

# **Module 4: Disaster Medical Operations**

## **Lesson 11: Introduction to Disaster Medical Operations**

### **Self-Study Guide**

## Lesson Overview

**Lesson Overview** This lesson will help you prepare to take classroom training in disaster medical operations. The lesson describes the CERT medical role and previews what you will learn in other lessons about carrying out that role. It also reviews some important precautions that you should take to protect yourself.

**Lesson Objectives** After completing this lesson, you should be able to:

- Describe the CERT role in disaster medical operations.
- Identify safety precautions for medical operations workers.

**Estimated Time** 15 minutes

**Contents** This lesson includes the following sections:

- Lesson Overview
- The CERT Role
- Protecting Yourself
- Lesson Summary

### Lesson Overview

In a disaster, victims may need life-saving or life-sustaining treatment. As a CERT member, you may become a first responder because professional help is not immediately available.

#### What can you do?

In a disaster setting, CERT members may assist in providing immediate care for life-threatening injuries by:

- Performing triage and rapid treatment for victims.
- Establishing medical treatment areas.
- Performing head-to-toe assessment and treatment.
- Managing disaster-related stress for themselves and victims.

### Planning for Disaster Medical Operations

In planning for disaster medical operations, we make a few assumptions.

- First, disasters often cause trauma-related injuries, and local medical resources may be overwhelmed or delayed in responding.
- Second, survivors of the incident will be the first source of help to victims and need to know what to do to help.

### What Can You Do?

As a trained CERT member, you can provide help where it's needed most by conducting triage, by providing immediate care and life-saving and life-sustaining treatment, by performing head-to-toe assessments and providing treatment, by establishing medical treatment areas, and by managing disaster-related stress in yourself and in the survivors that you encounter.

In this lesson, you'll learn more about your role in disaster medical operations and how to protect yourself and your buddy while carrying out that role.

### Time Is Critical

When a disaster occurs—whether an earthquake, a flood, or a smaller event—trauma-related injuries often result.

The injuries can run the gamut from nonserious to life-threatening to fatal. For some, early intervention will make the crucial difference between life and death.

### The CERT Role

Following a disaster, neighborhood and workplace teams can respond more quickly to critical needs in their area than professional responders. When professional responders do arrive, CERT members take direction from them and may be asked to assist them.

CERT classroom training will prepare you to help disaster victims and teach you skills that may save lives.

### Your Goal

As a CERT member, your goal is to act safely to do the greatest good for the greatest number of victims. To do this, you need to be able to:

- Size up the situation to determine if it is safe to act.
- Triage victims quickly, identifying those with the most serious injuries.
- Treating those with life-threatening injuries first.

Understanding the potential for death due to injuries will help you prioritize victims' needs and your efforts.

### Death From Trauma

Disaster trauma victims who die from their injuries can be divided into three categories:

1. Those who will die within minutes as a result of overwhelming and irreversible damage to vital organs.
2. Those who will die within several hours due to excessive bleeding.
3. Those who will die within several days or weeks from infection or multiple-organ failure (i.e., complications of the injury).

Understanding these phases can help you apply your training to do the greatest good for the greatest number of victims.

### Preventing Death From Disaster Trauma

Research has shown that more than 40 percent of disaster victims in phases 2 and 3 could be saved by providing simple medical care.

Knowledge Review



**Instructions: Select the correct answer. When you are finished, turn to the next page to check your answer.**

1. After a disaster, when CERT members respond to victims in their immediate areas before professional responders arrive, their main priority will be to:
  - Organize treatment areas for the responders when they arrive.
  - Keep onlookers away from the victims.
  - Triage victims and treat those with life-threatening conditions.

Knowledge Review: Answer Key



**Instructions: Compare your answer to the correct one shown below.**

1. After a disaster, when CERT members respond to victims in their immediate areas before professional responders arrive, their main priority will be to:

- Organize treatment areas for the responders when they arrive.
- Keep onlookers away from the victims.
- Triage victims and treat those with life-threatening conditions.**

CERT members put their effort into **triaging and treating all victims and treating those with life-threatening conditions** first. With proper training, CERT members can use their skills to save lives.

### Safety Equipment

As a CERT member, protecting yourself must always be your first priority. Below are some important ways to protect yourself.

First, always wear your safety equipment, including:

- Work gloves.
- Goggles.
- Dust mask.
- Helmet.
- Boots.

The best type of mask is one labeled “N95,” which will filter particles as small as 3 microns.

Second, when working with a victim:

- Wear latex gloves, goggles, and mask to protect against exposure to body fluids and blood-borne pathogens, such as hepatitis and HIV.
- Be sure to change or sterilize gloves between victims. You'll learn more about changing and sterilizing gloves in the next lesson.

To save time, you can wear latex gloves under work gloves. Then, when you find a victim, you can just remove the work gloves and be ready to go.

### Distance for Protection

Third, know when to stay away.

You learned in earlier lessons about avoiding dangerous situations, such as unstable structures, hazardous materials, and sites of terrorist attacks. There are also some medical situations that you should avoid.

If there is evidence of chemical materials, do not approach! (For example, multiple victims gasping for air without an obvious reason could indicate chemical agents.) These situations are "stop signs" for CERTs. Leave the scene to avoid endangering yourself or spreading contamination.

Trained professionals with specialized equipment are needed to respond to these situations.

You'll learn more specific precautions in later lessons.

Knowledge Review



**Instructions: Select the correct answer. When you are finished, turn to the next page to check your answer.**

1. You are at an incident where many victims are dead or unconscious with no obvious cause. You should:
  - Put on all safety equipment before approaching the victims.
  - Leave the scene because of the possibility of chemical agents.
  - Call for backup, then begin evaluating victims.
  - Call for any victims within earshot to come to the sound of your voice.

Knowledge Review: Answer Key



**Instructions: Compare your answer to the correct one shown below.**

1. You are at an incident where many victims are dead or unconscious with no obvious cause. You should:
  - Put on all safety equipment before approaching the victims.
  - Leave the scene because of the possibility of chemical agents.**
  - Call for backup, then begin evaluating victims.
  - Call for any victims within earshot to come to the sound of your voice.

In any situation where chemical or biological agents may be present, you should **leave the scene** to avoid endangering yourself or spreading contamination. These situations are "stop signs" for CERTs.

**Module Overview:  
Lesson 12: Life-  
Threatening Conditions**

In this module, you will learn basic information about disaster medical operations, from victim assessment to setting up treatment areas.

Lesson 12 will introduce you to three life-threatening conditions—sometimes called the "killers."

You'll learn how to recognize these conditions: Airway obstruction, excessive bleeding, and shock. Then, you'll preview the steps in treating them.

The classroom training will provide the additional instruction and practice that you will need to develop these skills.

**Module Overview:  
Lesson 13: Triage**

In Lesson 13, you'll learn how to conduct triage, which is the process used to assess victims for the "killers" and determine the urgency of treatment needed.

Again, this lesson introduces concepts only. In the classroom training, the Instructor will help you to develop skills in conducting triage.

**Module Overview:  
Lesson 14: Medical  
Treatment Areas**

Lesson 14 will introduce you to the organizational structure of disaster medical operations.

You'll learn about:

- Setting up the treatment areas and morgue.
- Staffing each area.
- Keeping victim records.

**Module Overview:  
Lesson 15: Patient  
Assessment and  
Treatment**

The major focus of Lesson 15 will be on:

- Performing head-to-toe assessments.
- Treating common injuries.

The classroom training will provide the practice that you'll need to actually apply these skills.

**Module Overview:  
Lesson 16: Disaster  
Psychology**

Finally, Lesson 16 will discuss the psychological impact of disasters on CERT members and disaster victims.

In this lesson, you'll learn steps that you can take to reduce your personal stress level and to help survivors handle traumatic stress. You'll also learn how CERT Team Leaders can manage teams to reduce disaster-related stress.

Knowledge Review



**Instructions: Select the correct answer. When you are finished, turn to the next page to check your answer.**

1. This online course will prepare you to:
  - Treat emergency victims with life-threatening conditions.
  - Evaluate but not treat disaster victims.
  - Take classroom skills training in disaster medical operations.
  - Treat only common injuries.

Knowledge Review: Answer Key



**Instructions: Compare your answer to the correct one shown below.**

1. This online course will prepare you to:

- Treat emergency victims with life-threatening conditions.
- Evaluate but not treat disaster victims.
- Take classroom skills training in disaster medical operations.**
- Treat only common injuries.

This online course will prepare you **to take classroom skills training in disaster medical operations.** You will not be ready to apply the techniques presented in this course until you have completed the classroom training.

### Lesson Summary

In this lesson, you learned:

- As a CERT member, your goal is to stay safe and to do the greatest good for the greatest number of victims.
- Some disaster victims who would otherwise die from trauma-related injuries can be saved by early treatment. While waiting for professional responders, trained CERT members can provide that crucial early treatment.
- Not to try to apply the medical treatment skills covered in this course until you have completed the classroom training.

### Next Lesson

You have completed this lesson. You are now ready to begin Lesson 12: Treating Life-Threatening Conditions.