

# HSE

# First Aid

---

3<sup>RD</sup> SESSION

ENVIRONMENTAL ILLNESSES/INJURIES

POISONING

DIABETES

ASTHMA

# Environmental illnesses/injuries

Cold related

Illness/Injury	Signs/Symptoms	First Aid
Mild Hypothermia	Shivering, slurred speech Numbness Withdrawn	<ul style="list-style-type: none"> <li>Remove from cold</li> <li>Warm clothes</li> <li>Alert: <u>warm sweet drink</u></li> </ul>
Moderate – Severe Hypothermia	Breathing shallow/slow – <i>slow/absent</i> Shivering/slurred speech/no coordination – <i>shivering stopped/ no speech or coordination</i> Confusion/impaired judgement/sleepy – <i>unconscious</i>	<ul style="list-style-type: none"> <li>Remove from cold</li> <li><u>Do not rub/move</u> around</li> <li>Warm clothes</li> <li><u>Cover with blankets</u></li> </ul>
Superficial Frostbite	Feels numb and hard (soft underneath) Skin white Uncomfortable and red after warming	<ul style="list-style-type: none"> <li>Remove from cold</li> <li>Gently rewarm in water (37-40 degrees) x 20-30 minutes</li> </ul>
Deep frostbite	Feels numb and hard (not soft underneath) Shiny skin No feeling Very uncomfortable after rewarming	<ul style="list-style-type: none"> <li>Remove from cold</li> <li>Handle gently –</li> <li><u>Do not rub</u></li> </ul>
Frozen state	Unresponsive Body stiff Cannot depress tissue	<ul style="list-style-type: none"> <li>Activate EMS and police</li> </ul>

Heat related

- Causes/ risk factors: behavioral, environmental, physical
- Prevention: water, exercise, avoid peak hours, dress less, sunscreen

Illness/Injury	Signs/Symptoms	First Aid
Heat cramps	Muscle spasms in legs, arms, abdomen (During or after activity)	<ul style="list-style-type: none"><li>• Stop activity</li><li>• Rest in cool, shaded area</li><li>• Water/fluid with electrolytes</li></ul>
Heat exhaustion	Heavy sweating, cool skin Rapid, weak pulse Dizzy, blurred vision, headache Dilated pupils	<ul style="list-style-type: none"><li>• Cool, shaded area</li><li>• Unconscious: recovery</li><li>• Conscious: cool water/electrolyte drinks</li><li>• Cool with fanning, cool cloth</li></ul>
Heat stroke	Skin hot to touch and dry Panting Rapid, weak, irregular pulse Restless, headache, dizzy, nausea/vomiting Convulsions leading to unconsciousness	<ul style="list-style-type: none"><li>• Remove to cool area asap</li><li>• Start cooling asap</li><li>• Immerse in cool water up to chin, or gently pour cold water till skin cool or LOC improves</li><li>• Place in shock position</li><li>• Monitor; cool clothes while waiting for EMS</li></ul>

# Poisoning

ENTRY ROUTE	SIGNS AND SYMPTOMS
<b><u>Ingested</u></b> Food, plants Cleaners Petroleum base, Pills, drugs	Mouth and throat irritation Stomach and intestinal upset Pain, cramps, nausea, vomiting
<b><u>Inhaled</u></b> Smoke, gases	Nose, eyes, lungs irritation Coughing, wheezing, difficulty breathing
<b><u>Injected</u></b> Drugs Animal/insect bites	Skin irritation at site – pain, swelling, red, itching Nausea or breathing difficult possible
<b><u>Absorbed</u></b> (through skin surface) Natural plants/oils Chemicals	Skin irritation – burning, itching, swelling, color

**Eventually other body systems can also be affected:**

**Headaches, drowsiness, nausea, loss of coordination, decreased level of consciousness, changes in respiration and pulse, changes in pupils, shock, death**

- Important to ask these questions when faced with a possible poisoning case.
  - What type of poison was the person exposed to? **TYPE**
  - How much poison entered the body? **QUANTITY**
  - How did the poison enter the body? **ROUTE**
  - When did the poisoning occur? **TIME**

**You will answer those questions when you call the poison center.**

**The Centre antipoison du Québec (Québec poison control centre) is an emergency telephone service available 24 hours a day, 7 days a week. **1 800 463-5060****

# First Aid

## FIRST AID

1. Scene survey

Take precautions not to expose yourself

2a. Conscious patient: 4 facts to determine history

Contact local poison information center and follow instructions

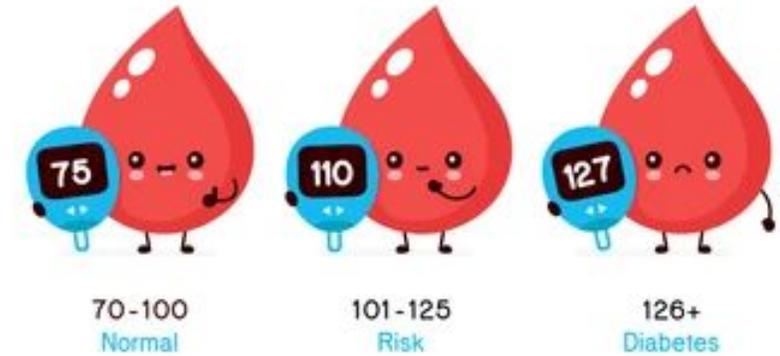
2b. Unconscious person: activate EMS and monitor ABC

3. Place in recovery position and continue monitoring

4. If stops breathing, start CPR

ENTRY ROUTE	FIRST AID
Ingested	Do not induce vomiting or allow pt to drink anything Wipe and rinse mouth with cool water
Inhaled	Move pt to fresh air Conscious – monitor; unconscious – CPR
Injected	Allow site to bleed Wash area with soapy water, seek medical assistance
Absorbed	Dry chemical: carefully brush off, flush with cool water x15 min. Remove contaminated clothing Wash affected area with soapy water (esp. folds, nailbeds)

# Diabetes



- Diabetes? Body unable to regulate insulin and sugar
- Insulin? Hormone produced by pancreas that helps store and use glucose

Unconscious? Seizure? Suspected sugar coma? Unable to follow commands ☐ **911**

Hypoglycemia	Hyperglycemia
<ul style="list-style-type: none"> <li>☐ Hunger</li> <li>☐ Irritability</li> <li>☐ Trouble concentrating</li> <li>☐ Fatigue</li> <li>☐ Sweating</li> <li>☐ Confusion</li> <li>☐ Fast heartbeat</li> <li>☐ Shaking</li> <li>☐ Headache</li> </ul>	<ul style="list-style-type: none"> <li>☐ Extreme thirst</li> <li>☐ Dry mouth</li> <li>☐ Weakness</li> <li>☐ Headache</li> <li>☐ Frequent urination</li> <li>☐ Blurry vision</li> <li>☐ Nausea</li> <li>☐ Confusion</li> <li>☐ Shortness of breath</li> </ul>

HYPOGLYCEMIA SYMPTOMS		HYPERGLYCEMIA SYMPTOMS	
			
SWEATING	PALLOR	DRY MOUTH	INCREASED THIRST
			
IRRITABILITY	HUNGER	WEAKNESS	HEADACHE
			
LACK OF COORDINATION	SLEEPINESS	BLURRED VISION	FREQUENT URINATION

# First Aid

- Diabetic emergency?
- Hypoglycemia  
(low blood sugar □ needs sugar),
- Hyperglycemia  
(high blood sugar □ needs insulin)

## EXAMPLES OF 15 GRAMS OF CARBS TO TREAT HYPOGLYCEMIA:

The infographic features a central circular graphic with a blue and white color scheme. It lists eight examples of 15 grams of carbohydrates, each accompanied by a small icon: a banana, a glass of orange juice, a spoon with sugar, saltine crackers, a bottle of glucose tablets, a bowl of oatmeal, a slice of bread, and a pear.

- ½ BANANA
- ½ CUP OF ORANGE JUICE
- 1 TABLESPOON OF SUGAR OR HONEY
- 4-5 SALTINE CRACKERS
- 3-4 GLUCOSE TABLETS
- ½ CUP OATMEAL
- 1 SLICE OF BREAD
- SMALL PIECE OF FRUIT

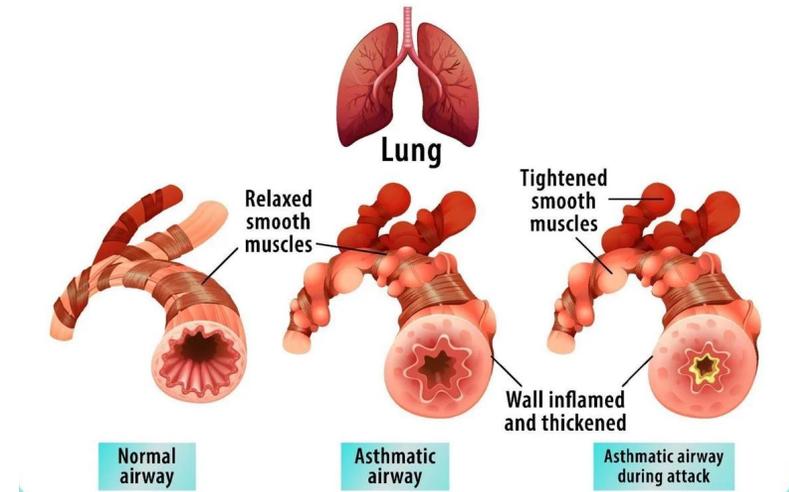
TRIFECTA HEALTH

# Asthma

Asthma is a serious medical condition that is caused by constricted airways that get narrowed and swell. It could be life threatening if not treated with medication as soon as possible.

## Symptoms:

- Wheezing
- Coughing
- Chest tightness becoming severe and constant
- Being too breathless to eat, speak or sleep
- Breathing faster & fast heartbeat
- Drowsiness
- Exhaustion or dizziness
- Blue lips or fingers
- Fainting



# First Aid

FIRST AID
Scene safety. What happened?
Sit patient in comfortable position to help breathing
Primary survey. Activate EMS
Assist in medication administration if available
Monitor, treat for shock. Reassure

- Be mindful when helping in medication administration. You can help preparing the medication for the person in need but NOT give it to them unless they give you consent.
- If the person in need gives you consent to administer their own medication (ex. insulin or inhalation pump) then you may proceed to give it if you know how.
- Avoid administering any type of medication if you aren't sure how to.



**HSE**

HEALTH SAFETY ENVIRONMENT