



# NeuRA

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## SCHIZOPHRENIA Factsheet

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### What is the ventricular system?

The ventricular system of the brain functions to provide support to surrounding tissues with cerebrospinal fluid (CSF), produced in the choroid plexus tissue lining many of the ventricles. The system comprises the bilateral cerebral lateral ventricles, the midline third and fourth ventricles, and the central canal of the spinal cord. The lateral ventricles have four sections, the frontal (anterior) horns; temporal (inferior) horns; body; and occipital (posterior) horns. The interventricular foramen connects the lateral ventricles to the third ventricle, and the cerebral aqueduct connects the third ventricle to the fourth. The fourth ventricle is continuous with the central canal in the spinal cord, as well as three subarachnoid foramina allowing CSF to surround the brainstem and cortices.

### What is the evidence for changes in the ventricular system?

Moderate to high quality evidence found increased ventricular and CSF volume in people with schizophrenia compared to controls. Moderate to low quality evidence also found increased ventricular volume in children with schizophrenia. Larger ventricular volume was associated with poorer overall functioning.

Moderate to high quality evidence found increases in lateral and third ventricle volume, but not CSF, over time (4-520 weeks from baseline), which was not explained by antipsychotic use or duration of illness.

For more information see the technical table



## NeuRA

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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.*

### 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](http://neura.edu.au/donate/schizophrenia).