

Hypoxic Challenge Test

Information for Patients and Carers

Department of Paediatric Cardiac, Respiratory and Sleep Physiology
The Royal Hospital Children and Young People,
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What is a Hypoxic Challenge Test?

Some children with lung problems require a test to see if they require oxygen during a flight. This is because oxygen levels are lower during a flight than on land. The Hypoxic Challenge Test assesses whether you need additional oxygen during a flight.

Your test results are only valid for **4 weeks** before your departure date.

What can I expect?

There are two ways in which a Hypoxic Challenge Test can be done. Option One is generally for babies and toddlers and Option Two is for pre-school children and older.

Option One: You and your child will sit in a booth (like a telephone box). Your child will wear a small probe on their finger/toe, which measures their oxygen levels. While in the booth they will be given a low level of oxygen for 30-40 minutes to simulate the aircraft cabin environment. It may be necessary to give additional oxygen during the test, which would be given through the nose; this may also add time onto the test. Your child **must not feed** and should **ideally be awake** for the duration of the test.

The parent/guardian sitting in the booth should disclose to Physiology staff if they have any respiratory problems.

Option Two: Your child will be required to sit with a small probe on their finger, which measures oxygen levels; they will also be wearing a facemask. The facemask will give a low level of oxygen for up to 20-30 minutes to simulate the aircraft cabin environment. It may be necessary to give them additional oxygen during the test via the facemask.

What do you need to do prior to your appointment?

On the day of your appointment please ensure your child's nails are free from nail varnish including false and gel/acrylic nail enhancements. Continue to take all medication as normal. **If your child is unwell on the day of your appointment please contact us prior to attending.** It does get hot in the booth so wear light clothing. It may be necessary to bring a change of clothes. You can bring a favourite toy or teddy to keep your child entertained.

How long does it take?

Your appointment will last between 1-2 hours.

How do I get my results?

The results will be sent to your consultant, who will contact you directly to discuss the results.

Where are we located?

Respiratory Physiology is located in OPD 9.

From the Main Entrance to Royal Hospital for Children and Young People, please report to Ground Floor Outpatient Reception Desk.

**If you have any other questions or need to change your appointment,
please telephone: 0131 312 0456**