

# The International Scientific Conference on Neurodegenerative Disorders and the Gut - Brain Axis

## Day 1

Date: April 8<sup>th</sup>, 2025

Location: Nicolaus Copernicus University in Toruń, Wileńska 4 Str., 87-100 Toruń

Duration: 10:45-20:00

09:00-10:30 REGISTRATION

10:45-11:00 CONFERENCE OPENING

- Welcoming of Participants
- Presentation of the Conference Agenda
- Brief introduction to the Conference Topic

### PLENARY SESSION 1: The Present & The Future Of Neurotechnology Approach

Moderators: Dr. Aleksandra Wypych, Dr. Paweł Pomastowski, DSc.

11:00-11:30 KL-1 Neurotechnology Approach using Passive BCI: AI for Social Good in Early Dementia Detection Neurobiomarkers  
Speaker: Dr. Tomasz Rutkowski

11:30-12:00 KL-2 MRI-Based Neuroimaging for Early Diagnosis of Neurodegenerative Disorders  
Speaker: MSc. Jan Nikadon

12:00-12:30 KL-3 MALDI Imaging applications in clinical and research fields  
Speaker: Dr. Daniel Vláčil

12:30-13:30 LUNCH BREAK

### PLENARY SESSION 2: Brain Aging and Neurodegenerative Diseases

Moderators: Prof. Piotr Młynarz, Dr. Paweł Pomastowski, DSc.

13:30-14:00 KL-4 Brain Aging and Neurodegenerative Diseases  
Speaker: Agnieszka Gajda, MD

14:00-14:30 KL-5 Challenges in Biomarker Analysis: SiMoA (Single Molecule Array) Makes The Tiny but Significant Difference  
Speaker: Prof. Iwona Kurkowska-Jastrzębska

### PLENARY SESSION 3: Nutrition & Diagnosis

Moderators: Prof. Barbara Bojko, Dr. Aleksandra Wypych

14:30-15:00 KL-6 The Impact of Nutrition on Brain Health  
Speaker: Prof. Ewa Stachowska

15:00-15:30 KL-7 Amino Acid Profiling as a Biomarker for Diagnosis of Neurodegenerative Diseases  
Speaker: Prof. Nuray Yazihan

15:30-16:00 KL-8 Investigating the impact of lactate transport pathway between astrocytes and neurons on cognitive decline during aging: perspectives  
Speaker: Prof. Piotr Młynarz

16:00-16:30 Coffee Break

## PLENARY SESSION 4: The Therapies of Tomorrow

Moderators: Dr. Aleksandra Wypych, Dr. Paweł Pomastowski, DSc.

16:30-17:00 **KL-9 Intestinal Microbiota and Gut-Brain Axis**  
Speaker: Prof. Fermin Ignacio Milagro Yoldi

17:00-17:30 **KL- 10 Solid Phase Microextraction: Promising Tool in Brain Studies In Vivo**  
Speaker: Prof. Barbara Bojko

17:30-20:00 **Social Event – Welcome Party – Award for the Best Poster Presentations**

## Day 2

**Date:** April 9<sup>th</sup>, 2025

**Location:** Nicolaus Copernicus University in Toruń, Wileńska 4 Str., 87-100 Toruń

**Duration:** 09:00-13:00

## WORKSHOPS

9:00-10:30 **Workshops – Part One**  
1<sup>st</sup> Group/ 2<sup>nd</sup> Group

10:30-11:00 **COFFEE BREAK**

11:00-12:30 **Workshops – Part Two**  
2<sup>st</sup> Group/ 1<sup>nd</sup> Group

12:30-13:00 **CONFERENCE CLOSING**