

Schedule of Open Scientific Lectures in 2025
Department of Automation, Biomechanics, and Mechatronics (K11), Room 2M334
Faculty of Mechanical Engineering of TUL

| DATE | TIME | SPEAKER | LECTURE TITLE |
|-----------------|--------------|---|---|
| 11.March | 12:00 | Paweł Olejnik | <i>Estimating the static friction law of a kinematically forced double torsion pendulum using PINNs ¹</i> |
| 18.March | 12:15 | Adam Wijata | <i>Wykorzystanie narzędzi sztucznej inteligencji w pracy naukowca ²</i> |
| 25.March | 12:05 | Majid Shahgholi | <i>HOT TOPICS IN SCIENCE AND TECHNOLOGY (W1): Chaotic and Nonlinear Vibrations in Continuous Rotating Systems with Active Magnetic Bearings (AMB) ¹</i> |
| 8.April | 12:15 | Bartosz Stańczyk | <i>Innowacje w druku 3D: najnowsze trendy i technologie²</i> |
| 29.April | 12:15 | Sayed M.M. Najafabadi | <i>Examining the Impact of Visual Perturbation Caused by Virtual Reality on Postural Stability ¹</i> |
| 6.May | 12:15 | Bipin Balaram | <i>Filippov Method for Non-Smooth Systems ¹</i> |
| 13.May | 12:15 | Yared D. Desta | <i>On the Relationships Between Friction-Induced Acoustic Waves and Vibrations: A Review with an Illustrative Experiment ¹</i> |
| 20.May | 12:15 | Muhammad J.U. Rehman | <i>Nonlinear Dynamics of 2DOF Mechanical Oscillators: Interactions of Parametric Excitation and Dry Friction¹</i> |
| 27.May | 12:15 | Paul Asir | <i>Physics in Automation and Biomechanics ¹</i> |
| 3.June | 12:15 | Muhammad Umer | <i>Challenges and Solutions in Analytical Approaches for Nonlinear Systems ¹</i> |
| 10.June | 11:30 | Mohammad P. Rezaei Mia Loccufier Kevin Dekemele | <i>Nonlinear Hencky's Beam Model For Beam Structures¹ Presentation of the Dynamical Systems and Control (DySC) research group at Ghent University¹ Exploiting nonlinearity in vibration control devices¹</i> |
| 17.June | 12:15 | Ali Fasihi | <i>Dynamics of Fluid Conveying Pipe ¹</i> |

¹ English-language presentations will be prepared also for English-speaking guests of the department.

² Polish-language presentation.