

Curriculum Vitae

Personal information

Name	Ondřej Hodek
Date of birth	October 26, 1990
Place of birth	Stod, Czech Republic
Contact	hodeko3@gmail.com
Permanent residence	Koterovská 16, Plzeň, Czech Republic
Citizenship	Czech Republic

Education

2015 – present	Charles University in Prague, Faculty of Science, Department of Analytical Chemistry Study program: Analytical chemistry Doctoral thesis: <i>Determination of proteinogenic amino acids by high-performance separation techniques</i>
2013 – 2015	Charles University in Prague, Faculty of Science, Department of Analytical Chemistry Study program: Analytical chemistry Diploma thesis: <i>Characterization of self-assembling molecules and their application in capillary electrophoresis</i> Degree: Master (Mgr.)
2010 – 2013	West Bohemian University in Pilsen, Faculty of Education, Department of Chemistry Study program: Chemistry for education Bachelor thesis: <i>Determination of selected analytes by gas chromatography</i> Degree: Bachelor (Bc.)

Courses taught

Course Advances in separation science (in English)
Laboratory Course on Separation Methods

Grants

2019 – Participating in a project of Technology Agency of the Czech Republic (TAČR, TJ01000451, Industrial research for universal seed and seedlings treatment that protects against fungal, bacterial and other pests)

2013 – 2015 Participating in a project of Czech Science Foundation (GAČR GA-01440S: Chiral supramolecular polymers based on derivatized cyclodextrins as a new environment for capillary separation techniques)

Internships

- April – October 2018** (6 months) Uppsala University, Sweden
prof. Jonas Bergquist
Determination of proteinogenic amino acids in human plasma by UPSFC-MS/MS
Determination of blood cholesterol by UPSFC-MS/MS
Separation of cholesterol oxidation products using GC-MS
- September 2017** (1 month) The North University Center of Baia Mare, Technical University of Cluj Napoca, Romania
prof. Anca Mihaly Cozmuta
Development of novel food packages
- August 2016 - February 2017** (6 months) The City University of New York, USA
prof. Urs Jans
Using the Hard and Soft, Acids and Bases (HSAB) Theory to Predict Organophosphate – Target Interactions.

List of publications

1. Benkovics G, **Hodek O**, Havlíková M, Bosáková Z, Coufal P, Malanga M, Fenyvesi E, Darcsi A, Beni S, Jindřich J. Supramolecular structures based on regioisomers of cinnamyl- α -cyclodextrins – new media for capillary separation techniques. *Beilstein J Org Chem.* 2016;12:97-109.
2. Taraba L, Křížek T, **Hodek O**, Kalíková K, Coufal P. Characterization of polyaniline-coated stationary phases by using the linear solvation energy relationship in the hydrophilic interaction liquid chromatography mode using capillary liquid chromatography. *J Sep Sci.* 2017;40:677-687.

3. **Hodek O**, Křížek T, Coufal P, Ryšlavá H. Design of experiments for amino acid extraction from tobacco leaves and their subsequent determination by capillary zone electrophoresis. *Anal Bioanal Chem.* 2017;409:2383-2391.
4. **Hodek O**, Křížek T, Coufal P, Ryšlavá H. Online screening of alpha-amylase inhibitors by capillary electrophoresis. *Anal Bioanal Chem.* 2018;410:4213-4218.
5. Taraba L, Křížek T, Kozlík P, **Hodek O**, Coufal P. Protonation of polyaniline-coated silica stationary phase affects the retention behavior of neutral hydrophobic solutes in reversed-phase capillary liquid chromatography. *J Sep Sci.* 2018;41:2886-2894.
6. **Hodek O**, Jans U, Lijia Y, Křížek T. Chlorpyrifos-methyl oxon hydrolysis and its monitoring by HPLC-MS/MS. *Monatsh Chem.* 2018;149:1515-1519.

List of conference contributions

1. Hodek O, Bosáková Z, Křížek T, Coufal P, Benkovic G. *Application of self-assembling α -cyclodextrin derivatives in capillary electrophoresis.* HPLC 2015, Rožnov pod Radhoštěm, Czech Republic. Oral presentation
2. Hodek O, Křížek T. *Determination of biogenic amino acids in tobacco plant leaves by capillary electrophoresis.* Cycle of Lectures for Collaborating Czech Universities "Perspektivy v analytické chemii 2016". University of Chemistry and Technology, Prague, Czech Republic. Oral presentation
3. Hodek O, Křížek T, Coufal P, Ryšlavá H. *Design of experiments for amino acid extraction from nicotiana tabacum and their subsequent determination by capillary zone electrophoresis.* ITP 2016, Minneapolis, USA. Poster presentation
4. Hodek O, Křížek T, Ryšlavá H, Coufal P. *Enzymatic reaction of α -amylase with starch and its monitoring by an online capillary electrophoresis method.* 13th International Students Conference "Modern Analytical Chemistry", 2017, Prague, Czech Republic. Oral presentation
5. Hodek O, Křížek T, Ryšlavá H, Coufal P. *An online electrophoresis method for monitoring of potential α -amylase inhibitors.* 2nd International Caparica Christmas

Congress on Translational Chemistry IC₃TC, 2017, Caparica, Portugal. Poster presentation

Membership

Czech Chemical Society – *member* – professional association of Czech chemists

Prague, April 2019