

## AUTOIMMUNE UNDERPINNINGS OF PSYCHOSIS

One of the most well-known autoantibodies with targets in the brain is the anti-NMDAR antibody, which targets the NMDA receptor (NMDAR) that is found on excitatory neurons in the brain. When present, this autoantibody prompts neurons to engulf NMDARs and reduces these receptors' numbers at the synapse. This dearth of NMDARs, in turn, causes problems in synaptic transmission that underlie a range of neuropsychiatric symptoms such as hallucinations, delusions, seizures, and movement abnormalities. Researchers have pinpointed more than two dozen other brain-targeting antibodies, most of which are found in patients with autoimmune disease of the central nervous system. The role these antibodies play in psychiatric illnesses such as schizophrenia is the subject of active investigation.

