



**2025 KSBNS  
Symposium 46**

**Title: Emerging Mechanisms in White Matter Injury: Autoimmunity,  
Vascular Dysfunction, and Lipid Metabolism**

**August 27th (Wednesday), 09:00-10:55**

**Grand Ballroom, Songdo CONVENIA, Incheon, Korea**

**Registration [KSBNS2025.org](https://KSBNS2025.org)**

**Organizer**



**Sun Ah Park**

*Lab for Neurodegenerative Dementia, Department of Anatomy, and Department of Neurology, Ajou University School of Medicine, Korea*

This session is for expanding the focus on translational and clinical neuroscience, fostering collaboration between the Korean Neurological Association (KNA) with KSBNS. While covering a range of neurological disorders, it emphasizes white matter injury and its diverse mechanisms.

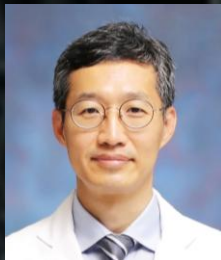
**Speakers**



**Young Nam Kwon**

*Department of Neurology, Yonsei University College of Medicine,  
Title: "CNS Autoimmune Diseases involving White Matter"*

Prof. Kwon is an expert in the clinical and research field of autoimmune-related central and peripheral nervous system disorders. His talk will broaden perspectives on autoimmune-related white matter disorders and highlighting emerging research challenges in this field.



**Jay Chol Choi**

*Department of Neurology, Jeju National University Hospital, Korea  
Title: "Hereditary Vascular Dysfunctions Resulting in White Matter Ischemic Disorders"*

Prof. Choi has dedicated his research and clinical work to hereditary brain ischemic disorders, particularly CADASIL. He has established a large and well-characterized cohort at Jeju National University, through which various genetic risk factor and causes of brain vascular dysfunction have been actively investigated.



**Jun Young Choi**

*Stanford University School of Medicine, USA; Department of Neurology and Brain Science, Ajou University School of Medicine, Korea  
Title: "Survival signaling pathways of oligodendrocyte lineage cells in ischemic white matter injury"*

Prof. Choi is a renowned neuroscientist and neurologist in Korea, recognized for his pioneering research on oligodendrocytes in the field of epilepsy and neuronal cell death. His talk will focus on the molecular mechanisms of ischemic white matter injury, particularly the HMGB1-TLR2 axis.



**Zeng Li**

*National Neuroscience Institute, Singapore; Duke-NUS Medical School, Singapore  
Title: "Dysfunction of lipid metabolism in astrocytes as emerging mechanism in Alzheimer's disease"*

Prof. Li has been the senior author of numerous high impact publications. Her research focuses on developing patient-derived cerebral organoid models to uncover disease mechanisms and therapeutic strategies for Alzheimer's disease. She specializes in studying brain cell to cell interactions using integrated transcriptomic and lipidomic analyses.