Cannabis-based medicine to be tested as child epilepsy therapy

Children with severe epilepsy could be helped by a new treatment derived from the cannabis plant.

Doctors in the UK have been given the go-ahead to test the medicine, which does not contain the ingredient that produces the high associated with recreational cannabis use.

The treatment – called Epidiolex – is based on one of the non-psychoactive components of the cannabis plant, called CBD.

Early studies in the US have shown that treatment with CBD may reduce the frequency and severity of seizures in children with severe forms of epilepsy. The new trial marks the first time the treatment has been tested in the UK.

Patients are being enrolled for a randomised controlled trial of the treatment at The University of Edinburgh’s Muir Maxwell Epilepsy Centre, based at the Royal Hospital for Sick Children in Edinburgh, and Great Ormond Street Hospital.

The Royal Hospital for Sick Children in Glasgow and Alder Hey Children’s Hospital in Liverpool are also driving the study. There are further centres in the US, France and Poland.

Their initial focus will be on children with Dravet Syndrome, a rare but serious type of epilepsy that is difficult to treat. Some children will receive the treatment while others will receive a placebo.

In a further phase, researchers will also study the effect on children with Lennox-Gastaut Syndrome.

Only children whose seizures cannot be controlled with existing medications will be invited to take part in the trial.

Dravet Syndrome usually takes hold in the first year of life. It causes seizures that are often prolonged, lasting longer than five minutes. They then develop other seizure types. This has a significant impact on the child’s development and can be fatal in some cases.

Epidiolex has been developed by the British biotechnology company GW Pharmaceuticals, which is sponsoring and funding the trial.
Dr Richard Chin, Director of the Muir Maxwell Epilepsy Centre, said: “Many children with serious forms of epilepsy do not respond to the medications that we currently have available. We need new means of treating these conditions so that we can give back some quality of life to these children and their families.”

Professor Helen Cross, of Great Ormond Street Hospital and Chief UK clinical investigator of the initial part of the trial, said: “Severe epilepsy can have an incredibly debilitating effect on individuals. These trials will allow us to accurately test the viability of treatment with CBD in a safe and controlled way.”

Ann Maxwell, founder of the paediatric epilepsy charity the Muir Maxwell Trust, said: “I welcome the launch of these trials as it marks an important milestone in our long journey towards understanding the condition and improving the treatment of those suffering this severe form of epilepsy. As the mother of a teenager with this life altering condition, I strongly support the exploration of ground breaking medications that could seek out new ways to improve patients’ life quality.”

Associate Professor, Dr Sameer Zuberi, Clinical Lead of the Glasgow Epilepsy Genetics Service and Epilepsy Specialist, Royal Hospital for Sick Children, Glasgow, said: "The 40,000 children with epilepsy in the UK have many different genetic causes for their seizures. The opportunity to trial new treatments in children with specific gene changes gives families hope for better and more focused therapies."

For further information, please contact:
Jen Middleton, Press and PR Office, University of Edinburgh
Tel 0131 650 6514; Email jen.middleton@ed.ac.uk

Andrew Willard, Press Office, Great Ormond Street Hospital
Tel 020 7239 3043; Email Andrew.Willard@gosh.nhs.uk