

### Information and recommendations for patients

- **Patients whose clothing or skin is contaminated with liquid acrylonitrile can secondarily contaminate rescue and medical personnel by direct contact or through evaporation of acrylonitrile. Patients exposed only to acrylonitrile vapor (boiling point 77°C, 171°F, respectively) do not pose a significant risk of secondary contamination. Acrylonitrile's odor provides inadequate warning of hazardous concentrations.**
- **Acrylonitrile irritates skin, eyes, and the respiratory tract. It is well absorbed by the lungs, the gastrointestinal tract and through the intact skin and causes systemic effects which may include shortness of breath, drowsiness, unconsciousness, irregular heartbeat, low blood pressure, and jaundice.**
- **Treatment consists of supportive care and initial administration of oxygen. Antidotal treatment should be considered.**

#### Substance information

Acrylonitrile (CH<sub>2</sub>=CH-CN), CAS 107-13-1

Synonyms: Vinyl cyanide, propenenitrile.

At room temperature (boiling point 77°C, 171°F, respectively) acrylonitrile is a clear, colorless-yellow, volatile, and flammable liquid with an unpleasant odor.

Acrylonitrile is used in the production of acrylic fibers, styrene plastics and adhesives. Such fibers and plastics are used in clothing, furniture, construction materials, motor vehicles and food packing.

#### What immediate health effects can result from exposure to acrylonitrile?

Most exposures to acrylonitrile occur from breathing the vapor. Liquid acrylonitrile or high vapor concentrations are well absorbed through intact skin. Besides irritation of skin, eyes, and respiratory tract, shortness of breath, chest tightness, headache, drowsiness, convulsions, irregular heartbeat, low blood pressure and jaundice may occur. In the body, acrylonitrile forms cyanide.

#### Are any future health effects likely to occur?

A single small exposure from which a person recovers quickly is not likely to cause delayed or long-term effects. After serious exposure brain and liver damage may develop.

## Follow-up instructions

Keep this page and take it with you to your next appointment. Follow only the instructions checked below.

- ( ) Call your doctor or the Emergency Department if you develop any unusual signs or symptoms within the next 24 hours, especially:
  - coughing or wheezing
  - difficulty breathing or shortness of breath
  - increased pain or a discharge from exposed skin or eyes
  - chest pain or tightness
  - irregular heartbeat
- ( ) No follow-up appointment is necessary unless you develop any of the symptoms listed above.
- ( ) Call for an appointment with Dr. \_\_\_\_\_ in the practice of \_\_\_\_\_  
When you call for your appointment, please say that you were treated in the Emergency Department at \_\_\_\_\_ Hospital by \_\_\_\_\_  
and were advised to be seen again in \_\_\_\_\_ days.
- ( ) Return to the Emergency Department/ \_\_\_\_\_ Clinic on (date) \_\_\_\_\_  
at \_\_\_\_\_ am/pm for a follow-up examination.
- ( ) Do not perform vigorous physical activities for 1 to 2 days.
- ( ) You may resume everyday activities including driving and operating machinery
- ( ) Do not return to work for \_\_\_\_\_ days.
- ( ) You may return to work on a limited basis. See instructions below.
- ( ) Avoid exposure to cigarette smoke for 72 hours; smoke may worsen the condition of your lungs.
- ( ) Avoid drinking alcoholic beverages; alcohol may worsen your clinical conditions.
- ( ) Avoid taking the following medications: \_\_\_\_\_  
\_\_\_\_\_
- ( ) You may continue taking the following medication(s) that your doctor(s) prescribed for you: \_\_\_\_\_  
\_\_\_\_\_
- ( ) Other instructions: \_\_\_\_\_  
\_\_\_\_\_

Signature of patient \_\_\_\_\_ Date \_\_\_\_\_  
Signature of physician \_\_\_\_\_ Date \_\_\_\_\_

### References

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