

INFORMAȚII PERSONALE

Norbert-Botond MIHÁLY



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Sex Masculin | Data nașterii 09/10/1995 | Cetățenie Română

EDUCAȚIE

- 2020-2024 **PhD**  
Babeș-Bolyai University, Doctoral School of Chemical Engineering, Cluj-Napoca, RO 400018
- 2018-2020 **MSc**  
Babeș-Bolyai University, Faculty of Chemistry and Chemical Engineering Cluj-Napoca, RO 400018  
▪ ICAP
- 2014-2018 **BSc**  
Babeș-Bolyai University, Faculty of Chemistry and Chemical Engineering Cluj-Napoca, RO 400018  
▪ CISOPC
- 2010-2014 **BAC**  
Bolyai Farkas High School, Târgu Mureș, RO 540064  
▪ Științele naturii - intensiv engleză

COMPETENȚE PERSONALE

Limba maternă Maghiară

Alte limbi	ÎNȚELEGERE		VORBIT		SCRIS
	Ascultare	Citire	Interacțiunea vorbită	Producție vorbită	
Engleză	C2	C2	C2	C2	C2
Cambridge Certificate of Proficiency in English					
Română	C2	C2	C2	C2	C2
Vorbitor nativ					

Levels: A1/A2: Basic user - B1/B2: Independent user - C1/C2 Proficient user  
[Common European Framework of Reference for Languages](#)

Competențe digitale

AUTO-EVALUARE				
Procesarea informației	Comunicare	Creare de conținut	Siguranță	Rezolvarea problemelor
Independent	Independent	Independent	Independent	Independent

- O bună cunoaștere a MATLAB/SIMULINK și a instrumentelor dobândite prin munca de cercetare.
- Utilizator independent al software-ului ChemCAD și Aspen PLUS, experiență dobândită prin munca la universitate.

## Informații adiționale

## Prezentări

- Prezentarea lunii la “Erdélyi Múzeum Egyesület” 30.05.2019.

 Conferințe  
Premii

- Prezentare orală la “XIV<sup>th</sup> International Conference Students for Students”, 26-30.04.2017.
- Cea mai bună prezentare de nivel licență la “XIV<sup>th</sup> International Conference Students for Students”, 26-30.04.2017.
- Prezentare poster la “XXIII. Nemzetközi Vegyészkonferencia”, 25-28.10.2017.
- A 2-a cea mai bună prezentare la “XXIII. Nemzetközi Vegyészkonferencia”, 25-28.10.2017.
- Premiu special la “XXIII. Nemzetközi Vegyészkonferencia”, 25-28.10.2017.
- Prezentare orală la “Erdélyi Természettudományi Konferencia 2017”, 25.11.2017
- Prezentare orală la “XV<sup>th</sup> International Conference Students for Students”, 18-22.04.2018.
- Prezentare orală la “XX. Műszaki Tudományos Diákköri Konferencia”, 26-28.04.2018.
- Cea mai bună prezentare la “XX. Műszaki Tudományos Diákköri Konferencia”, 26-28.04.2018.
- Prezentare poster la “XXIV. Nemzetközi Vegyészkonferencia”, 24-27.10.2018.
- Cea mai bună prezentare la “XXIV. Nemzetközi Vegyészkonferencia”, 24-27.10.2018.
- Prezentare orală la “Erdélyi Természettudományi Konferencia 2018”, 24.11.2018.
- Prezentare orală la “XXXIV. Országos Tudományos Diákköri Konferencia”, 21-23.03.2019.
- Prezentare orală la “XVI<sup>th</sup> International Conference Students for Students”, 3-7.04.2019.
- Cea mai bună prezentare de nivel master la “XVI<sup>th</sup> International Conference Students for Students”, 3-7.04.2019
- Prezentă la conferința “Next Generation” al institutului STAR, 12-14.07.2019.
- Prezentare orală la 16<sup>th</sup> SDEWES Conference in Dubrovnik, Croatia, 10-15.10.2021.
- Prezentare orală la IEEE International Conference on Automation, Quality and Testing, Robotics, Cluj-Napoca, Romania, 19-21.05.2022.
- Prezentare orală la 32nd European Symposium on Computer-Aided Process Engineering (ESCAPE-32), Toulouse, France, 12-15.06.2022.
- Prezentare orală la 17<sup>th</sup> SDEWES Conference in Paphos, Cyprus, 6-10.11.2022.
- Prezentare orală la 33<sup>rd</sup> European Symposium on Computer-Aided Process Engineering (ESCAPE-33), Athens, Greece, 18-21.06.2023.
- Prezentare orală la 34<sup>th</sup> European Symposium on Computer-Aided Process Engineering (ESCAPE-34), Florence, Italy, 02-06.06.2024.

- Voluntariate**
- Volunteered at the faculties open days “Zilele Porților Deschise la Facultatea de Chimie și Inginerie Chimică”, 20.10.2018.
  - Volunteered at the faculties open days “Zilele Porților Deschise la Facultatea de Chimie și Inginerie Chimică”, 19.10.2019
  - Volunteered at the faculties open days “Zilele Porților Deschise la Facultatea de Chimie și Inginerie Chimică”, 22.10.2022
  - Volunteered at the faculties open days “Zilele Porților Deschise la Facultatea de Chimie și Inginerie Chimică”, 21.10.2023
- Burse**
- Bursă Erasmus+ Mobility la University of Pannonia, Hungary, 10.02.2020-10.04.2020.
- Proiecte**
- Advanced (multi)-enzymatic synthesis and purification processes for biobased furan derivatives – ASPIRE, National Authority for Scientific Research and Innovation (ANCSI), Project code: CF 25/14.11.2022;
- Publicații**
- Mihály, N. B., Luca, A. V., Simon-Várhelyi, M., & Cristea, V. M. (2023). Improvement of air flowrate distribution in the nitrification reactor of the waste water treatment plant by effluent quality, energy and greenhouse gas emissions optimization via artificial neural networks models. *Journal of Water Process Engineering*, 54. <https://doi.org/10.1016/j.jwpe.2023.103935>
  - Mihály, N. B., Simon-Várhelyi, M., & Cristea, V. M. (2022). Data-driven modelling based on artificial neural networks for predicting energy and effluent quality indices and wastewater treatment plant optimization. *Optimization and Engineering*, 23, 2235–2259. <https://doi.org/10.1007/s11081-022-09724-5>
  - Luca, A. V., Simon-Várhelyi, M., Mihály, N. B., & Cristea, V. M. (2021). Data driven detection of different dissolved oxygen sensor faults for improving operation of the WWTP control system. *Processes*, 9(9). <https://doi.org/10.3390/pr9091633>
  - Luca, A. V., Simon-Várhelyi, M., Mihály, N. B., & Cristea, V. M. (2023). Fault Type Diagnosis of the WWTP Dissolved Oxygen Sensor Based on Fisher Discriminant Analysis and Assessment of Associated Environmental and Economic Impact. *Applied Sciences (Switzerland)*, 13(4). <https://doi.org/10.3390/app13042554>
  - Mihály, N.-B., Luca, A.-V., & Cristea, V. M. (2023). Artificial neural networks-based identification of the WWTP DO sensor types of faults (pp. 1879–1884). <https://doi.org/10.1016/B978-0-443-15274-0.50298-5>
  - Mihály, N.-B., & Cristea, V. M. (2022). Optimization of the Wastewater Treatment Plant Aeration Using Artificial Neural Networks Models (pp. 1375–1380). <https://doi.org/10.1016/B978-0-323-95879-0.50230-7>
  - Mihály, N.-B., Simon-Várhelyi, M., Luca, A.-V., & Cristea, V.-M. (2022). Optimization of the Wastewater Treatment Plant Recycle Flowrates Using Artificial Neural Networks. 2022 IEEE International Conference on Automation, Quality and Testing, Robotics (AQTR), 1–6. <https://doi.org/10.1109/AQTR55203.2022.9801979>