

# What the heck is...mitochondrial disease?



## Would you know what it means to have yourself or a child of yours diagnosed with it???



Yet...recent research has demonstrated that what was once thought to be rare (one in 20,000 people), actually affects up to **one in 250 people (100,000 Australians)**.

Many are undiagnosed, at risk of developing the disease or of passing it onto their children. There are very few effective treatments and no known cure for mitochondrial disease. Whilst many sufferers experience muscle weakness and pain, other symptoms may include loss of motor and nerve control, hearing or vision loss, seizures, strokes, developmental delays, dementia, poor growth, diabetes, heart disease, gastrointestinal disorders, swallowing difficulties, or susceptibility to infection.

It is a genetic disorder that affects both children and adults, male and female, and is generally progressive and hence fatal.

The mitochondrion is a small part of the cell whose main function is to provide energy for the cell. Thus, mitochondria act like the “batteries” for the cell, and mitochondrial disease occurs when their function is impaired. This inadequate energy for the cell to function therefore causes cell injury, and even cell death may follow. Whole organs can begin to fail, and the life of the person is severely compromised.

Mitochondria are most plentiful in tissues that require lots of energy, hence most damage is to the cells of the muscles, brain, heart, liver, ears and eyes. Mitochondrial disease is difficult to diagnose and treat due in part to the widespread type and severity of symptoms, and the fact that there are up to

100 known sub-groups. Every 30 minutes around the world a child is born who will develop a mitochondrial disease by age 10 (estimated 1 in every 4,000 births).

Set up by friends and family members of sufferers, the Australian Mitochondrial Disease Foundation aims to fund essential research into the diagnosis, treatment and cure of mitochondrial disorders, and to provide support to affected individuals and families.

Mitochondrial disease frequently comes unannounced, as it did with Tom, Kara, Rose and Peter. Please read their stories on the AMDF website ([www.amdf.org.au](http://www.amdf.org.au)), to help gain further insight into this horrible illness.

We need to raise the awareness and much needed funds for Mitochondrial Disease, this little known genetic disorder that robs you of your energy and your life. If you **are** unable to donate, then **please** simply log on to learn and understand more about it....**that already helps!!!!**



# STAY IN BED DAY

**Watch out for our next “Stay in Bed Day” event due again in August 2010. Be part of the fun, start training now or get a PJ party organized!!**

