

SCHIZOPHRENIA Factsheet

What is N100 event-related potential?

The N100 is a negative waveform that peaks at approximately 100 milliseconds after stimulus presentation. Its amplitude is measured using electroencephalography (EEG) and may be dysfunctional in people with schizophrenia who show an inability to "gate" or inhibit irrelevant sensory information, ultimately leading to conscious information overload. To test this, paired auditory clicks are presented, separated by a short interval, usually of 0.5 seconds. The first click initiates or conditions the inhibition, while the second (test) click indexes the strength of the inhibition. An absence of a reduced response to the second stimulus is interpreted as a failure of inhibitory mechanisms, postulated to represent a defect in sensory gating.

What is the evidence for N100 event-related potential?

Moderate to high quality evidence finds a medium-sized reduction in N100 amplitude to the first stimulus, but not to the second stimulus. Review authors suggests this reflects a deficit in processing of auditory salience rather than in inhibition.

NeuRA Discover, Conquer, Cure.

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NeuRA (Neuroscience Research Australia) is one of the largest independent medical and clinical research institutes in Australia and an international leader in neurological research.

Diseases of the brain and nervous system pose the greatest health, economic and social burden of any disease group because they are chronic, debilitating and have no known cures.

Medical research is the cornerstone of efforts to advance the health and wellbeing of families and the community. Our dedicated scientists are focussed on transforming their research into significant and practical benefits for all patients.

While we hope you find this information useful, it is always important to discuss any questions about schizophrenia or its treatment with your doctor or other health care provider.

For more information see the technical table

HOW YOUR SUPPORT HELPS

We are able to make significant advances due to the generosity of countless people. Your donation allows us to continue to work towards transforming lives. For information on how you can support our research, phone **1300 888 019** or make a secure donation at **neura.edu.au/donate/schizophrenia**.

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