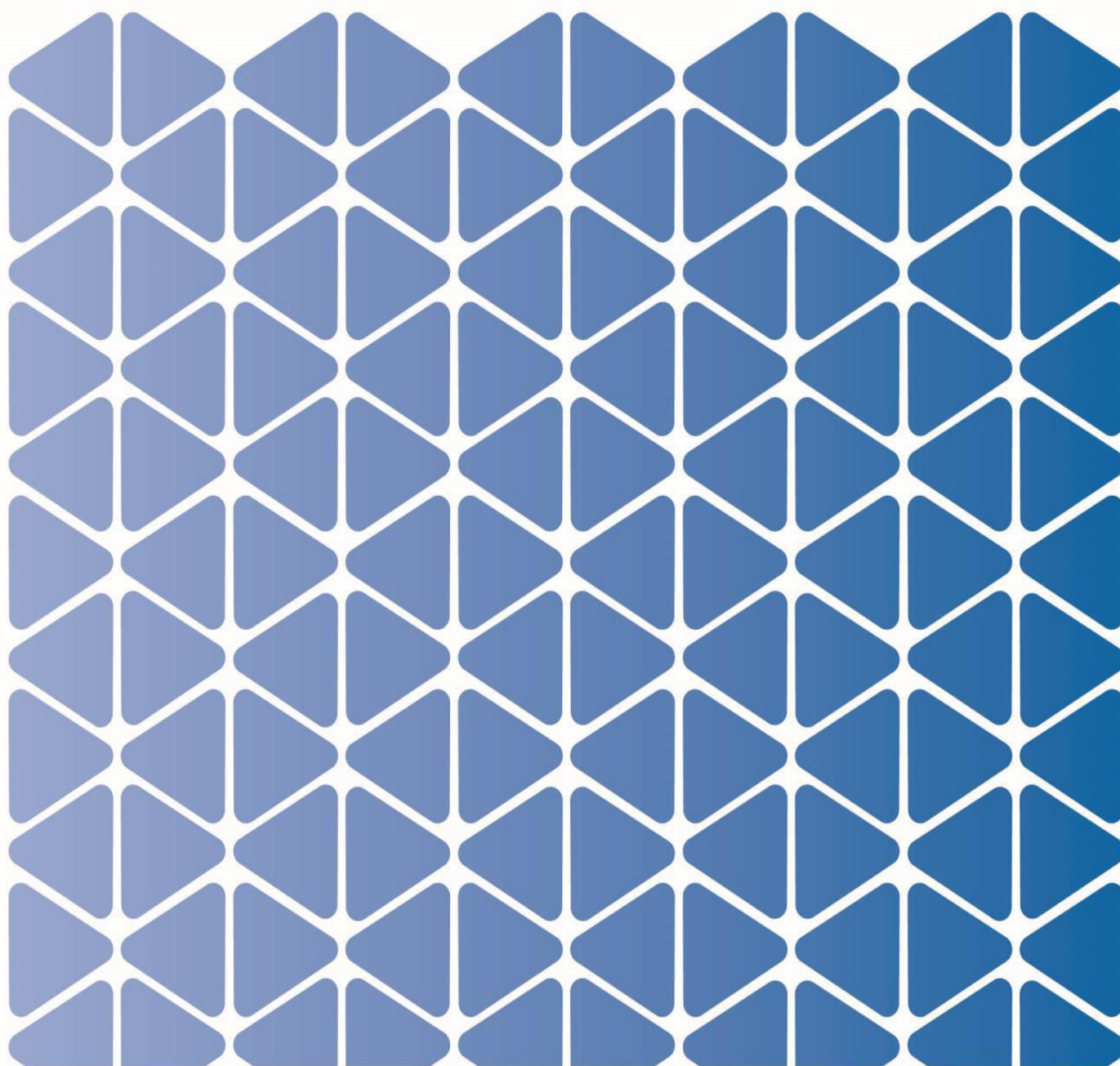
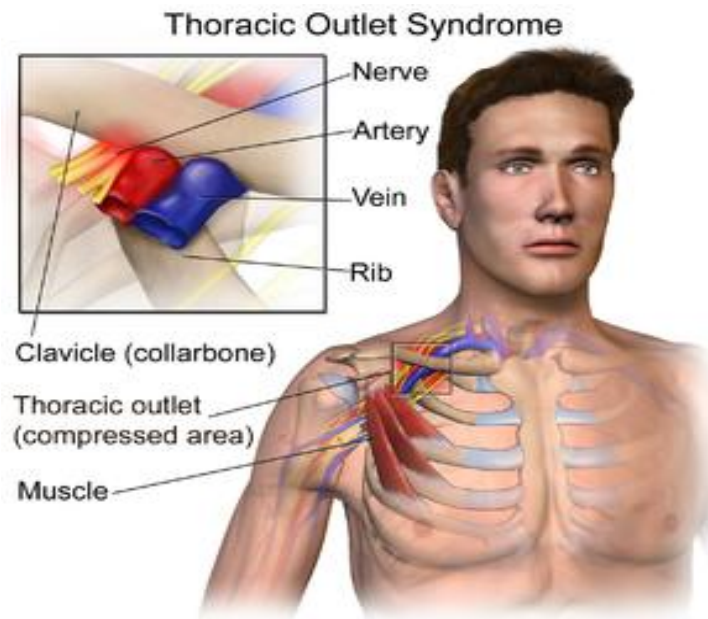


PATIENT INFORMATION**PHYSIOTHERAPY ADVICE AND
EXERCISES FOLLOWING THORACIC
OUTLET DECOMPRESSION**

What is a Thoracic Outlet Decompression

This surgery is a vascular procedure used in the treatment of thoracic outlet syndrome, where the blood vessels and/or nerves that supply your upper limb, become compressed as they pass through the thoracic outlet- the narrow space between the 1st rib and clavicle (collar bone). This can commonly cause pain in the neck, shoulder or arm, numbness, tingling, or weakness in the arm or hand, as well as swelling and coldness of the hand or arm. The symptoms are dependent on which structures are being compressed i.e. are the artery, veins, or nerves.



The Operative Procedure

This involves removing the structures that are causing the compression- such as scar tissue, a cervical (extra) rib, where present, and certain muscles. Part or all of the first rib is also removed if it is contributing to the pressure on these vessels and nerves. This creates a larger space for the vessels and nerves to pass through and should thereby reduce your symptoms.

It is an inpatient surgery done under a general anaesthetic. You will typically be in hospital for 2 to 3 days, and you will often have at least one drain in place for the first few days. The physiotherapist will see you on the ward to show you exercises and to give you advice. When you are discharged you will be referred to your nearest outpatient physiotherapy department to regain movement and function of your arm. A sling is typically not required.

Patient Advice for Thoracic outlet decompression

Post-operative exercises and advice – From Day 1 post op

Breathing Exercises: Active Cycle of Breathing Technique (ACBT):

Follow the ACBT, described below, as advised by your Physiotherapist.

This is an effective way of helping to keep your chest clear and your lungs inflated, thereby reducing the risk of developing post operative chest complications e.g. Chest infection. The best position to perform your breathing exercises is sitting comfortably, however, they can be done in any position. Time your exercises to coincide with your pain relief as this will help to decrease any discomfort while performing them and increase their effectiveness. These exercises can and should be performed even if you have a chest drain in place.

You will be advised on how often to repeat the breathing exercises, but, as a rule they should be performed at least 4 times daily. You may be advised to repeat them more regularly if are struggling to cough and clear phlegm off your chest.

Continue your ACBT until your chest feels back to normal and you are fully up and about.

Active Cycle of Breathing Technique (ACBT):

1. Relaxed Breathing:

Keeping your upper chest and shoulders relaxed; rest your hand on your tummy. Breathe in slowly and gently through your nose, feeling your tummy rise as you breathe in and fall as you breathe out. Continue until your breathing is calm and steady.

2. Deep Breathing:

Breathe in as deeply as you can through your nose. As you do, you should feel your ribs expand out to the sides. Hold your breath at the top for 2-3 seconds and then exhale slowly. Repeat at 4 times

3. Relaxed Breathing:

Repeat stage 1. To gain control over your breathing pattern

4. Huffing:

- **Low Huff** - This helps to move the secretions from the bottom of the lungs up a bit higher. Take a small breath in and then with an open mouth, breathe out steadily but forcefully, as if steaming up a mirror. It's important that you feel you have emptied your lungs at the end of the huff.
- **High Huff** – This helps to clear the secretions from the upper airway. Take a deep breath in and with your mouth open, take a short sharp breath out.

5. Relaxed Breathing:

Repeat stage 1.

6. Cough:

If you feel that you have got secretions, finish with a strong cough. If pain is preventing you from coughing effectively ensure you ask for more painkillers.

Mobility

Try to sit out of bed and gently walk about as soon as you are able, ideally the first day after your operation, and initially with supervision as you may feel light-headed. Gradually increase your mobility as you feel better. It is also important, however, to spend time resting on your bed, with your arm and head supported on pillows. Remember to take care of your drain and any other attachments you may have while you are moving.

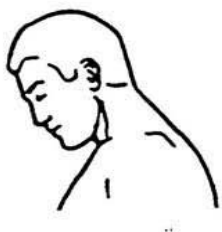
Exercises

Day one after your operation -

The physiotherapist will show you exercises to practise for your neck and shoulder girdle (which is different to your shoulder joint) - see below. These exercises will help to relax the muscles, reduce pain and maintain the range of movement of these joints. Aim to practise these exercises 3-4 times a day. On this first day you should limit any movement of your shoulder joint on the operated side and the physiotherapist will assist you with exercises/movements of that joint from day two after your operation. You should use your hand for light activities e.g. when dressing, eating etc.

Exercises for Thoracic Outlet Decompression- Day 1 post-op onwards

Neck exercises



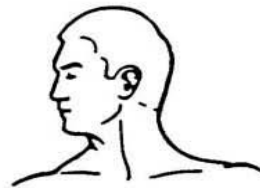
Flexion



Extension



Hyper-
extension

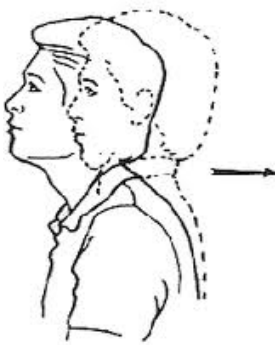


Rotation



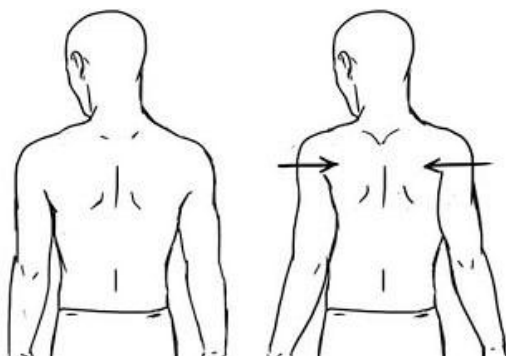
Lateral
flexion

Neck Retraction

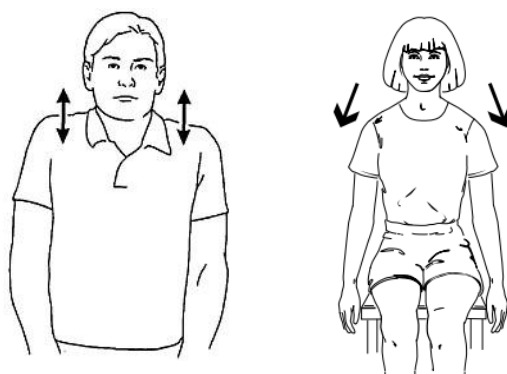


Shoulder Girdle ex's

Shoulder Retraction



Shoulder Elevation and Depression



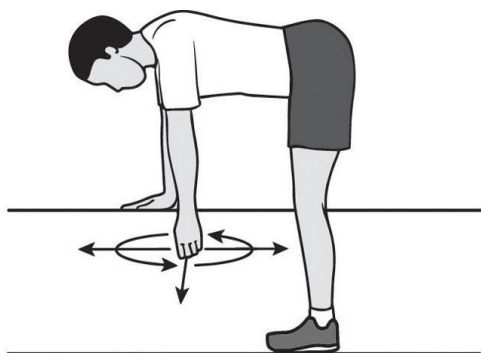
These exercises should be completed 3 times daily, 5-10 times each as comfort allows or as advised by your physiotherapist.

Day 2 after surgery onwards –

You can now gently progress your exercises. Continue with day one exercises as shown above but now you can start to include active exercises for your shoulder joint- as advised by the physiotherapist and illustrated below. Do not push into any stretches – taking your arm to the point of slight discomfort only. Again, aim for small amounts, ideally 3-4 times daily. You can gradually increase the range of movement of your shoulder as your pain settles. You can also gradually start to use your hand/arm more now but only for light activities. Do not carry anything heavy with your arm at this point (no more than the weight of a full kettle.)

Shoulder Joint Exercises

Pendular swinging - side to side, forward and back and small circles in each direction.



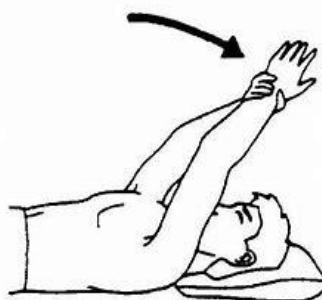
Self-Assisted shoulder Exercises

Use your unoperated arm to assist you to lift your affected arm above your head, out to the side and to rotate side to side - within comfortable, pain-free range. You can also use a pole or stick to help.

1.



2.



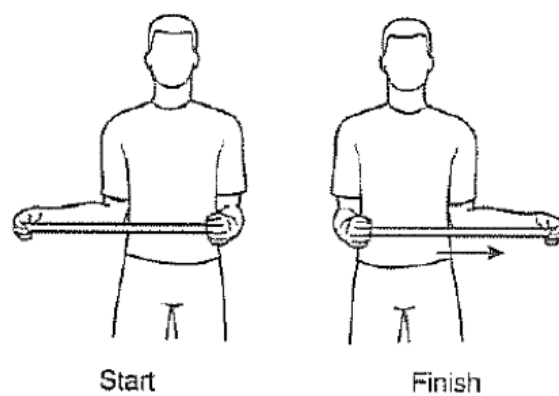
3.



4.



5.



These exercises should be completed 3 times daily, 5-10 each as comfort allows or as advised by your physiotherapist.

Posture

Be aware of your posture –ensure your shoulder is dropped away from your ear and your shoulder blades are drawn back and down. Tuck your chin in to give a stretch down the back of your neck. Use your reflection to check that your shoulders are symmetrical

When sitting or lying support your arm on pillow and ensure you take regular adequate pain killers to allow you to do all the above comfortably.

Discharge

When you are discharged you will be referred to your nearest outpatient physiotherapy department to progress your exercises and regain strength, range of movement and function in your arm.

You should gradually start using your arm more for everyday activities but not carrying, pushing or pulling anything heavier than 5lbs (equivalent to a full kettle), for the first 4-6 weeks, or as advised by your physiotherapist. You should not drive for at least 4 weeks or until you are reviewed by your surgeon.

If you have been given a sling by your physiotherapist this should only be used initially on discharge until the pain settles, and only when you are standing or walking for a long period of time – the rest of the time you should start using your arm and hand for gentle activities. Remember to support your arm on a pillow when sitting and spend some time resting on your bed in the first week or two.

In Summary-

DO:

- **PRACTISE THE EXERCISES SHOWN TO YOU BY THE PHYSIOTHERAPIST**
- **KEEP MOBILE BUT REMEMBER TO TAKE REGULAR RESTS WITH YOUR ARM AND HEAD SUPPORTED**
- **TAKE YOUR PAIN MEDICATION REGULARLY**
- **REPEAT YOUR BREATHING EXERCISES REGULARLY UNTIL YOUR BREATHING HAS RETURNED TO NORMAL AND YOU ARE FULLY MOBILE**

DON'T:

- **STAY LYING DOWN FOR LONG PERIODS OF TIME**
- **PUSH YOUR EXERCISES BEYOND THE POINT OF MILD STRETCHING UNTIL YOU ARE ADVISED BY THE PHYSIOTHERAPIST**
- **CARRY ANYTHING HEAVY OR USE YOUR ARM FOR HEAVY ACTIVITIES UNTIL ADVISED BY THE PHYSIOTHERAPIST**
- **DRIVE FOR THE FIRST 4 WEEKS OR UNTIL ADVISED BY YOUR CONSULTANT**

When to Seek Further Assistance:

It is advised that you speak to your GP or call 111 if experience any of the following symptoms once you are home:

- Any changes with your breathing including new shortness of breath, increased production or change in the colour of your phlegm.
- Generally feeling unwell or if you have a fever/high temperature.
- Change in the condition of the shoulder wound – increased heat, pain or discharge.

Patient Services Department

It is important that you speak to the department you have been referred to if you have any questions (for example, about medication) before your investigation or procedure. If you are unhappy about the service you have received and would like to talk about it or make a formal complaint, please contact Patient Advice and Liaison Service on 0300 123 1732.

If you have a complaint and you want it to be investigated, you should write direct to the Chief Executive at Worcestershire Acute Hospitals NHS Trust, Charles Hastings Way, Worcester WR5 1DD or contact the Patient Services Department for advice.

If you would like this information in other formats or languages please call 01905 760453 or email: communications@worcsacute.nhs.uk

Feedback for Inpatient Therapies

Please scan the QR code or follow the link below:

If you have been seen by a Physiotherapist or Occupational Therapist during your admission, please leave us some feedback by scanning the QR code or following the link and filling in the short survey.



<https://apps.worcsacute.nhs.uk/PublicSurvey/AHPFeedback>

Ward admitted to: _____

Therapy team who treated you: _____

If your symptoms or condition worsens, or if you are concerned about anything, please call your GP, 111, or 999.

Patient Experience

We know that being admitted to hospital can be a difficult and unsettling time for you and your loved ones. If you have any questions or concerns, please do speak with a member of staff on the ward or in the relevant department who will do their best to answer your questions and reassure you.

Feedback

Feedback is really important and useful to us – it can tell us where we are working well and where improvements can be made. There are lots of ways you can share your experience with us including completing our Friends and Family Test – cards are available and can be posted on all wards, departments and clinics at our hospitals. We value your comments and feedback and thank you for taking the time to share this with us.

Patient Advice and Liaison Service (PALS)

If you have any concerns or questions about your care, we advise you to talk with the nurse in charge or the department manager in the first instance as they are best placed to answer any questions or resolve concerns quickly. If the relevant member of staff is unable to help resolve your concern, you can contact the PALS Team. We offer informal help, advice or support about any aspect of hospital services & experiences.

Our PALS team will liaise with the various departments in our hospitals on your behalf, if you feel unable to do so, to resolve your problems and where appropriate refer to outside help.

If you are still unhappy you can contact the Complaints Department, who can investigate your concerns. You can make a complaint orally, electronically or in writing and we can advise and guide you through the complaints procedure.

How to contact PALS:

Telephone Patient Services: 0300 123 1732 or via email at: wah-tr.PALS@nhs.net

Opening times:

The PALS telephone lines are open Monday to Friday from 8.30am to 4.00pm. Please be aware that you may need to leave a voicemail message, but we aim to return your call within one working day.

If you are unable to understand this leaflet, please communicate with a member of staff.