

Quarterly training topic: When PPE goes bad...

General discussion:

Responding to and providing emergency medical care <u>WILL</u> put you and your fellow clinicians at risk of exposure to infectious diseases and bloodborne pathogens. The consistent use of proper personal protection equipment is one of the fundamental ways you can reduce your chances of an exposure. If an exposure does occur, what are the steps you should take?

Personal Protective Equipment (PPE) Requirements

MCFRS mandates the use of appropriate PPE to minimize the risk of exposure to bloodborne/airborne pathogens. The selection of PPE is based on the anticipated exposure to blood or other potentially infectious materials (OPIM). The following guidelines are outlined:

Gloves

• **Medical-grade gloves**: Required for all patient care procedures involving potential contact with blood or OPIM, such as IV insertions, dressing open injuries, and airway management.

Masks and Eye Protection

- Medical-grade face masks: To be worn by direct patient care providers in situations where blood and/or body secretions could be splashed into the provider's mouth or in suspected cases of airborne transmitted diseases. (Surgical masks are the minimum level of protection with N95 needed for airborne precautions)
- Eye protection: Should be worn when there is a risk of blood or body fluids splashing into the eyes. Options include glasses, goggles, or face shields.

Gowns and Protective Clothing

• **Gowns**: To be worn during emergency childbirth or uncontrolled bleeding situations where there is a possibility of blood spattering. Note: if not worn, the best action is to change soiled clothing as soon as possible and shower or wash any skin that may be contaminated with blood.

Handling of Sharps

• Needles and sharp instruments: Must be disposed of in red, heavy impervious containers marked "biohazard." These containers should be disposed of at the receiving hospital according to their infection control procedures or via a licensed biohazard waste removal contractor.

Hand Hygiene

• **Hand washing**: Thorough hand washing should be performed after each patient transport, even when gloves are worn. Waterless antiseptic hand cleaners or towelettes must be available on all EMS vehicles.

Response Steps in the Event of an Exposure

In the event of exposure to blood or OPIM, MCFRS personnel are required to follow a structured response protocol:

1. Immediate Actions:

- o **Provide immediate first aid/decontamination**, seek treatment from FROMS or local ED. (You will register as a patient at the local ED)
- o **Notify hospital staff** of the exposure.
- o Notify the on-duty Safety Officer to investigate the exposure/injury.
- Notify the EMS Duty Officer.

2. **Reporting**: (Duty Officer)

- Complete the Blood/Body Fluids/Airborne Exposure Information
 Form and share the information collected. (See form)
- Report details of the exposure to the Fire and Rescue Occupational Medical Section (FROMS) at 240-777-5185. After hours and weekends, report by calling the FROMS exposure hotline at 240-777-5085 and leave details regarding the exposure.
- o If FROMS is closed, seek immediate treatment in the Emergency Department (ED). Personnel must register as a patient.
- o **File a First Report of Injury Report** online at <u>www.mcsip.org</u> or by calling 1-888-606-2562

Scenarios to consider

You are dispatched to a BLS sick person with minimal additional notes/comments.

-What are your initial PPE considerations?

Upon arrival the pt's wife meets you at the door and escorts you back to the patient's room. As you approach the patient you hear a wet and sustained episode of coughing. She is explaining the patient has been sick for several days and now has a cough and fever.

- -Has the new information and patient presentation caused you to consider revising your PPE? If so, what might you also consider using? Would you consider anything for the patient as well?
- -What if you are dispatched for an OB patient. While in route you read the CAD comments alerting you of eminent birth.
- -What are your initial PPE considerations for this call type? What changes would you make after reading the CAD notes?

EMS PPE Plan summary

Typical call and possible real-world progression:

Review the CAD comments. Minimally you will need gloves while eye protection and a surgical mask are encouraged. A mask is required if requested by the patient or bystanders and/or when a facility requires masking upon entry.

If the patient needs respiratory management (BLS-ALS) and/or the patient has respiratory illness symptoms (cough/congestion/COVID or similar concern) then eye protection

and an N95 mask are required. Additionally, the patient should be provided a surgical mask when possible and as appropriate.

If the risk of splashing bodily fluids or secretions is present, then an isolation gown is required.

Note: Use the ventilation fan and do not linger in the transport unit more than necessary during transport of the patient with respiratory illness/COVID or when similar airborne pathogens may be present. Have additional passengers wear a surgical mask as well.

Blood/Body Fluids/Airborne Exposure Checklist

In the event of exposure, conduct the following immediately:

- · Provide immediate first aid
- · Notify hospital staff of exposure
- \cdot Notify on-duty Safety Officer to investigate exposure / injury
- · Notify the EMS Duty Officer
- The EMS Duty Office must complete the chart below and share the information collected :

Date of Exposure * / / / / MM DD YYYY
Time I DEFINITION OF THE PROPERTY OF THE PROP
Name of Exposed Personnel *
Phone Number for Exposed Personnel
Assignment *
· ·
Shift *
Email *
@montgomerycountymd.gov
Name of Source Patient
Admitting Hospital (if applicable)
N/A ~
If Other, please enter Admitting Hospital Here:
Time of Arrival to Admitting Hospital I AM V HH MM SS AM/PM

MCFRS Personal Protection & Exposure Control Knowledge Check

1. When are you required to wear a mask?

- A. When you feel like it
- B. On all calls
- C. When the patient or their representative requests mask utilization
- D. When the patient or their representative has one on

2. What should you do immediately after removing disposable gloves?

- A. Place them in your pocket
- B. Wash hands thoroughly
- C. Reuse them if clean
- D. Toss them in the regular trash

3. Who is responsible for filling out the Blood/Body Fluids/Airborne Exposure checklist?

- A. You as the patient
- B. The station officer
- C. The on-duty EMS Duty officer
- D. The on-duty Safety officer

4. What is the correct action if you experience an exposure to blood or body fluids on scene?

- A. Wait until the end of your shift to report it
- B. Provide immediate first aid/decontamination
- C. Wash your hands and continue working
- D. Ask the patient to sign a release form

5. Which PPE item is recommended for use during emergency childbirth?

- A. Respiratory assist device
- B. Protective gown and face shield
- C. Heavy-duty gloves
- D. N95 mask

6. True or False: Proper PPE use guarantees I will never have an exposure.

- A. True
- B. False

7. What is the preferred method for cleaning contaminated skin after an exposure?

- A. Baby wipes
- B. Alcohol
- C. Thorough washing with soap and water
- D. Sanitizing spray

8. If FROMS is closed, what should personnel do after a confirmed exposure?

- A. Wait until business hours
- B. Report to the Emergency Department for treatment
- C. Go home and rest
- D. Call the fire chief directly

Answer Key and Explanations

- 1. When are you required to wear a mask?
- C. When the patient or their representative requests mask utilization

Explanation: Masks are required when the patient, patient representative(s) or the facility requires the utilization of a mask.

- 2. What should you do immediately after removing disposable gloves?
- **✓** B. Wash hands thoroughly

Explanation: Hand hygiene must follow glove removal to eliminate any contaminants that may have penetrated or contaminated the gloves during use.

- 3. Who is responsible for filling out the Blood/Body Fluids/Airborne Exposure checklist?
- C. EMS Duty Officer

Explanation: The on-duty EMS Duty officer is responsible to fill out and share the information in the Blood/Bodily Fluids/Airborne Exposure Checklist

- 4. What is the correct action to take if you experience an exposure to blood or body fluids on scene?
- **B.** Provide immediate first aid/decontamination followed up with seeking immediate treatment from FROMS or a local ED.

Explanation: Immediate care and prompt reporting are vital for medical evaluation and initiating post-exposure protocols.

5. Which PPE item is recommended for use during emergency childbirth?

✓ B. Protective gown

Explanation: Gowns and a shield protect the provider from blood and fluid exposure, which is likely during childbirth.

6. True or False: Proper PPE use guarantees I will not have an exposure.

B. False

Explanation: Unfortunately, there is no guaranteed method of protecting oneself completely from an exposure. It is important to note that the proper use of PPE will help to significantly decrease the chances of an exposure and is why MCFRS provides PPE materials and has policies in place to encourage, as well as mandate, PPE use guidelines for our clinicians.

7. What is the preferred method for cleaning contaminated skin after an exposure?

C. Thorough washing with soap and water

Explanation: Immediate washing with soap and water is recommended for removing pathogens from the skin.

8. If FROMS is closed, what should personnel do after a confirmed exposure?

☑ B. Report to the Emergency Department for treatment

Explanation: When Occupational Medical Services are unavailable, EDs serve as the backup for exposure treatment and documentation.