

Motor neurone disease

What is motor neurone disease?

Motor neurone disease (MND), also known as amyotrophic lateral sclerosis (ALS), is a progressive neurodegenerative disease that leads to rapidly increasing physical disability due to muscle weakness, wasting and paralysis. It is caused by the unexplained death of specialised nerve cells called motor neurons in the brain and spinal cord controlling movement, speech, swallowing and breathing. Most cases are fatal within 2-5 years from diagnosis.

One person is diagnosed with MND every 12 hours and one person dies from MND every 12 hours in Australia

Diagnosis

MND relies on clinical diagnosis by neurologist and can be notorious, taking 1-2 years from initial presentation of symptoms. There is no definitive blood test to diagnose MND.

Treatment

There are currently no effective treatments or cure for MND. There is one clinically approved medication called Riluzole which may extend lifespan by 2-3 months.

Research

There has been steady progress in identifying genetic factors that cause or predispose people to MND. This has resulted in a large number of genetically engineered models to test new treatment approaches for MND.

The Florey has an outstanding program of research in MND using patient tissue, models and motor neurones grown in the Petri dish. Our research

using cutting edge techniques spans key areas in MND, including protein metabolism, energy metabolism, support cells, immune cells, gene and stem cell therapy approaches. We have a strong focus on drug discovery and trials in mice with the ultimate goal to develop effective treatments and a cure for MND.

Prevalence

MND affects 450,000 people and results in 100,000 deaths per year world-wide. In Australia, 1,900 people currently have MND.

Support & information services

Please note that diagnosis and treatment of a clinical condition can only be undertaken by a qualified mental health professional. Listed below are some support services only. Always seek the advice of a qualified health professional with any questions regarding your health or a medical condition.

A number of support and information services exist to help people who experience MND, and their families and friends.

Motor Neurone Disease Association of Victoria
<https://www.mnd.asn.au/>

Ph:1800 777 175

MND Care site
For health and community care professionals involved in the wellbeing and care of MND patients.
www.mndcare.net.au

The Florey's mission

To improve lives through brain research.

Enquiries: info@florey.edu.au

Donations: 1800 063 693

Note: Statistics were obtained from the Motor Neurone Disease Association of Australia and ALS Therapy Development Institute.