

Curriculum Vitae

Personal Information	Name	Piotr Suder	Gender	male				
	Academic Title	Professor						
	College	Department of Analytical Chemistry and Biochemistry, Faculty of Materials Science and Ceramics, AGH University of Science and Technology						
	Discipline	Life sciences, biochemistry						
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Educational Background	1. M.Sc. in Protection of Environment (Faculty of Chemistry, Jagiellonian University, 1999) 2. M.Sc. in Biology (Faculty of Biology and Earth Sciences, Jagiellonian University, 2000) 3. Ph.D. in Chemistry (Faculty of Chemistry, Jagiellonian University, 2001) 4. Habilitation in biochemistry (Faculty of Biochemistry, Biophysics and Molecular Biology, Jagiellonian University, 2011) 5. Professor of Life Sciences/Biochemistry (after recommendation of Faculty of Biochemistry, Biophysics and Molecular Biology, Jagiellonian University, 2020)							
Working Experience	1. M.Sc. student/Ph.D. student/assistant/adjunct at the Faculty of Chemistry, Jagiellonian University (1997-2010) 2. Adjunct/Assistant Professor/Professor at the Faculty of Material Sciences and Ceramics, AGH University of Science and Technology (also positions of Head and Vicehead of the Department) 3. Short stays in Shimadzu Headquarters Europe (Duisburg, Germany) and Bruker-Daltonics Europe (Bremen, Germany) 4. Stay at the Pharmacodynamics Department, Medical University of Lublin, Poland							
Research Interests	1. Enzymology of the central nervous system 2. Effects of the drugs of addiction (eg. morphine model) on the proteome and lipidome of the central nervous system (behavioral analyses on rats, cellular models, etc.) 3. Interaction between viral world (flaviviruses) and eukaryotic cells: especially influence of non-structural (NS) viral proteins on the cellular proteome 4. Instruments and assays routinely used: biological mass spectrometry:ESI/nanoESI/MALDI ion sources, separation techniques with MS-based detection (LC-MS/MS, nanoLC-MS/MS), proteomics, cell culturing (primary neural and astrocytic, cell lines), PAGE, Western Blotting, others, MALDI-imaging mass spectrometry							
Major Publications*	1. Bodzon-Kulakowska A, Suder P. Imaging mass spectrometry: Instrumentation, applications, and combination with other visualization techniques. Mass Spectrom Rev. 2016; 35(1):147-169; doi: 10.1002/mas.21468 2. Bodzon-Kulakowska A, Marszalek-Grabska M, Antolak A, Drabik A, Kotlińska JH, Suder P. Comparison of two freely available software packages for mass spectrometry imaging data analysis using brains from morphine addicted rats. Eur J Mass Spectrom (Chichester). 2016;22(5):229-233. 3. Drabik A, Ner-Kluza J, Bodzon-Kulakowska A, Suder P. Protocol: MYTHBUSTERS: a universal procedure for sample preparation for mass spectrometry. Eur J Mass Spectrom (Chichester). 2016;22(5):269-273. 4. Drabik A, Bodzon-Kulakowska A, Suder P. , Silberring J, Kulig J, Sierzega M. Glycosylation Changes in Serum Proteins Identify Patients with Pancreatic Cancer. J Proteome Res. 2017 Apr 7;16(4):1436-1444 5. Antolak A, Bodzon-Kulakowska A, Cetmarska E, Pietruszka M, Marszalek-Grabska M, Kotlińska J, Suder P. Proteomic Data in Morphine Addiction Versus Real Protein Activity: Metabolic Enzymes. J Cell Biochem. 2017 Apr 21. doi: 10.1002/jcb.26085 6. Bodzon-Kulakowska A, Antolak A, Drabik A, Marszalek-Grabska M, Kotlińska J, Suder P. Brain lipidomic changes after morphine, cocaine and amphetamine administration - DESI - MS imaging study. Biochim Biophys Acta. 2017 Jul;1862(7):686-691. doi: 10.1016/j.bbap.2017.04.003 7. Tejchman W, Korona-Głowniak I, Malm A, Zylewski M, Suder P. Antibacterial properties of 5-substituted derivatives of rhodanine-3-carboxyalkyl acids. Med Chem Res. 2017;26(6):1316-1324. doi: 10.1007/s00044-017-1852-7							

	<p>8. Bodzon-Kulakowska A., Paruch M., Drabik A., Suder P. From Proteomic Studies to Molecular Pathways - Proteins Involved in Response to Methamphetamine Administration. Current Proteomics, 2017; 14(4); 277-286</p> <p>9. Marszalek-Grabska M., Gibula-Bruzda E., Bodzon-Kulakowska A., Suder P., Gawel K., Talarek S., Listos J., Kedzierska E., Danysz W., Kotlinska J.H. ADX-47273, a mGlu5 receptor positive allosteric modulator, attenuates deficits flexibility induced by withdrawal from “binge-like” ethanol exposure in rats. Behav. Brain Res. 2018; 338: 9-16</p> <p>10. Stączek S., Zdybicka-Barabas A., Mak P., Sowa-Jasiłek A., Kedracka-Krok S., Jankowska U., Suder P., Wydrych J., Grygorczuk K., Jakubowicz T., Cytryńska M. Studies on localization and protein ligands of Galleria mellonella apolipophorin III during immune response against different pathogens. J Insect Physiol. 2017, 28;105:18-27</p> <p>11. Marszalek-Grabska M., Gibula-Bruzda E., Bodzon-Kulakowska A., Suder P., Gawel K., Filarowska J., Listos J., Danysz W., Kotlinska J.H. Effects of the Positive Allosteric Modulator of Metabotropic Glutamate Receptor 5, VU-29, on Impairment of Novel Object Recognition Induced by Acute Ethanol and Ethanol Withdrawal in Rats. Neurotox Res. 2018, 33(3): 607-620. DOI: 10.1007/s12640-017-9857-z.</p> <p>12. Bodzon-Kulakowska A., Padrtova T., Drabik A., Ner-Kluza J., Antolak A., Kulakowski K., Suder P. Morphinome Database - The database of proteins altered by morphine administration - An update. J Proteomics. 2019; 6; 190: 21-26; DOI: 10.1016/j.jprot.2018.04.013.</p> <p>13. Gruba N., Rodriguez-Martinez J.I., Grzywa R., Wysocka M., Skoreński M., Dabrowska A., Łęcka M., Suder P., Sieńczyk M., Pyrć K., Lesner A. One Step Beyond: Design of Substrates Spanning Primed Positions of Zika Virus NS2B-NS3 Protease. ACS Med. Chem. Lett. 2018, 9 (10), pp 1025-1029</p> <p>14. Milewska A., Ner-Kluza J., Dabrowska A., Bodzon-Kulakowska A., Pyrc K.A., Suder P. Mass Spectrometry in Virological Sciences. Mass Spectrom Rev. 2019 (accepted 15.12.2019) DOI 10.1002/mas.21617</p> <p>15. Tejchman W., Korona-Głowniak I., Kwiecińiewski L., Zeslawski E., Nitek W., Suder P., Zylewski M., Malm A. Antibacterial properties of 5-substituted derivatives of rhodanine-3-carboxyalkyl acids. Part II. Saudi Pharm. J. 2020, (4): 414-426; DOI 10.1016/j.jsps.2020.02.002</p> <p>16. Bodzon-Kulakowska A., Arena R., Mielczarek P., Hartman K., Kozol P., Gibula-Tarłowska E., Wrobel T.P., Gasior L., Polanski Z., Ptak G.E., Suder P. Mouse single oocyte imaging by MALDI-TOF MS for lipids. Cytotechnology, 2020, (3): 455-468; DOI 10.1007/s.10616-020-00393-9</p>
Research Projects*	<p>1. Zika virus NS3 protease, 1.8 mln PLN, Leader: Jagiellonian Univ, Cooperant: AGH, years 2016-2020</p> <p>2. A multimodal MALDI mass spectrometry imaging approach for the study of molecular changes caused by morphine administration, 0,7 mln PLN, Leader: AGH (PI Anna Bodzon-Kulakowska)</p>
Professional Membership	<p>1. Ministry of Science expert: assessment of implementation doctorates programme.</p> <p>2. National Science Centre expert: grant projects assesment in editions 2016/2018/2019</p>
Potential Research Projects**	<p>Potential research projects in the fields of:</p> <p>1. Chemistry of the central nervous system (neuropeptides activity, drug addiction)</p> <p>2. Viruses-cells interactions</p> <p>3. mass spectrometry imaging in pathophysiology (cancer models, drug addiction, other changes)</p>

* Please list achievements of recent 5 years

** This CV is intended to match Chinese and Polish Scientists within SPUC member universities, and Potential Research Projects is intended to apply for Sino-Polish or EU scientific cooperation projects.