

Ricin

Personal Health Fact Sheet

What is Ricin?

Ricin is a potent toxin derived from the beans of the castor plant. The naturally occurring toxin is fairly easy to remove from bean pulp remaining after castor oil extraction. It may be formed into a powder or an aerosol for intentional airborne dispersal. Because of its toxicity and ease of production, ricin may be used as a biological weapon.

How is it spread?

The ricin toxin can be spread in three different ways:

- ▶ **Inhalation:**
 - People can breathe in ricin mist or powder and be poisoned. Inhaled ricin is much more toxic than exposure through other routes.
- ▶ **Ingestion:**
 - Ricin can be added into water or food and then be swallowed.
- ▶ **Injection:**
 - Pellets of ricin or ricin dissolved in a liquid can be injected into people's bodies.

Ricin poisoning is **not** contagious. It **cannot** be spread from person to person. It **cannot** be absorbed through intact skin.

How is it treated?

- ▶ There are no antidotes or vaccine to treat ricin poisoning. Hospital care is necessary to support the victim and to treat the effects of the toxin.
- ▶ If health care providers suspect a patient has been exposed to ricin, they must contact their local health department.

SYMPTOMS OF RICIN POISONING Symptoms of exposure depend on how much exposure occurred and how the person was exposed.

- ▶ After exposure, symptoms would begin from 3 hours to several days.

Inhaled ricin:

- ▶ Flu-like symptoms such as cough, weakness, fever, nausea, muscle aches, and difficulty breathing.
- ▶ Respiratory or circulatory failure can result in death

Ingested ricin:

- ▶ Symptoms such as nausea, vomiting, diarrhea, fever, and abdominal pain.
- ▶ Bleeding in the gastrointestinal tract, failure of liver, spleen, and kidneys can result in death.

Injected ricin:

- ▶ Marked death of muscles and lymph nodes near the injection site
- ▶ Failure of organs and death



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