Fundamentals of First Aid: CPR



What’s at Stake?

If a person suffers from a heart attack, sudden cardiac arrest, or other medical condition where they are no longer breathing or their heart stops working, quick action is a must.

What’s the Danger?

The blood carries oxygen and the heart pumps the blood and oxygen throughout the body. The lack of oxygen can cause brain damage in only a few minutes and a person may die within eight to 10 minutes. Carrying out cardiopulmonary resuscitation (CPR) manually pumps the heart, keeping the blood flowing around the body and to the brain. Doing rescue breaths raises the oxygen levels, which is vital for reducing brain damage.

It can take many minutes for emergency medical support (EMS) to arrive and CPR must be carried on until the paramedics arrive.

How to Protect Yourself

1. **Know the safety basics**
   - Call 911 immediately you notice someone has collapsed.
   - Assess the scene.
   - Proceed with care only if it’s safe to do so.
2. **Know the signs**
   - Unconscious – they will not be responding to you talking to them or touching them.
   - They have no pulse.
   - You cannot feel their breath when you put your cheek near their mouth.
3. **Not trained, but in the know**
   - Lay the person on his or her back.
   - Carry out hands-only CPR.
     - Uninterrupted chest compressions of about 100 a minute until paramedics arrive.

    - Compressions are repeatedly pressing hard down on the lower middle of the person’s rib cage (the sternum or breastbone) and releasing.
    - This presses down on the heart to keep it pumping and also causes suction, so the person ‘breathes’ and gets some oxygen to the lungs and blood
    - Sing ‘Stayin’ Alive’ by the Bee Gees in your head to get the rhythm.

4. **Trained and ready to go**

- Start CPR with 30 chest compressions.
- Check airway for obstructions.
- If airway clear, start doing rescue breathing.
- If airway blocked, carry out mouth to nose rescue breathing.
- Now continue with 30 compressions to 1 rescue breath until the paramedics arrive.

5. **Trained but rusty**

- If you’ve previously received CPR training but you’re not confident in your abilities, then just do chest compressions at a rate of about 100 a minute.
- Continue until EMS personnel arrive.

6. **Do not use this approach on newborns.**

Final Word

Carrying out CPR correctly can make a huge difference to the outcome for a person suffering from a cardiac arrest. Even if you are not trained, knowing how to do chest compressions until help arrives, is essential.