

Patient Information Sheet:

Exercise Testing Before Major Surgery

Why am I being asked to have this test?

Your surgeon has seen you and thinks you will benefit from surgery. We are offering patients an exercise test if they are undergoing planned major surgery.

What is the Purpose of an Exercise Test?

Major surgery puts a strain on the heart and the lungs in a similar way to exercise. We know that some patients will have complications after major surgery and we believe that patients with less ability to exercise may be a higher risk of complications.

Some previous research has shown that patients who have low ability to exercise may need extra care after major surgery (such as Intensive Care). A very small number might wish to consider if surgery is appropriate for them.

Before surgery we would like to look at your ability to exercise using a bicycle test called a '**Cardiopulmonary Exercise Test**'.

Do I have to have the test?

No – it is up to you to decide whether or not to have the exercise test. If you do, we will be better able to inform you how risky your surgery is and plan your care before and after the operation.

What will happen to me if I have the test?

Most of the care you receive before and after the planned operation will be the same whether or not you have the test – including blood tests, ECG's (heart tracings) and X-rays if they are needed.

After you have had the routine pre-operative assessment we ask you to do the exercise test. The test is supervised by a Consultant Anaesthetist who will discuss the results and what this means for you, including additional care you may need around the time of your operation.

It is helpful to bring some one with you to the test – who can help to ask questions and clarify anything which may not be clear. We routinely copy patients in to the letters we write to their Surgeon and GP.

What does the Exercise Bicycle Test Involve?

The test involves pedalling on a stationary exercise bike while we monitor your heart and breathing. We make sure you are comfortable on the bicycle and help you to be comfortable breathing through a special mask. After a period of cycling gently the bicycle gradually makes it harder for you to pedal and we can monitor

how the heart and lungs respond. A computer stores the data so we can examine it after you have finished the test.

Most patients manage to pedal for a few minutes and even frail patients usually give us enough information to guide their care.

During the test there will be a specialist monitoring you. If you feel unwell or they notice anything worrying they will then stop the test.

What will we do with the information?

The information about you will be passed back to your surgeon and anaesthetist. They will be able to use it to see if you might need extra care around the time of surgery. A copy of the letter will be sent to your GP.

What do I have to do?

For most patients you will attend your normal pre-op appointment that every patient has before the test. If your surgeon has concerns you may have the exercise test before they make a final decision whether to go ahead or not.

On the day of the test you need to behave as normally as possible – including eating and drinking normally and taking all your normal medicines. You should not smoke for eight hours before the tests.

You should wear comfortable clothes you are happy exercising in – **Ladies**, please be sure to bring a loose fitting shirt that can button up down the front as we put ECG dots on your chest to monitor your heart. Please also wear shoes suitable for cycling.

Have these tests been performed before?

The Exercise Bicycle test has been used to test patients since the early 1990s – again, mainly those with known heart and lung problems. Derriford has been using the test for patients with lung disease for several years. Patients have been having the test before surgery since early 2007 – and most have been given useful information which has helped plan their care.

Are the tests safe?

Yes. The exercise tests have a good safety record. A trained member of staff will be with you at all times during and immediately after the tests. If you feel unwell or are exhausted then you must stop the test.

In around 3 in 100 patients we stop the tests because we see something that concerns us. In about 1 in 600 patients we need to give some treatment to make sure they are safe.

What are the other possible disadvantages and risks of having an exercise test?

These tests should give us extra information that will help to plan your care around the time of surgery. However, getting a good result from these tests does not mean that you will not have any complications after surgery.

What are the possible benefits?

We believe that these tests will help us to spot those patients at special risk of complications after surgery and help plan their care.

Will my taking part be kept confidential?

Yes. All the information about your exercise test will be kept confidential. The results will be stored in your hospital notes and on a PHNT computer. If you sign a consent form we may use the data in future research – but it will be anonymous. Any information that might be able to identify you will be removed before it is analysed for research purposes.

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