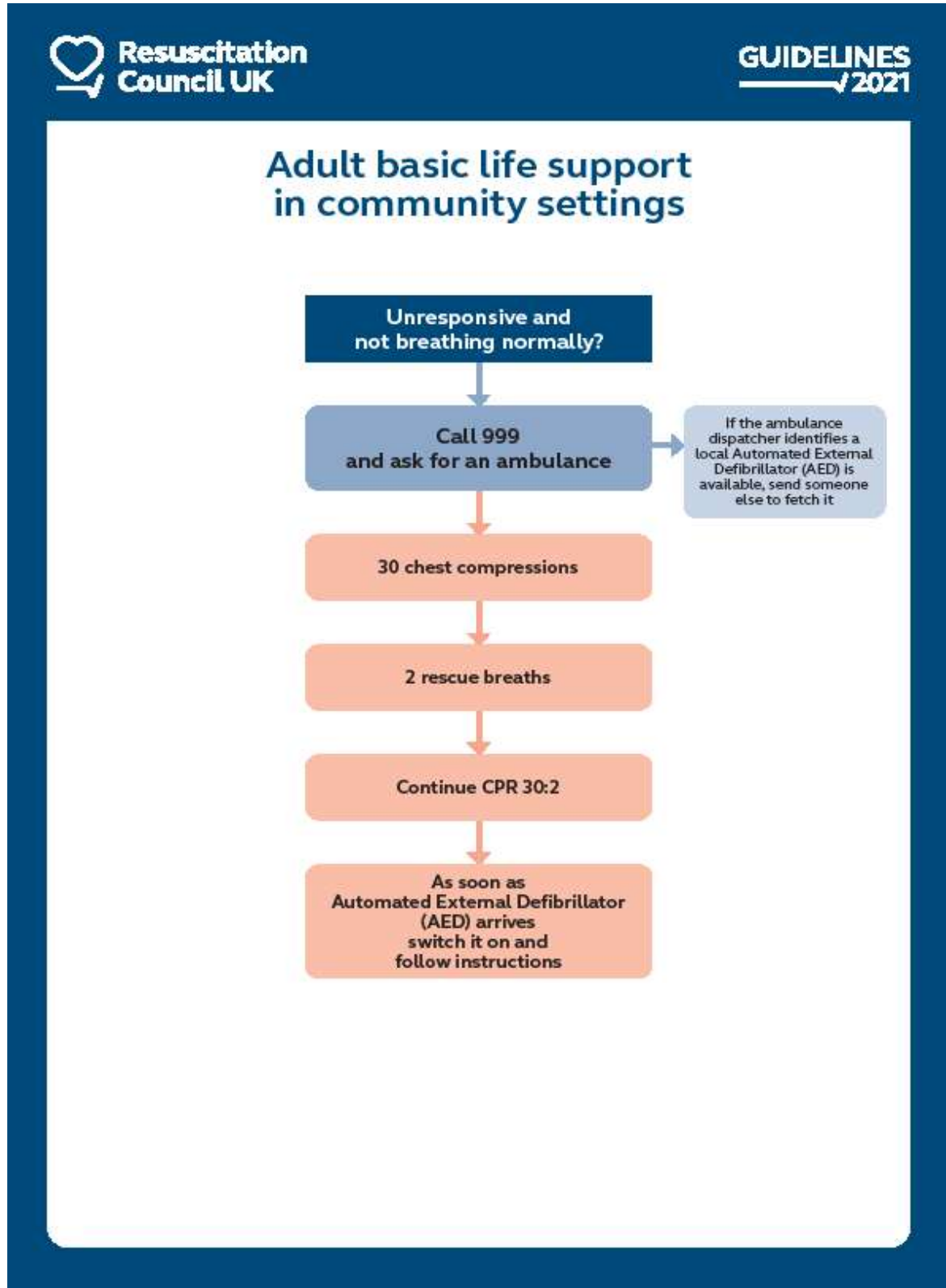
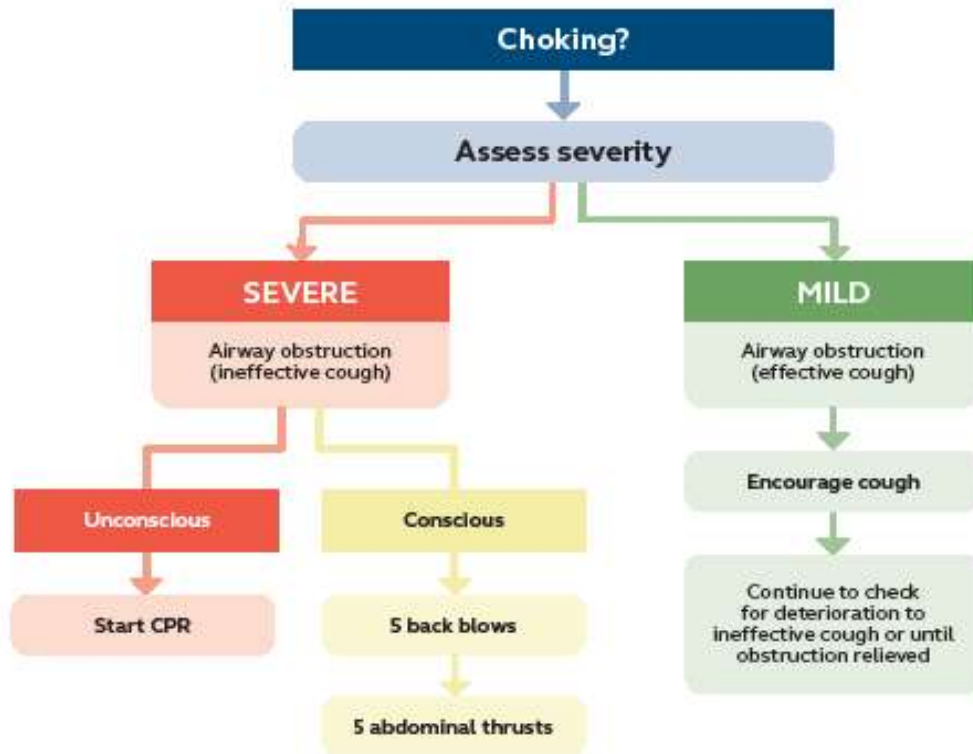


BASIC LIFE SUPPORT

(This protocol should be used in conjunction with the mandatory annual basic life support training that all staff must attend)



Adult choking



Familiarise Yourself with the Location of The Following:

- Emergency drug box
- Oxygen cylinder and facemask
- Ambubag
- Automated External Defibrillator (if available)
- Phone for calling 999 ambulance

Sequence for 'collapsed' patient

- Ensure personal safety.
- Check the patient for a response:
 1. When a healthcare professional notes that a patient has collapsed, or finds a patient apparently unconscious, they should first shout for help, then assess if the patient is responsive by gently shaking their shoulders and asking loudly, '**Are you all right?**'
 2. If other members of staff are nearby it will be possible to undertake actions simultaneously.

3 (i) If the patient responds:

- Urgent medical assessment is required. If required, call an ambulance.
- While awaiting the ambulance, assess the patient using the ABCDE approach.
- Give the patient oxygen.

3 (ii) If the patient does not respond:

- If they speak only in short sentences, they may have breathing problems. Failure of the patient to respond is a clear marker of critical illness.
- This first rapid 'Look, Listen and Feel' of the patient should take about 30 s and will often indicate a patient is critically ill and there is a need for urgent help.
- If the patient is unconscious, unresponsive, and is not breathing normally (occasional gasps are not normal) start CPR according to the resuscitation guidelines.

If you are confident and trained to do so, feel for a pulse to determine if the patient has a respiratory arrest. If there are any doubts about the presence of a pulse start CPR.
- Shout for help (if this has not already been done). Turn the patient onto his back.
- Open the airway using head tilt and chin lift.
- Look in the mouth. If a foreign body or debris is visible, attempt to remove it, using suction or forceps as appropriate.
- If there is a risk of cervical spine injury, establish a clear upper airway by using jaw thrust or chin lift in combination with manual in-line stabilisation (MILS) of the head and neck by an assistant (if sufficient staff are available). If life-threatening airway obstruction persists despite effective application of jaw thrust or chin lift, add head tilt a small amount at a time until the airway is open; establishing a patent airway takes priority over concerns about a potential cervical spine injury.

- Keeping the airway open, look, listen, and feel for no more than **10 sec** to determine if the patient is breathing normally:
- Listen at the patient's mouth for breath sounds.
- Look for chest movement.
- Feel for air on your cheek.
- Agonal breathing (occasional gasps, slow, laboured, or noisy breathing) is common in the early stages of cardiac arrest - it is a sign of cardiac arrest and should not be mistaken for a sign of life.

4 (i) If the patient has a pulse or other signs of life:

- Urgent medical assessment is required. Call for an ambulance
- While awaiting the ambulance or the team, assess the patient using the ABCDE approach.
- Give the patient oxygen.

4 (ii) If there is no pulse or other signs of life:

- **One person should start CPR as others call the ambulance and collect the resuscitation equipment and a defibrillator if available. If only one member of staff is present, this will mean leaving the patient.**

High-quality chest compressions

- Start chest compressions as soon as possible. Deliver compressions on the **lower half of the sternum ('in the centre of the chest')**.
The recommended depth of compression is 5 to 6 cm and the rate is 120 compressions min with as few interruptions as possible.

If you are trained to do so, after 30 compressions, provide 2 rescue breaths. Alternate between providing 30 compressions and 2 rescue breaths. If you are unable or unwilling to provide ventilations, give continuous chest compressions.

- Maintain the airway and ventilate the lungs with the most appropriate equipment immediately at hand.
- Use an inspiratory time of 1 sec and give enough volume to produce chest rise as in normal breathing. Add supplemental oxygen as soon as possible.
- If there is no airway and ventilation equipment available, give chest compressions alone until help or airway equipment arrives.
- When the defibrillator arrives, apply the electrodes to the patient and analyse the rhythm.
- If self-adhesive defibrillation pads are available, and there is more than one rescuer, apply the pads without interrupting chest compression. Pause briefly to assess the heart rhythm. If indicated, attempt automated external defibrillation.
- Recommence chest compressions immediately after the defibrillation attempt. Do not pause to assess the pulse or heart rhythm. Minimise interruptions to chest compression.
- Continue resuscitation until the ambulance arrives or the patient shows signs of life. If using an automated external defibrillator (AED), follow the voice prompts.
- Identify one person to be responsible for handover to the ambulance personnel.
- Change the person providing chest compression about every 2 min to prevent fatigue.

Sequence of Actions

- The exact sequence of actions after cardiac arrest depends on several factors including:
 - location (clinical or non-clinical area; monitored or unmonitored patients);
 - skills of staff who respond;
 - number of responders;
 - equipment available;
 - system for summoning help is by dialling 999 and asking for an emergency blue-light ambulance. You should inform ambulance control that the patient has collapsed and is not breathing.

Sequence of actions when using an AED

1 Make sure the patient, any bystanders, and you are safe.

- If two rescuers are present, assign tasks.

2 If the patient is unresponsive and not breathing normally:

- Send someone for the AED and to call for an ambulance. If you are on your own do this yourself; you may need to leave the patient.

3 Start CPR according to the guidelines for BLS.

4 As soon as the AED arrives:

- Switch on the AED and attach the electrode pads.
- If more than one rescuer is present, continue CPR whilst this is done.
- Follow the voice / visual prompts.
- Ensure that nobody touches the patient whilst the AED is analysing the rhythm.

5 (i) If a shock is indicated:

- Ensure that nobody touches the patient.
- Push the shock button as directed.
- Continue as directed by the voice / visual prompts.

5 (ii) If no shock is indicated:

- Immediately resume CPR using a ratio of 30 compressions to 2 rescue breaths.
- Continue as directed by the voice / visual prompts.

6 Continue to follow the AED prompts until:

- paramedic help arrives and takes over
- the patient starts to breathe normally, or
- you become exhausted.

Placement of AED pads

- The patient's chest must be sufficiently exposed to enable correct electrode pad placement. Chest hair will prevent the pads adhering to the skin and will interfere with electrical contact. Shave the chest only if the hair is excessive, and even then spend as little time as possible on this. Do not delay defibrillation if a razor is not immediately available.

- Place one AED pad to the right of the sternum, below the clavicle. Place the other pad in the mid-axillary line, clear of any breast tissue. It is important that this electrode is placed sufficiently laterally.
- In order to improve efficiency, place the mid-axillary pad with its long axis vertical.
- Although AED pads are labelled left and right, or carry a picture of their correct placement, it does not matter if they are reversed.

Foreign body airway obstruction

- Suspect choking if someone is suddenly unable to speak or talk, particularly if eating.
- Encourage the person to cough.
- If the cough becomes ineffective, give up to 5 back blows:
 - Lean the person forward.
 - Apply blows between the shoulder blades using the heel of one hand.
- If back blows are ineffective, give up to 5 abdominal thrusts:
 - Stand behind the person and put both your arms around the upper part of their abdomen.
 - Lean the person forwards.
 - Clench your fist and place it between the umbilicus (navel) and the ribcage.
 - Grasp your fist with the other hand and pull sharply inwards and upwards.
- If choking has not been relieved after 5 abdominal thrusts, continue alternating 5 back blows with 5 abdominal thrusts until it is relieved, or the person becomes unresponsive.
- If the person becomes unresponsive, start CPR.

Reference

- Resuscitation Guidelines 2021. Resuscitation Council (UK)
- [Adult basic life support Guidelines | Resuscitation Council UK](#) (Accessed Sept 24)
- [The ABCDE Approach | Resuscitation Council UK](#) (Accessed Sept 2024)