

BENZ-OUT

FOR DECONTAMINATION OF FIREFIGHTER TURNOUT GEAR

Brought to you by -

The Washington Fire Chiefs & EF Recovery

Reduce firefighter's exposure to cancer causing substances by spraying turnout gear with **Benz-Out** after every exposure to hazardous residues.

Structure fires contain many building materials that can expose firefighters to toxic substances which can decompose, resulting in the off-gassing of products that contain aldehydes, benzene, hydrocarbons, ketones and more. They reform into many different compounds. Virtually all of these materials contribute to a significant increase in a firefighter's risk of cancer.



What does contamination do?

Dirty clothing reflects less heat, is more conductive and can be less breathable. Some kinds of hydrocarbons and other chemicals can make clothing more flammable and also make it hazardous. The longer firefighters are exposed to contaminants, the greater the hazard to health. If turnout gear is not properly maintained, exposure is much greater and more constant as the contaminants will continue to off-gas.

How to deal with contamination

- Keep clothing clean and well maintained.
- Monitor clothing for signs of contamination and decontaminate completely before personnel and equipment are returned to the station.
- Do not hang untreated turnout gear in the station or store in your car.
- Clean seats in vehicles and any other surface touched by contaminated turnout gear or equipment.
- Develop a protocol for dealing with contaminants.

Firefighter Health and Safety from EF Recovery

877.213.9047

BENZ-OUT PROTOCOL INFORMATION

Test Data Summary

Several tests were run with regular gasoline placed onto an absorbent material. Initial results varied from 5 to 0.5 ppm benzene and application of Benz-Out spray on these samples resulted in 0 benzene reading in one to five minutes. Since this is a passive treatment, it takes some time for the Benz-Out to penetrate the surfaces and neutralize the contamination. Similar results were found when measuring the overall VOC level.

These tests were performed using a handheld UltraRae 3000 PID meter utilizing c6h6 Benzene Separation Tubes.

NFPA 1851 prohibits scrubbing or spraying with high velocity water jets to clean turnouts. Immediate rinsing or cleaning with a mild dishwashing detergent is recommended. The initial results from the testing indicate that Gold Crew Benz-Out suppresses benzene effectively with a passive spray. The time frame for effective results appears to be a function of how contaminated the material is, the amount of Gold Crew Benz-Out used and the porosity of the material the chemistry is applied to. Benz-Out is an effective decontamination agent for use on turnouts and other firefighter apparatus.

Application of Benz-Out Solution

The Benz-Out solution should be applied in a light spray covering all exposed surfaces of the turnout gear. It is best applied before the turnout gear has been removed.

EF Recovery

For Professional Use

BENZ-OUT

DO NOT DILUTE

Safe • Effective • Biodegradable

DIRECTIONS: Benz-Out is a READY TO USE decontamination agent. Do not dilute. Follow Program Guidelines for proper decontamination of turnouts and equipment.

Made in the USA
Net Contents 5 US Gallons



Emergency First Aid Procedures

Eyes: Flush thoroughly with water. Get medical attention if needed.
Skin: Remove contaminated clothing. Wash exposed area with water. Wash clothing before reuse.
Ingestion: Get medical attention.
Inhalation: None considered necessary.

Soins d'urgence

Yeux : Bien rincer. Consulter médecin si nécessaire.
Peau : Retirer vêtements souillés. Rincer partie ayant été en contact avec produit. Laver vêtements avant de porter.
Ingestion : Consulter médecin.
Inhalation : Aucun soin nécessaire.

Procedimientos de primeros auxilios en caso de emergencia

Ojos: Limpielos concienzudamente con agua. Solicite atención médica si es necesario.
Piel: Retire la ropa contaminada. Lave con agua la zona de piel expuesta. Lave la ropa antes de volver a utilizarla.
Ingestión: Solicite atención médica.