Germany
- Prof. A.R. Lehmann, Prof. A.J. Doherty, Dr. A.W. Oliver, Dr. J.M. Murray, Dr. F.Z. Watts, University of Sussex, Brighton, United Kingdom

(only those international collaborations that resulted in the joint paper are listed)