

Egg Harbor Fire Department and First Responders Standard Operating Policy

SUBJECT: RESPIRATORY PROTECTION PROGRAM

SOP 1206

PURPOSE: To have in place a policy that meets SPS 330.12 (1) (c).

SCOPE: This policy shall apply to all members of the Egg Harbor Fire Department.

DEFINITIONS:

Fit test: means the use of a protocol to qualitatively evaluate the fit of a Respirator on an individual.

IDLH: Immediately Dangerous to Life or Health: means an atmosphere that poses an immediate threat to life, would cause irreversible adverse health effects, or would impair an individual's ability to escape from a dangerous atmosphere.

Oxygen deficient atmosphere: means an atmosphere with an oxygen content below 19.5% by volume.

Physician or other licensed health care professional (PLHCP): means an individual whose legally permitted scope of practice (i.e., license, registration, or certification) allows him or her to independently provide, some or all of the health care services required for the medical evaluation.

Positive pressure respirator: means a respirator in which the pressure inside the respiratory inlet covering exceeds the ambient air pressure outside the respirator.

Qualitative fit test: means a pass/fail fit test to assess the adequacy of respirator fit that relies on the individual's response to the test agent.

SCBA: Self-contained Breathing Apparatus: means an atmosphere-supplying respirator for which the breathing air source is designed to be carried by the user.

A. Selection of Respirators.

1. The fire department has selected the MSA (Mine Safety Appliance) Self-contained breathing apparatus with a rated service life of 30 minutes for respiratory use. It is a NIOSH (National Institute of Occupational Safety & Health) - certified respirator. This respirator shall be used for routine responses.

B. Medical Evaluation.

1. The fire department shall provide a medical evaluation to determine the employee's ability to use a respirator, before the employee is fit tested or required to use the respirator in the workplace.
2. A licensed health care professional determined by the Town and Village of Egg Harbor will perform medical evaluations using a medical questionnaire or an initial medical examination that obtains the same information as the medical questionnaire.
 - a. Guidelines for Health Care Provider OSHA (Occupation Safety and Health Administration) Respirator Clearance
 1. Review employee OSHA Respirator Questionnaire.
 2. Review Company Respirator Questionnaire.
 - A. Review types of respirators to be used.
 - B. Review circumstances (physical conditions, activity level required, time needed) under which the respirators are being used.
 - C. Consider the substance for which the respirator is being used, any significant claustrophobia, respiratory or cardiac disease which may preclude their fitness for duty aside from filtering face piece usage.
 3. If positive answers for cardiac questions do diagnostic testing/physical as appropriate - fitness for these duties described on the Company Questionnaire is the goal.
 4. Baseline spirometer for all respirator users is recommended.
 5. If the employee answers "yes" to any questions in Section A #1-9, medical evaluation is indicated.
 6. Medical evaluation may include a physical, spirometer, EKG (Electro-Cardio Gram), or stress testing (non-nuclear) dependant on physical requirements of job in respirator.
 7. Disqualifying conditions for respirator use - per ANSI Z88.6 standard
 - A. Facial deformation which interferes with face/mask seal - ultimately determined by fit testing.
 - B. Eyeglasses: For full face piece, special frames should be used which do not interfere with the face/mask seal; Contact lenses: Must decide if contacts will interfere with proper use of respirator.
 - C. Hearing: Must have hearing appropriate for work conditions. If TM (tympanic membrane - ear drum) is perforated, employee cannot work with respirator in hazardous area where inhalation or absorption of toxic materials or vapors could occur.
 - D. Respiratory: Significant restrictive/obstruction or perfusion disease may preclude- look at Spirometer, possibly CXR, physical.

- E. Cardio vascular disease - angina, MI recent, if past MI need stress test post MI - up to 8 METs (how much energy required to do a given activity) of work, no chest pain.
- F. Neurological - need to perform coordinated movements, if epileptic on meds, seizure free X 1 year and no significant medical side effects. Then clear to wear respirator.
- G. Medication - if affect judgment, performance, alter state of consciousness.
- H. Psychological - if judgment affected, claustrophobia; may want to do field testing for severe anxiety.
- I. Facial Hair - Fire fighter may not wear a beard or facial hair that comes in contact with a face piece seal if the fire fighters duties require him or her to use a self contained breathing apparatus.

8. Complete “Medical Clearance” form. The duration of the clearance should be based on the respirator, exposure, duration, personal protective equipment, and physical status.

C. Follow-up medical examination.

- 1. The follow-up medical examination shall include any medical tests, consultations, or diagnostic procedures that the PLHCP deems necessary to make a final determination. The PLHCP shall make their determination by the completion of the stress test results. The Village and Town of Egg Harbor Fire Department will not be responsible for any testing further than a stress test (non-nuclear), EKG, and spirometer.

D. Fit testing.

- 1. The fire department shall ensure that all firefighters using SCBA pass an appropriate qualitative fit test.
- 2. All firefighters shall be tested at least annually or when there is a change of face piece.
- 3. Qualitative fit testing will consist of attaching a filter to the inlet of the face piece, using ventilation smoke (from MSA), and having the employee perform the following movements for approximately one minute.
 - a. normal breathing
 - b. deep breathing
 - c. turning head from side to side
 - d. nodding head up and down
 - e. talking in normal voice
 - f. screaming into face-piece.

E. Use of respirators.

- 1. See SOG 102.

F. Maintenance and care of respirators.

1. All SCBAs shall be checked during the weekly truck check for full air cylinders, low air alarm, straps in proper position, PASS device operational, face piece clean and straps in order.
2. After ever fire where the SCBA has been used it shall be the responsibility of the firefighters to make sure the SCBAs are cleaned, operational and put back on the proper trucks.
3. Whenever an SCBA does not operate properly it shall be taken out of service and reported to the Officer on Duty. Firefighters shall only perform level I maintenance with any SCBA, any maintenance beyond Level I shall be preformed by authorized service personnel only.
4. All SCBA shall be serviced annually by an MSA authorized service technician.
5. Cleaning procedures.
 - a. Clean the face piece assembly
 1. Rinse under hose or faucet.
 2. Use a manufacturer-approved cleaner/disinfectant and thoroughly wash face-piece. Submerge and rinse completely in clean warm water.
 3. Clean low pressure hose by rinsing and washing.
 4. Air dry thoroughly.
 - b. Clean rest of unit.
 1. Check harness for dirt, wipe clean.
 2. Use mild soap as cleaning agent, rinse thoroughly.
 - c. Re-inspect unit and place in proper position on trucks.

G. Breathing air quality and use.

1. Compressed breathing air shall meet at least the requirements for Type 1-Grade D breathing air.
2. Compressed breathing air samples from the compressor shall be sent in for testing at least twice a year to an independent testing lab to assure quality air.
3. All cylinders used on SCBAs shall be maintained and hydrostatically tested as required.

H. Training.

1. All employees shall be trained in the proper use of an SCBA before being permitted to use one.
 - a. All new firefighters shall receive their basic entry-level training through Wisconsin Technical College System Board Fire Training prior to wearing an SCBA.

2. All employees shall receive training on an annual basis that covers:
 - a. Why the SCBA is necessary and how improper fit, usage, or maintenance can compromise the protective effect of the SCBA;
 - b. What the limitations and capabilities of the SCBA are;
 - c. How to use the SCBA effectively in emergency situations, including situations in which the SCBA malfunctions;
 - d. How to inspect, put on and remove, use and check the seals of the SCBA.
 - e. What the procedures are for maintenance and storage of the SCBA;
 - f. How to recognize medical signs and symptoms that may limit or prevent the effective use of the SCBA

I. Record keeping.

1. All medical evaluation records shall be kept in the employee file in the Village of Egg Harbor Fire Station in a locked secure cabinet.
2. Fit testing records shall be kept in the Fit test log.