Hydrofluoric acid (HF) is very corrosive, highly irritating and poisonous. HF burns can be severe and extremely painful, causing extensive damage to the skin and eyes, and to the mucous membranes if breathed or swallowed. HF is absorbed quickly and can cause widespread damage to the body and death. Any person contaminated with HF must have immediate first aid, followed by medical treatment from a physician as soon as possible.

**HF FIRST AID PROCEDURES**

**Skin Exposure**
1. Move the victim immediately under an emergency shower or other water source and flush the affected area with large amounts of cool running water. Immediately washing off the acid is of primary importance.
2. Remove all contaminated clothing while flushing with water.
3. While the victim is being rinsed with water, someone shall notify the lab manager (x68923) and arrange for emergency medical assistance (911 if a large area of exposure is involved, or for lesser injuries call the Occupational Health Facility at 17-064 CHS, Ext. 64585).
4. Immediately after flushing with water begin massaging the calcium gluconate gel into the burn site. Apply the gel every 15 minutes and massage until pain/redness resolve or until medical care is available. Wear gloves when applying the gel to prevent transfer of HF and secondary burns.

**Eye Exposure**
1. Immediately flush eyes for at least 15 minutes with copious cool flowing water.
2. If only one eye is affected, be careful not to flush contaminated water into the other eye.
3. Take the victim to a physician immediately and apply ice water compresses during transport.

**Inhalation**
1. Ensure the victim's clothing or skin has not been contaminated by HF, before removing him to fresh air.
2. If breathing has stopped, begin artificial respiration.
3. Call 911 for immediate medical assistance.

**Swallowing**
1. Rinse the mouth with cold water. Do not induce vomiting.
2. If the victim is conscious, have them drink lots of water to dilute the acid followed by a glass of milk or milk of magnesia.
3. Call 911 for immediate medical assistance.

**REMEMBER, ALL PERSONNEL IN THE LAB, NOT ONLY THOSE WORKING WITH HF, SHOULD KNOW WHERE THE FIRST AID EQUIPMENT IS KEPT AND HOW TO CARRY OUT THE FIRST AID PROCEDURES FOR AN HF EXPOSURE OR BURN.**