

Coping with Cough

Presentation by Laura Grimsey, Senior Physiotherapist at NNUH

We know cough is common and troublesome for many. Patient surveys show that cough affects 70-85% of people with lung fibrosis, and that, compared to other conditions that cause cough like COPD and asthma, it causes more distress (rated on a 0-10 scale). For people with pulmonary fibrosis, a persistent cough may be one of the first signs that something is not right. It is often a dry tickly cough, but can also be a 'wet' cough, when it feels as though there is phlegm to cough up. Everyone's cough will be individual to them but even one person may have a different cough at different times of the day or if they have chest infection.

Laura explained that a cough is only effective if it clears phlegm (sputum) from your chest. A cough that is dry is described as an ineffective cough. Ineffective coughing should be avoided – it is very tiring, puts strain on the vocal cords and pelvic floor muscles (the ones that help us with bladder control!) and can actually make it harder to clear sputum. Frequently clearing your throat or coughing causes the vocal cords to snap together and pull apart forcefully. This triggers the production of mucus to try to protect the vocal cords and in the longer term can lead to damaged vocal cords and continued production of mucus, which of course makes the feeling of needing to cough even stronger. There is no 'quick fix' to stop a persistent cough but you are the best person to know what triggers the cough and you can learn different methods to suppress the cough and see which one works best for you. You need to practice your chosen technique regularly so that you can use it confidently to break the coughing cycle. Laura suggested that when you feel you want to cough, ask yourself whether it is a wet, phlegmy cough or a dry, tickly cough?

If it is a dry cough, use the “**Stop Cough**” exercise:

- As soon as you feel a cough, put your hand over your mouth
- Swallow once
- Take a small breath in and out through your nose
- Hold your breath for a few seconds, then relax and tell yourself you are not going to cough
- Take a smooth, normal size breath through your nose. Take your hand away from your mouth
- If you still feel a tickle, repeat the exercise.

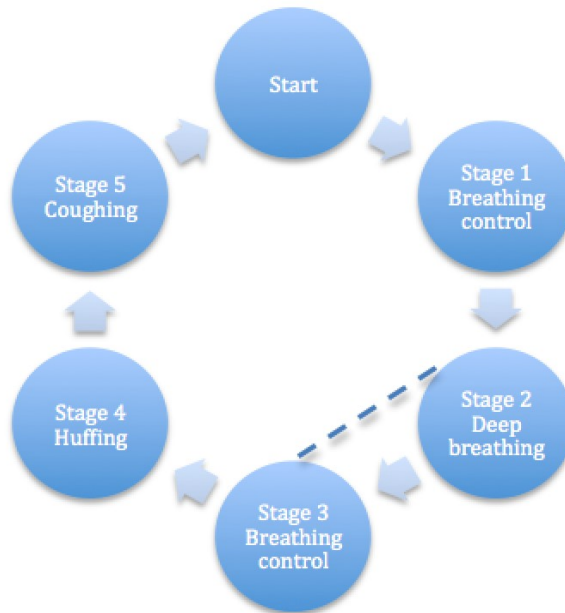
This exercise helps because breathing through the nose slows down the air coming into the lungs, giving it time to be warmed and moistened in the nose before going down the windpipe, causing less irritation to the vocal cords and the cough receptors in the throat and upper airways. Imagine you have an itchy gnat bite – scratching the itch makes it itch even more as the bite gets more inflamed but if you can ignore it for a little while, the itch goes off. Cough is just the same but this does take practice and might not work straight away. You may not be able to get rid of the cough altogether but if you can reduce the frequency and feel that you are a bit more in control, that can really help so keep trying until you can break that cough habit!

Other tips to suppress cough:

- Have a bottle of water to hand so that you can keep sipping at it.
- Keep telling yourself you don't need to cough.
- Ask those who are with you regularly to tell you when they hear you clearing your throat – often it has become such a habit, you may not be that aware of when you are throat clearing.
- Try swallowing hard if you feel the need to clear your throat.
- If you still need to clear your throat try a 'huff' as if you are steaming up a mirror.
- Try sucking hard sweets or ice cubes, or sipping a very cold drink.
- Mints or mint drinks may help – mint or menthol stimulate swallowing and suppress the cough reflex, whereas chilli, cinnamon and citrus have been found to stimulate the cough receptors.
- Breathe in and out gently through your nose, or sniff in through your nose 2 or 3 times then gently out through pursed lips.
- Think about your position – bending down increases the pressure on your lower chest and stomach and can increase cough as can laying flat on your back.

What about if your cough is wet? Some people always have some sputum and if you do, it is important to try to clear it – bugs love the warm, wet environment in your chest and mucus provides a perfect breeding ground for bacteria. Clearing sputum from your airways can help to prevent chest infections and by regularly clearing your chest, your breathing can feel easier and you are less likely to cough throughout the day or night. Using a simple pattern of breathing exercises, called the **Active Cycle of Breathing Technique**, can help to loosen and move sputum from your airways and reduce the amount of effort needed to clear your chest.

Start by finding a comfortable position with the shoulders down and relaxed.



Stage 1: Breathing control

This is relaxed gentle breathing with as little effort as possible. Rest a hand on your stomach and breathe in and out gently, through your nose if possible, feeling your hand rise a little as you breathe in. The top of your chest shouldn't be moving very much, so your diaphragm (the big breathing muscle between your lungs and your abdominal organs) is doing most of the work. This is the most energy efficient way to breathe and allows your airways to relax.

Stage 2: Deep breathing

Breathe in through your nose slowly and deeply, keeping your shoulders and upper chest relaxed. Hold your breath for 2-3 seconds, then breathe out gently through your mouth. Repeat 3 times. (Don't repeat if you are starting to feel dizzy.)

Stage 3: Return to relaxed breathing control (Stage 1). You can repeat stages 2 and 3 several times – this helps to get air through the tiny networks of airways in your lungs so that air gets behind any sputum sitting in the airways.

Stage 4: Huffing

A huff is a breath out through an open mouth and throat – it is not a cough! Don't force air out hard so that you hear a wheeze - the action is the same as if you were trying to steam up a window or clean your glasses. Huffs can be different sizes depending where the sputum is. A small huff needs a small to medium breath in and then huff air out until the lungs feel quite empty – this helps to move sputum up into the larger airways. A big short huff is useful when the sputum is higher up in your chest – take a deep breath in and huff air out quickly. Huffing can be quite tiring so don't do more than 2 or 3, then follow with relaxed breathing control again.

Stage 5: Coughing

You may be able to clear your sputum by huffing making coughing unnecessary so only cough if you can feel sputum right at the top of your chest and it can easily be cleared. If it doesn't come up with 1 or 2 coughs go back to the beginning of the cycle. Try to avoid bouts of coughing, which are tiring and stress the breathing muscles, pelvic floor muscles and vocal cords.

Information leaflets on the Cough Suppression and Active Cycle of Breathing techniques (and lots of other information leaflets) are available via the hospital website <http://www.nnuh.nhs.uk> information for patients and visitors and then clicking on the link for Patient Information Leaflets.

Some other more general things to think about are thinking about what triggers your cough – is it worse at a particular time of day? After eating or drinking? Or if you go out in the cold? Does talking or being exposed to strong smells set it off? You may not be able to avoid all the things that make you want to cough but if you can be a bit prepared and let those around you know, you might feel less anxious about the risk of setting off a coughing spell. If you have a productive cough in the mornings – could you have some reflux from your stomach? This is quite common in fibrosis – you may not have symptoms of acid or indigestion if you are

taking a regular medicine like Omeprazole or Lansoprazole but if you lay fairly flat on 1 or 2 pillows at night, it is possible that some of the stomach contents (or gas coming from the stomach) will end up in the airways, irritating them and stimulating more mucus to be produced resulting in more cough and sputum and possibly worsening the damage in the lungs. Try sleeping propped up at about 45 degrees so that gravity keeps the stomach contents in your stomach. The 'guts charity' website has a useful information leaflet about heartburn and reflux. www.gutscharity.org.uk

If you know going to answer the phone makes you cough, making talking difficult, warn friends and family that you just need a couple of minutes to get your breath back and that you might need to stop talking every so often. Similarly, let people know if strong perfumes, scented candles or aerosols cause you a problem – most people won't mind if they know how difficult it is for you. And, of course, it goes without saying that it makes sense to avoid being near smokers – tobacco smoke can really irritate the airways and increase cough. If a change of temperature or humidity triggers a cough, try keeping your nose and mouth covered when you go out in the cold, take time going from one environment to another & avoid extremes of temperature if you can.

Cough syrups may help soothe a tickly cough but they are a bit of a case of trial and error. For some people, codeine linctus may help a bit but often old-fashioned warm water and honey might be as effective. See what works for you but if your cough is a bit loose and rattly, don't try to suppress that – it is better to use the techniques described to clear it. If you are struggling with cough, do talk to your doctors or nurses – you can be referred to the respiratory physiotherapists for advice and help learning some strategies to help you cope. And do think about talking to your fellow members – you are all living with these conditions and are very likely to develop coping strategies of your own.

October 2018