

Clinical Neurophysiology Department

Your Child's Sedated EEG

Information for parents and carers

This leaflet provides you with information about your child's sedated sleep EEG. We hope this leaflet answers any questions that you may have. This leaflet will not replace discussions between you and your child's care team; however, it aims to help you understand more about what is discussed. If there is anything that you do not understand, please ask your child's physician.

What is a paediatric sedated sleep EEG?

An electroencephalogram (EEG) is a test that records the electrical activity of the brain. The nerve cells in the brain produce tiny electrical signals and these signals (also called brain waves) can be recorded via electrodes (small disks) placed on the scalp.

The EEG will provide useful information to help your doctor to diagnose and manage your child's problem or condition.

The test is safe and painless. We can perform this test on children of all ages, including newborn babies.

For some children, the EEG can only be performed using sedation. For a full set of electrodes to be applied, your child has to stay still and we appreciate that this may not always be possible due to your child's age or other factors. In these cases, and when a routine EEG attempt has failed, your child may need to be sedated with Melatonin to allow for electrode application and a successful recording.

What is Melatonin?

Melatonin is a hormone that occurs naturally in the body and helps control your sleep patterns. You can take a manmade version of melatonin for short-term sleep problems, such as insomnia, as it makes you fall asleep quicker.

Melatonin is not a strong sedative, and it does not work instantly. It may take up to 20 minutes to work. It promotes sleep and works best in combination with a relaxed and tired state. For this reason, we also ask that you sleep deprive your child prior to the test (please see the details on this below).

Melatonin is a short acting medicine and has no known side effects.

Preparing for the test

- **Please sleep deprive your child before the test by allowing them to sleep for approximately half their usual hours if possible.** For example, this may involve going to bed later and waking up earlier, so they sleep for only four hours instead of a normal eight hours. It is hoped that by doing this your child will fall asleep quicker.
- The person bringing your child to the EEG should have 'Parental Responsibility' (i.e., have legal rights, responsibilities, duties, power and authority to make decisions for the child).
- Please ensure your child's hair is clean and free from hair products such as gel or hairspray.
- Your child can continue to take their medication as normal. Please bring a list of your child's current medication with you to the appointment.
- They can eat and drink as normal.
- Please bring your child in comfortable clothes that they can sleep in during the test. You may also wish to bring a comforter, a story to read, or anything else that may encourage sleep.
- You might wish to bring a brush/comb to tidy their hair or a hat to cover their hair after the test.

During the visit

- You will need to take your child to **St Mary's Hospital, the Queen Elizabeth the Queen Mother (QEQM) Building (Main Building), 7th floor, Westway Ward (Paediatric Ward).**
- A nurse will perform some initial observations and will administer the Melatonin. The Melatonin comes as a liquid that your child can drink.
- A member of the Clinical Neurophysiology team will then come to the ward. They will explain the EEG in detail, ask for your consent for the test and ask some questions about your child's medical history, current clinical events/symptoms and current medication.
- Electrodes will be applied to the scalp using a sticky paste. A few additional electrodes may also be applied to the chest or shoulders to monitor your child's heart rate.
- As previously mentioned, your child will need to stay still for this set-up, so we may need to wait until your child has fallen asleep first. The test lasts between 60-90 minutes and is carried out when your child is asleep. Your child will be woken before the end of the test.

After the test

- After the test, we will remove the electrodes from your child's head and clean their hair to remove the paste. You will need to wash your child's hair when you get home after the test to remove any excess gel and paste.
- The results will not be available to you on the day, as they will need to be analysed.
- A full report will be sent to your child's referring Consultant within one week. Your child may have a follow-up appointment already scheduled with their referring Consultant or an appointment may need to be arranged after the test. The consultant will explain your child's results at the follow-up appointment.

Are there any risks or complications?

- There are no common side effects to an EEG – the electrodes simply read the electrical activity in the brain. It is not painful or invasive.
- Melatonin does not generally cause any side effects. Your child may feel sleepy for a short time after the test. The nurse will ensure your child is well enough to go home after the test.

Contact Us

If you are unable to attend your appointment or have any questions or concerns about your appointment please contact us on:

Clinical Neurophysiology Department, St Marys Hospital: 020 331 26628

We are open Monday to Friday 8am-4pm

How to find us:

All paediatric sedated sleep EEGs are performed at:

St. Marys Hospital: QEQM building, 7th Floor, Westway Ward

Nearest train stations:

- Paddington Station: Approximately 4-5 minutes walk from the station
- Edgware Road station: 7-8 minutes walk from the station

Local buses: 7, 23, 27, 36, 205, 332, 436

Please arrive on time for the appointment. If you are running late, please call us on the appropriate number listed on page 3, otherwise we may have to cancel or reschedule the test.

How do I make a comment about my visit?

We aim to provide the best possible service and staff will be happy to answer any of the questions you may have. If you have any **suggestions** or **comments** about your visit, please either speak to a member of staff or contact the patient advice and liaison service (**PALS**) on **020 3313 0088** (Charing Cross, Hammersmith and Queen Charlotte's & Chelsea hospitals), or **020 3312 7777** (St Mary's and Western Eye hospitals). You can also email PALS at imperial.pals@nhs.net The PALS team will listen to your concerns, suggestions or queries and is often able to help solve problems on your behalf.

Alternatively, you may wish to complain by contacting our complaints department:

Complaints department, fourth floor, Salton House, St Mary's Hospital, Praed Street
London W2 1NY

Email: ICHC-tr.Complaints@nhs.net

Telephone: **020 3312 1337 / 1349**

Alternative formats

This leaflet can be provided on request in large print or easy read, as a sound recording, in Braille or in alternative languages. Please email the communications team:
imperial.communications@nhs.net

Wi-fi

Wi-fi is available at our Trust. For more information visit our website: www.imperial.nhs.uk

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