## Osteopathy for children with Cerebral Palsy

A randomised controlled trial of the effects of osteopathy on the health and well being of children with cerebral palsy



## **Results Summary**

The trial shows that there is no strong evidence to suggest cranial osteopathy improves health or quality of life of children with Cerebral Palsy.

Research commissioned by Cerebra, the charity that helps to improve the lives of children with brain conditions, and carried out by the Cerebra Research Unit (CRU) at the Peninsula College of Medicine & Dentistry, has found little evidence to suggest that cranial osteopathy is of benefit to children with cerebral palsy.

The research is published on-line in the Archives of Disease in Childhood <a href="http://adc.bmj.com/content/early/2011/02/23/adc.2010.199877.abstract">http://adc.bmj.com/content/early/2011/02/23/adc.2010.199877.abstract</a>

Osteopathy has, over recent years, become a popular complementary treatment for children with cerebral palsy. Cerebra initially asked researchers at the CRU to investigate any existing evidence regarding the benefits of osteopathy in this instance. The research team found no properly conducted scientific studies, with only one small study that showed some improvement after osteopathy therapy – but this had very few participants and no clear conclusions could be drawn from the results.

The lack of existing evidence prompted Cerebra to ask the research team to carry out a large randomised controlled trial in order to provide families with good evidence about the effect of osteopathy for their children with cerebral palsy.

Before the trial was designed, the CRU research team talked in detail to parents and carers of children with cerebral palsy to discuss how they would like the study to be run. This degree of parental involvement in designing a trial is very unusual, but it ensured that the team designed a trial that was acceptable to families and that addressed the issues they wanted to be answered.

The researchers also interviewed osteopaths from the Foundation of Paediatric Osteopathy in London to find out more about the treatment and to help design the trial – the osteopaths who interacted with the research team agreed that the trial was a sensible test of the treatment.

In total, 142 children aged between 5-12 years of age from the South West of England and Greater London were recruited to the trial for a six month period. Children were randomly allocated to either a treatment group where they received osteopathy treatment straight away or a control group: those in the control group were offered six sessions of osteopathy when they had completed the trial. This meant that the research team was able to compare a group of children who had

received treatment with a group who had not, and that all children were offered the opportunity to have the treatment paid for by the trial.

Of the 142 children who were recruited into the trial, 133 remained in the trial for the full six months.

The children were assessed 10 weeks and six months after they started the trial. The main results are those obtained at six months. The researchers found no statistically significant difference between the two groups in terms of a child's movement (which was assessed by physiotherapists who did not know if the child had received osteopathic treatment or not), the child's quality of life, the child's sleeping patterns and the child's level of pain. There was also no difference in the quality of life score for the parents and carers in either group.

The only difference identified by the research team was that twice as many parents whose children had received osteopathy rated their children's overall wellbeing as 'better' compared with those who had not received osteopathy.

Professor Stuart Logan, Cerebra Professor of Paediatric Epidemiology, Director - Institute of Health Service Research and Director - PenCLAHRC, at the Peninsula College of Medicine & Dentistry, commented: "This has been a fantastic experience working so closely with Cerebra in designing and carrying out research which is of importance to their members. It was also a great opportunity to work with osteopaths who are committed to developing the evidence base around their work. None of this could have been done without the whole-hearted support of the families."

He added: "A properly conducted randomised controlled trial, such as this, is the only way to provide reliable, conclusive evidence on the effectiveness of any treatment. We hope that this evidence will be used to help parents and carers make informed decisions about treatment choices for their children. It can also give health professionals the information they need to be able to advise parents about treatments."

Chris Jones, Chief Executive at Cerebra added "It has been an extremely positive experience working with Professor Logan, and the Peninsula College of Medicine & Dentistry. Whilst we would obviously prefer to spend limited resources on finding and proving the positive benefits of any particular treatment – something that will directly improve the lives of children with cerebral palsy – it is also vitally important that we help children, parents and carers better understand what doesn't work as well as what does. Informed and educated decision making is critically important and we hope this research will play a significant part in empowering those people we are here to help."

The research team is extremely grateful to the children and families who took part in the Osteopathy for children with Cerebral Palsy Trial.