

CALTECH ENVIRONMENT, HEALTH AND  
SAFETY OFFICEEmergency Procedures for  
Hydrofluoric Acid (HF) Exposure

Please post these procedures in areas where HF is used. All exposures to HF should receive immediate first aid and medical evaluation even if the injury appears minor or no pain is felt. HF can produce delayed effects and serious tissue damage without necessarily producing pain.

In the event of HF exposure, immediately start the first-aid procedures described below to avoid HF burns or other permanent damage. Once first aid has been started, **call ext 5000**.

**First Aid for Skin Contact**

- Immediately (within seconds) proceed to the nearest eyewash or shower and wash affected area for 15 minutes.
- Remove all contaminated clothing while in the shower.
- Apply Calcium Gluconate Gel\* to the affected area. Re-apply Gel every 15 minutes until emergency medical assistance arrives.

**First Aid for Eye Contact**

- Immediately proceed to the nearest eyewash station
- Thoroughly wash eyes with water for 15 minutes while holding eyelids open
- **Do not** apply calcium gluconate gel to eyes.

**First Aid for Ingestion**

- **Do not** induce vomiting
- If conscious give large quantities of milk or water

**First Aid for Inhalation**

- Remove to fresh air
- Get medical assistance immediately

**All exposures to HF require medical attention, if exposure is suspected, contact ext. 5000.**

*\* Calcium Gluconate Gel is available for purchase through the EH&S Office, contact ext. 6727 for more information.*