

FAD PReP/NAHEMS Tactical Topics:

Personal Protective Equipment

Information is based on the **Foreign Animal Disease Preparedness and Response Plan (FAD PReP)/National Animal Health Emergency Management System (NAHEMS) Guidelines: Personal Protective Equipment (PPE) (2011)** to be used in training for or during an animal health emergency. References to the Guidelines sections are provided in parenthesis for more detail.

Introduction/Overview: Personal protective equipment (PPE) places a barrier between responders and hazards. With appropriate use and decontamination/disposal, PPE serves two roles in an animal health emergency response:

1. Protects responders against potentially harmful hazards (biological, chemical, physical, environmental); and
2. Prevents the spread of hazards (pathogenic agents) between animals and locations.

FOR QUESTIONS REGARDING THE SELECTION AND USE OF PPE: Contact your immediate supervisor or the Safety Officer. Follow chain of command.

Responsibilities for PPE within the ICS (1.1)

- Incident Commander (IC): Holds ultimate responsibility for selection and utilization of PPE and ensures compliance with APHIS Respiratory Protection Program.
- Safety Officer (SO): Consults with IC on risk assessment and PPE selection. Verifies all personnel are trained, fit tested and medically cleared to use PPE and maintains related documentation. Briefs veterinary responders regarding nature of hazard, safety, hygiene and PPE requirements.
- Veterinary Responder: Understands and complies with all PPE policies. Medically cleared, fit tested and trained to use the required PPE. Inspects, dons, doffs, decontaminates, maintains, disposes and replaces PPE as needed. Seal checks tight-fitting respirators. Aware of limitations and risks of working in PPE, and is able to respond to adverse events. Uses the buddy system for safety while using PPE.

Terminology

Medical Clearance (3.1)

- Evaluation by a qualified licensed health care provider to ensure the responder is physically suited to wear respiratory protection while working in a hazardous environment.

Fit Test (3.1)

- Process of assuring that an assigned respirator provides an adequate seal to the face.
 - **APHIS Respiratory Protection Program Policy** outlines polices for medical clearance and fit testing (Appendix B).

Seal Check

- Performed by the user each time the respirator is donned to determine if the respirator is properly seated to the face.

Reduce Hazard Exposure

- Wear PPE as directed. PPE is chosen based on risk of potential exposure to hazards – biological, chemical, physical, and environmental. (5)
- Be familiar with the type of equipment for each of OSHA's 4 levels of protection (Level A-D). (4)
- Comply with Level C PPE, which is adequate for most FAD outbreaks, unless otherwise directed. Includes: goggles/face shield, inner and outer gloves, seasonally appropriate inner clothes, long-sleeve outer coveralls with head cover/hood, boots/shoes appropriate for assigned tasks, and an air purifying respirator. (4)
- Follow all safety measures, especially when responding to a zoonotic disease. (2.7)
- Properly don, and doff PPE in an appropriate sequence to avoid cross contamination. (6) (Appendix A)
- Follow the protocol for health emergencies.
- Know the location of treatment facilities. (2.6)
- Mitigate hazards related to biosecurity risks and the spread of disease.
- Report all unmitigated hazards and PPE defects to the immediate supervisor.

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Donning/Doffing (6) (Appendix A)

- Assemble and inspect all PPE items for damage before use.
- Establish and follow Work Zone protocols through the Hot, Cold, and Warm Zones. (6.1)
 - Hot Zone - Exclusion Zone (EZ) - Potentially contaminated and considered unsafe.
 - Warm Zone – Contamination Reduction Zone (CRZ) - Risk of exposure to pathogens and chemical disinfectants.
 - Cold Zone – Support Zone (SZ) – “Cleanest” work zone, lowest risk of exposure to pathogens or other hazards.
 - Decontamination Corridor – Level of contamination decreases as C&D is conducted during exit.
- Don PPE in the Cold Zone.
- Don equipment in the proper sequence so that PPE can be removed without cross contaminating inner clothes and exposing the responder to the harmful agent.
- Follow a general donning sequence of coveralls, followed by foot, hand, respiratory, eye/face, and head protection. Depending on the risk, higher level of protection may be required, such as steel toed shoes, multiple pairs of gloves, and hearing protection.
- Wear PPE in the contaminated areas, the Warm Zone and the Hot Zone.
- Do not enter the Hot Zone if not properly protected or properly trained.
- Decontaminate in the Decontamination Corridor using the 2-step process for cleaning and disinfecting. (6.1).
- Doff equipment in the proper sequence in the Decontamination Corridor so that PPE is removed without exposing the responder and cross contaminating inner clothes.
- Follow a general doffing sequence of unzipping coveralls and removing outer gloves. Touching only the inside of the coveralls, roll coveralls down inside-out to the waist. Follow by removing foot protection, coveralls, then respiratory, eye face, and inner hand protection.
- Dispose of contaminated equipment as directed.



Safety in PPE (6.2)

- Responder safety is the highest priority.
- Monitor yourself and others for physical and/or psychological stress, fatigue, overheating, and impaired vision and movement.
- Report any change in conditions which may prompt additional protection for eyes/face, hands, body, feet, head/hearing and respiratory system, including zoonotic exposures.
- Comply with time limits for wearing PPE.
- Do not carry cigarettes, gum, lip balm, food or drink into contaminated areas.
- Be aware of communication challenges.
- Always use the buddy system.