Lung transplantation

By Dr Nazia Chaudhuri

Lung transplantation is unfortunately not a cure for IPF. It is a decision that is not to be taken lightly and needs careful consideration and assessment.

It is important you talk to your family, your GP and specialist doctor about what it involves. If I transplanted ten people with IPF today, on average, two of those ten would not survive the immediate period after the operation due to the potential risks and complications of undergoing such major surgery.

In five years after transplantation five out of ten people transplanted would be alive and ten years after transplant only one or two people would still be alive. It is therefore important that transplantation happens at the right time, often called the “window of opportunity”. It is not worth the risk if you are too well and often is too risky if you are too poorly, as you may not be strong enough to survive the operation.

Usually for IPF we say if we think your lungs are likely to stop working within two years then that is the time to think about transplantation. Often even for the doctors they sometimes find it difficult to decide when that time is and it’s important that you and your specialist have an open discussion about this as soon as you are diagnosed.

The goals of lung transplantation are to improve your survival and your quality of life. But to improve your chances of survival after a transplant there are some important things that are absolutely necessary for you to be eligible.

- You have to be in good health otherwise with no other life threatening illnesses such as kidney failure, heart failure, heart disease or cancer.
- You need to not smoke for at least six months. The doctors can do blood tests to check if you’re still smoking.
- You need to drink minimal alcohol.
- You can’t have problems taking medications as after the transplant you will be on a lot of tablets for the rest of your life.
- You must be of ideal body weight. Being over or under weight puts you at risk of more complications from the transplantation and your survival is likely to be less.
- You must have good emotional and psychological support.
- Although we are not ageist, we are realists. We do know that people over the age of 65 have more complications from the transplant and that their survival is reduced.
Different transplant centres have differing criteria; however in South Manchester we assess each case on an individual basis.

What can I expect from undergoing a lung transplant?

Before

You will first need to be assessed for transplantation at a specialist transplant centre. There are only six centres in the UK so you may have to travel a distance from your home. You and your family will have an opportunity to meet the transplant team which consists of doctors, nurses, surgeons, nutritionist, psychologist, physiotherapist, transplant coordinator and maybe others.

The aims of this meeting is to tell you and your family exactly what a lung transplant involves and what the potential risks and complications are so that you can make the decision that this is the right thing for you. A data and time will be arranged for you to come into hospital for a day or two.

All the transplant centres have different ways as to how they do this. Essentially you will have a head to toe examination with a number of tests to make sure you don’t have any other conditions that may hurt your chances of survival after a transplant.

These include:

- Blood tests
- A detailed x-ray of your chest called a CT scan.
- An x-ray scan of your bones and liver.
- A blow test to assess your lungs.
- A walking test.
- A test that checks the blood supply to your heart. This involves an injection in the arm or groin and a dye is injected. This allows us to see your blood vessels around your heart with an x-ray and make sure there are no blockages.

Once you have had these tests and you are fit enough for the transplant you are then put on the transplant waiting list.

You will be in close contact with the transplant team. Unfortunately the supply of donors is limited and you could be waiting on this list for 12 to 18 months.

Your scarring may also worsen during this time and you may even become too unwell and weak to have a transplant. The transplant team will see you regularly during this time. If this does happen you will be given other treatments to help you with your symptoms.

During

The operation itself can take up to eight to ten hours. You will initially be on the intensive care ward and will be in hospital for up to two to four weeks. This time can be longer depending on how your body copes with the transplant operation. During this time you will be taking a lot of anti rejection tablets called immuno-suppressants.
**After**

You will be on anti-rejection medication for life. You will also be followed up by the transplant team for life. During this time they will be assessing how you are recovering from the operation, how you are managing with the medication and what your breathing is like.

They will be checking for symptoms and signs of infection, rejection and side effects of medication. As part of these assessments you may have blood tests, x-ray scans, lung function tests, walking tests and camera tests looking into your lungs.

**Conclusions**

Lung transplantation is a major undertaking. To improve your chances:

Keep active and healthy - go on pulmonary rehabilitation courses

Keep an ideal body weight.

Don’t smoke

See your GP regularly to check your other organs e.g. get a blood pressure check, blood sugar test for diabetes etc.