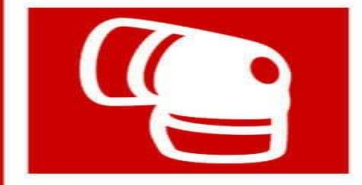




First Aid



Respiratory Emergencies

.1Anaphylaxis

.2Asthma & Hyperventilation

.3Obstructed Airway

.1 ANAPHYLAXIS

Anaphylaxis is a life-threatening medical emergency because of rapid constriction of the airway, often within minutes of exposure to the allergen.

It is commonly triggered by insect stings and foods such as shellfish or peanuts.

RECOGNITION

- Hives (Urticaria) or rash all over accompanied by itchiness
- Swelling or puffiness of the lymph nodes, especially around the neck and mouth
- Swelling of the airway and tongue
- Difficulty breathing, wheezing or gasping



ITCHING



FLUSHING



HIVES (URTICARIA)



SWELLING



TREATMENT

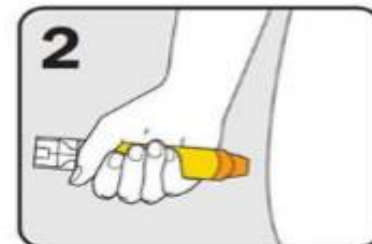
- Call **Emergency** medical services (**EMS**) immediately
- Have the victim administer their Epi-pen if possible. If the victim is unable to administer their Epi-pen and it is legal to do so, administer the Epi-pen for them.

How to give EpiPen[®]

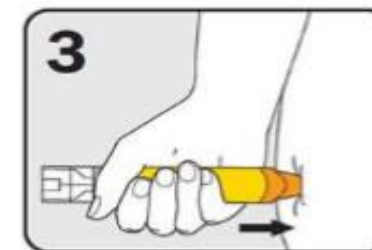
adrenaline (epinephrine) autoinjectors



1. Form fist around EpiPen[®] and **PULL OFF BLUE SAFETY RELEASE**



2. Hold leg still and **PLACE ORANGE END** against outer mid-thigh (with or without clothing)



3. **PUSH DOWN HARD** until a click is heard or felt and hold for 3 seconds **REMOVE EpiPen[®]**



- Encourage the victim to breathe slowly; calm them down
- The victim should rest until EMS arrives
- Monitor ABCs and begin CPR if required

.2 ASTHMA & HYPERVENTILATION

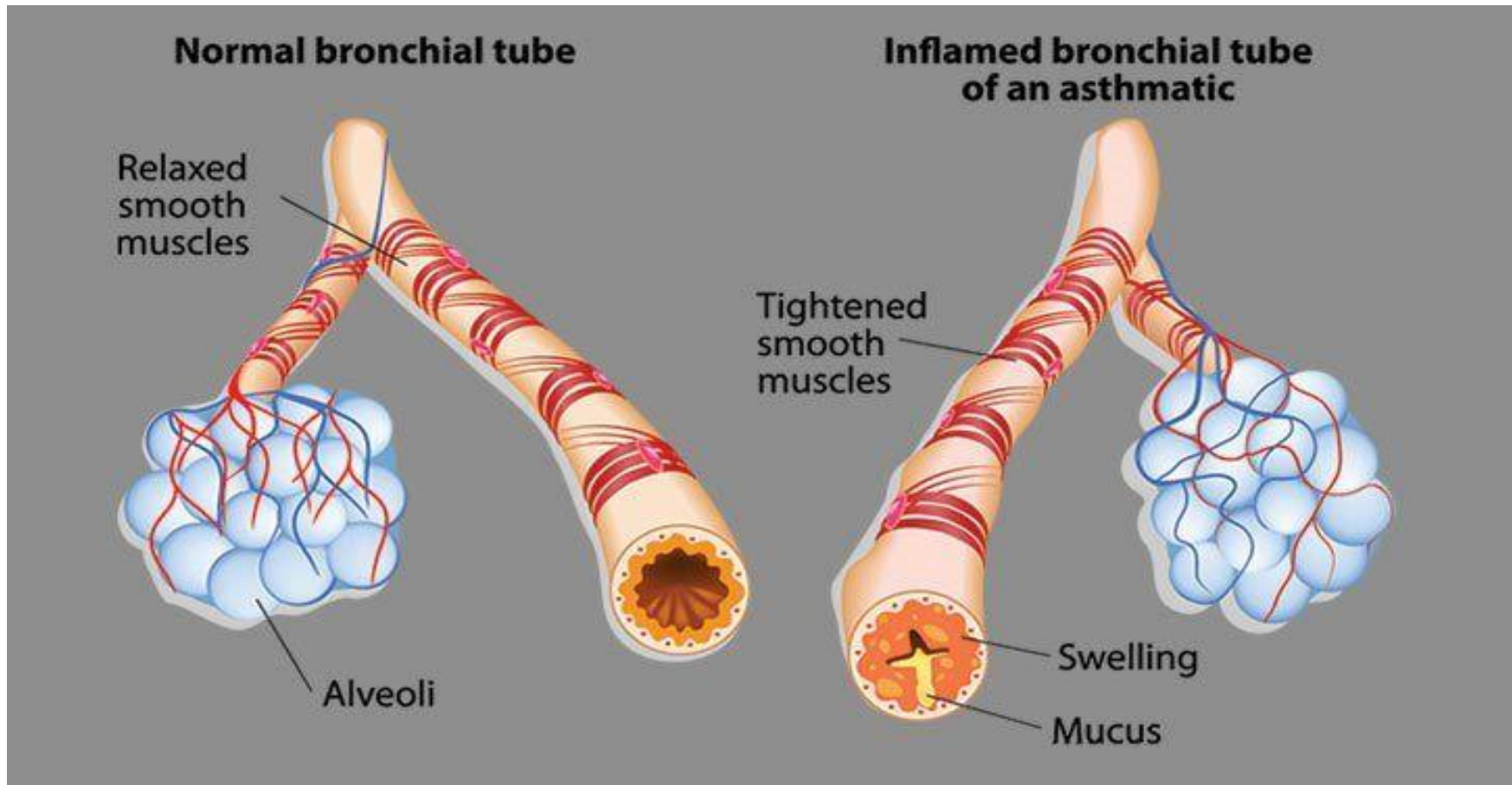
Recognition:

Asthma is a medical condition in which your airways narrow and may produce extra mucus. This can make breathing difficult and trigger coughing, a whistling sound (wheezing) when you breathe out and shortness of breath .

Famiy history of asthma is common.

Hyperventilation is simply breathing at an inappropriately high rate. Hyperventilation can be recognized by fast breathing which is inappropriate for the circumstances, a feeling of not being able to catch one's breath, and lightheadedness (dizziness.)

Asthma attacks are characterized by inflammation of the airway, which constricts air exchange



TREATMENT

- If the victim has a fast-acting inhaler for asthma attacks, help them self-administer the medication
- Have the victim match your breathing patterns
- calm the victim while slowing their breathing rate
- Call EMS if the victim's condition does not improve or if the victim's level of consciousness is lowered

Asthma inhalers come in several styles.



.3OBSTRUCTED AIRWAY

Signs of a severe airway obstruction

- The person desperately grabs at their neck - this is the universal sign of choking
- The person can not speak
- The person's face turns blue from lack of oxygen (cyanosis)

Check victim for choking .



Universal sign
of choking

 ADAM.

Abdominal thrusts (also called the Heimlich maneuver) is a first aid procedure used to treat upper airway obstructions (or choking) by foreign objects. It is an effective life-saving measure in cases of severe airway obstruction. A person performing abdominal thrusts uses their hands to exert pressure on the bottom of the diaphragm. This compresses the lungs and exerts pressure on any object lodged in the trachea, hopefully expelling it. This amounts to an artificial cough. (The victim of an obstructed airway, having lost the ability to draw air into the lungs, has lost the ability to cough on their own).

Abdominal thrusts are performed only on conscious adult or child victims with a severe airway obstruction.



Abdominal thrusts should never be performed on someone who can still cough, breathe, or speak .

encourage them to cough
instead.

OBSTRUCTED AIRWAY FOR ADULTS & CHILDREN

If the victim's airway obstruction is severe, then perform abdominal thrusts (Heimlich maneuver:(

- .1The rescuer stands behind the victim and wraps their arms around the victim's sides, underneath the victim's arms
- .2One hand is made into a fist and placed, thumb side in, flat against the victim's upper abdomen, below the ribs but above the navel (umbilicus(
- .3The other hand grabs the fist and directs it in a series of upward thrusts until the object obstructing the airway is expelled

HOW TO DO THE HEIMLICH MANEUVER

Do the Heimlich if the choking person:

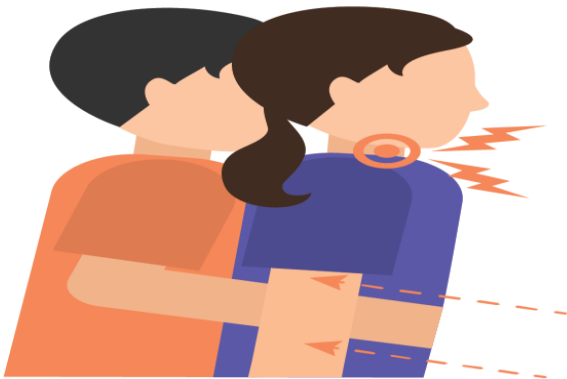
- Can't speak or cough
- Is conscious
- Is over 1 year old

1

Put the **thumb side** of your fist slightly above the person's bellybutton.

2

Hold your fist tight with your other hand.

3

Quickly thrust upward and inward into the person's belly.

4

Repeat several times until the choking object comes loose.



IF IT DOESN'T DISLodge OR THE PERSON FAINTS, DO **CPR** UNTIL **911** HELP ARRIVES.

Sources: National Safety Council. University of Maryland Medical Center.



The Tongue and Airway Obstruction

Airway obstruction in an unresponsive victim lying on his or her back is usually the result of the tongue relaxing in the back of the mouth, restricting air movement. Opening the airway with the **head tilt-chin lift method** may be all that is needed to correct this problem .

OBSTRUCTED AIRWAY FOR INFANTS

Instead of abdominal thrusts, alternate 5 chest thrusts with 5 back blows:



- Hold the infant with the head in your hand, and the spine along your forearm and the head below the rest of the body
- Compress the chest 5 times as you would for infant CPR
- Switch the infant to your other forearm, so their chest is now against the arm
- Perform 5 back blows, keeping the infant's head below the rest of the body
- Continue until the obstruction is cleared, or the infant goes unconscious

.1Support the infants head, neck, and back. Compress the chest 5 times as you would for infant CPR



.2Support the infants head, neck, and back. Give five back blows.



If a victim has become unconscious as a result of an obstructed airway, you should immediately call for assistance from the emergency medical services.



Thank you!