



OAKLAND COUNTY SHERIFF'S OFFICE

Policies and Procedures

	NUMBER 172	DATE May 16, 2005
SUBJECT: RESPIRATORY PROTECTION PROGRAM	DISTRIBUTION G.	
REFERENCE:		

POLICY

This Policy provides standards for the use of a Respiratory Protection Program. It consists of the policy, purpose, definitions and procedures for the use of the Self-contained Breathing Apparatus {S.C.B.A.}, use of the M95 Full Face Mask {gas mask}, use of the 3M model 8210 N95 {dust mask}.

PURPOSE

It is the policy of the Sheriff's Office that proper respiratory protection be provided and used in work areas where it is not practicable to reduce exposures to airborne contaminants to acceptable levels through the use of engineering controls or work practices.

The Sheriff's Office has determined that employees in the Gun Range, Patrol Services, Corrective Services and Technical Services may be exposed to respiratory hazards in certain events or situations. These hazards include exposure to lead dust while dry sweeping the range floor, biological respiratory hazards, including bacteria or viruses {i.e., Sudden Acute Respiratory Syndrome (S.A.R.S.), Tuberculosis (TB) or Smallpox}, exposure to radiation, smoke inhalation, nuisance gases, tear gas, vapors, and in some cases represent Immediately Dangerous to Life or Health {I.D.L.H.} conditions. The purpose of this program is to ensure that all Sheriff's Office employees are protected from exposure to these respiratory hazards.

Engineering controls, such as ventilation, isolation and substitution of less toxic materials, are the first line of defense at the Sheriff's Office; however, engineering controls have not always been feasible for some of our operations, or have not always completely controlled the identified hazards. In these situations, respirators and other protective equipment are also needed to protect employee's health during emergencies, including jail fires, civil disturbances, riots, etc. The work processes requiring respirator use with the Sheriff's Office employees are outlined in Table 1 in the Scope and Application section of this program.

In addition, some employees have expressed a desire to wear respirators during certain operations that do not require respiratory protection. As a general policy, the Sheriff's Office will review each of these requests on a case-by-case basis. If the use of respiratory protection in a specific case will not jeopardize the health or safety of the worker{s}, the

Sheriff's Office will provide respirators for voluntary use. The Respiratory Protection Standard states where respirator use is not required, an employer may provide respirators at the requests of employees or permit employees to use their own respirators if the employer determines that such respirator use will not, in itself, create a hazard. If the employer determines that any voluntary respirator use is permissible, the employer shall provide the respirator user with the information contained in Appendix D of the standard {"Information for Employees Using Respirators When Not Required Under the Standard"}. As outlined in the Scope and Application section of this program, voluntary respirator use is subject to certain requirements of the program.

PROCEDURE

1.0 SCOPE AND APPLICATION

This program applies to all employees who are required to wear respirators during non-routine or emergency operations, such as an outbreak or radiological event, a spill of a hazardous substance, rail derailment, riots, jailhouse fire, etc. Those persons that are unable to physically or medically not wear a respirator will be removed from the area of concern. This includes employees in the Main Jail, Work Release, Trusty Camp, Satellite Facilities, Patrol Services, Technical Services, etc. All employees working in these areas and engaged in certain details or tasks {as outlined in the table below} must be enrolled in the respiratory protection program.

In addition, any employee who voluntarily wears a respirator when a respirator is not required {i.e., in the gun range}, is subject to the medical evaluation, cleaning, maintenance, and storage elements of this program, and must be provided with certain information specified in this section of the program.

Employees participating in the Respiratory Protection Program do so at no cost to them. The expense associated with training, medical clearance and respiratory protection equipment will be borne by the Sheriff's Office.

TABLE 1: VOLUNTARY AND REQUIRED RESPIRATOR USE AT THE OAKLAND COUNTY SHERIFF'S OFFICE

<u>Respirator</u>	<u>Department/Process</u>
Filter face piece {dust mask} 3M model 8210 {N95} in white or charcoal	For voluntary use on the Gun Range, Crime Lab, Arson Unit, Crime Scene, Investigations In addition, dealing with lead while on the Gun Range.

Full facemask {gas mask} Scott model M-95 with air purifying cartridge	For voluntary or required use in the Patrol Services, Technical Services, and Corrective Services, Special Units: Special Response Team {S.R.T.} and Cell Extraction Team {C.E.T.}. These masks would be used in the act of performing law enforcement duties as crowd or riot control. Building or cell entry and dealing with any chemical or biological agent.
Scott Self Contained Breathing Apparatus The Industrial S.C.B.A. with AV2000 face piece and 30 minute Cylinder	For voluntary or required use in Corrective Services. The S.C.B.A. would be used for any evacuation of County personnel or inmate in the County Jail or Satellite building. Would be used in an I.D.L.H. atmosphere. Also, could be used when dealing with any chemical or biological agents.

2.0 **RESPONSIBILITIES**

Program Administrator

The Sheriff's Office Training Unit shall administer the Respiratory Protection Program. The Program Administrator shall be the Sergeant of the Training Unit.

1. Identifying work areas, processes or tasks that require employees to wear respirators, and evaluating hazards.
2. Selection of respiratory protection options.
3. Monitoring respirator use to ensure that respirators are used in accordance with their certifications.
4. Arranging for and/or conducting training.
5. Ensuring proper storage and maintenance of respiratory protection equipment.
6. Conducting fit testing or overseeing contractor fit testing.
7. Administering the Protocol of the program.
8. Maintaining records required by the program.
9. Evaluating the program.
10. Updating written program, as needed.

3.0 **PROGRAM IMPLEMENTATION**

Division and Unit Commanders are responsible for ensuring that the Respiratory Protection Program is implemented in their particular areas. In addition to being knowledgeable about the program requirements for their own protection, supervisors must also ensure that the program is understood and followed by the employees under their charge. Duties of the supervisor include:

1. Ensuring that employees under their supervision {including new hires} have received appropriate training, fit testing, and annual medical evaluation.
2. Ensuring the availability of appropriate respirators and accessories.
3. Being aware of tasks requiring the use of respiratory protection.
4. Enforcing the proper use of respiratory protection, when necessary.
5. Ensuring that respirators are properly cleaned, maintained, and stored according to the respiratory protection plan.
6. Ensuring that respirators fit well and do not cause discomfort.
7. Continually monitoring work areas and operations to identify respiratory hazards.
8. Coordinating with the Training Unit on how to address respiratory hazards or other concerns regarding the program.

4.0 **EMPLOYEES**

Each employee has the responsibility to wear his/her respirator when and where required and in the manner in which they were trained. Employee must also:

1. Care for and maintain their respirators as instructed, and store them in a clean sanitary location.
2. Inform their supervisor if the respirator no longer fits well, and request a new one that fits properly.
3. Inform their supervisor or the Training Unit of any respiratory hazards that they feel is not adequately addressed in the workplace and of any other concerns that they have regarding the program.

5.0 **PROGRAM ELEMENTS**

5.1 **Selection Procedures**

The Training Unit will select respirators to be used on site, based on the hazards to

which employees are exposed and in accordance with all M.I.O.S.H.A. standards. The Training Unit will conduct a hazard evaluation for each operation, process, or work area where airborne contaminants may be present in routine operations or during an emergency. The hazard evaluation will include:

1. Identification and development of a list of hazardous substances used in the workplace, by department, or work process.
2. Review of work processes to determine where potential exposures to these hazardous substances may occur. This review shall be conducted by surveying the workplace, reviewing process records, and talking with employees and supervisors.

The results of the current hazard evaluation are in Table 2:

Table 2: **OAKLAND COUNTY SHERIFF’S OFFICE RESPIRATORY PROTECTION PROGRAM**

DEPARTMENT	CONTAMINANTS	CONTROLS
Patrol Services	Chemical or Biological agent’s	Full facemask {gas Mask} M95.
Technical Services	Chemical or Biological agent’s Lead and crime scene investigations.	Full facemask {gas mask} M95. Filter face piece {dust Mask} N95 or higher.
Corrective Services and Satellites	Chemical or Biological agent’s, I.D.H.L. atmosphere.	Full facemask {gas Mask {M95}. S.C.B.A. with 30 min. bottle.

5.2 Updating the Hazard Assessment

The Training Unit must revise and update the hazard assessment, as needed {i.e., anytime work process changes may potentially affect exposure}. If an employee feels that respiratory protection is needed during a particular activity, he/she is to contact his/her supervisor or the Training Unit. The Training Unit will evaluate the potential hazard, arranging for outside assistance, as necessary. The Training Unit will then communicate the results of that assessment back to the employees. If it is determined that respiratory protection is necessary, all other elements of this program will be in effect for those tasks and this program will be updated accordingly.

5.3 **N.I.O.S.H. Certification**

All respirators must be certified by the National Institute for Occupational Safety and Health {N.I.O.S.H.} and shall be used in accordance with the terms of that certification. In addition, all filters, cartridges and canisters must be labeled with the appropriated N.I.O.S.H. approval label. The label must not be removed or defaced while it is in use.

5.4 **Voluntary Respirator Use**

The Sheriff's Office will provide respirators at no charge to employees for voluntary use for the following work processes:

The Training Unit will provide all employees who voluntarily choose to wear respirators with a copy of Appendix D of the standard. {Appendix D details the requirements for voluntary use of respirators by employees.} Employees choosing to wear a half-face piece or full face piece APR must comply with the procedures for Medical Evaluation, Respirator use, and Cleaning, Maintenance and Storage. The Training Unit shall authorize voluntary use of respiratory protective equipment as requested by all other workers on a case-by-case basis, depending on specific workplace conditions and the results of the medical evaluations.

6.0 **MEDICAL EVALUATION**

Employees who are either required to wear respirators, or who choose to wear an APR voluntarily, must pass a medical exam before being permitted to wear a respirator on the job. The medical evaluation is only required once, before fit testing. Once an employee is medically cleared, annual medical evaluation is only needed should there be a change in medical status. {Please see number 8}. Employees are not permitted to wear respirators until a physician has determined that they are medically able to do so.

A licensed physician at the designated medical contractor will provide the medical evaluations. Medical Evaluation Procedures are as follows:

1. The medical evaluation will be conducted using a designated medical authority questionnaire similar to the one in Appendix C of the Respiratory Protection Standard, Part 451. Either the Training Unit or the medical vendor will provide a copy of this questionnaire to all employees requiring medical evaluations.
2. To the extent feasible, the county will assist employees who are unable to read the questionnaire {by providing help in reading the questionnaire}. When this is not possible, the employee will be sent directly to the physician for medical evaluation.

3. All affected employees will be given a copy of the medical questionnaire to be filled out, along with an envelope to be sealed and returned to their designated commander. The sealed envelope will then be given to the medical vendor for a medical review. Employees will be permitted to fill out the questionnaire on county time.
4. Follow-up medical exams will be granted to employees as required by the standard, and/or as deemed necessary by the medical clinic physician.
5. All employees will be granted the opportunity to speak with the physician about their medical evaluation, if they so request.
6. The Training Unit has provided the medical clinic physician with a copy of this program, a copy of the Respiratory Protection Standard, and the list of hazardous substances by work area. The clinic physician has also been provided for each employee requiring evaluation: his/her work area and job title, proposed respirator type and weight, length of time required to wear respirator, expected physical workload {light, moderate, or heavy}, potential temperature and humidity extremes, and any additional protective clothing required.
7. Any employee required medical reasons to wear a positive pressure air-purifying respirator would be provided with a powered air-purifying respirator.
8. After an employee has received clearance and begun to wear his/her respirator, additional medical evaluations will be provided under the following circumstances:
 1. Employee reports signs and/or symptoms related to their ability to use a respirator, such as shortness of breath, dizziness, chest pains, or wheezing.
 2. The medical clinic physician or supervisor informs the Training Unit that the employee needs to be reevaluated.
 3. Information from this program, including observations made during fit testing and program evaluation, indicates a need for reevaluation.
 4. A change occurs in workplace conditions that may result in an increased physiological burden on the employee.

A list of Sheriff's Office employee's that have been through the Respiratory Protection Program shall be maintained in Sheriff's Office Training Unit. All examinations and questionnaires are to remain confidential between the employee and the physician and will be maintained only at Concentra Medical Centers.

7.0 **FIT TESTING**

Annual fit testing is required for employees wearing full-face piece APR's and S.C.B.A.'s. Employees voluntarily wearing half-face piece APR's may also be fit tested, upon request. At the time of the annual fit testing, each employee will be asked to review the medical protocol and advise if there has been any change in his/her medical status. If the answer is yes, the employee reviews item # 8 under Medical Evaluation.

Employees who are required to wear full-face piece APR's and S.C.B.A.'s will be fit tested:

1. Before being allowed to wear any respirator with a tight fitting face piece.
2. Annually.
3. When there are changes in the employee's physical condition that could affect respiratory fit {e.g., obvious changes in body weight, facial scarring, etc.}.

Employees will be fit tested with the make, model, and size of respirator that they will actually wear. Employees will be provided with different sizes of respirators so that they may find an optimal fit.

The Training Unit or medical clinic shall ensure that employees using a tight-fitting face piece respirator pass an appropriate qualitative fit test {QLFT} or quantitative fit test {QNFT} within Appendix A: Fit Testing Procedures of Part 1. M.I.O.S.H.A. Accepted Fit Test Protocols.

8.0 **RESPIRATOR USE**

Respiratory protection is required for the personnel listed in the Respiratory Protection database in the Sheriff's Office Training Unit.

8.1 **General Use Procedures**

1. Employees will use their respirators under conditions specified by this program, and in accordance with the training they receive on the use of each particular model. In addition, the respirator shall not be used in a manner for which it is not certified by N.I.O.S.H. or by its manufacturer.
2. All employees shall conduct user seal checks each time they wear their respirator. Employees shall use either the positive or negative pressure check {depending which test works best for them} specified in Appendix B-1 of the Respiratory Protection Standard.

3. Employees are not permitted to wear tight-fitting respirators if they have any condition, such as facial scars, facial hair, or missing dentures, that prevents them from achieving a good seal. Employees are not permitted to wear headphones, jewelry, or other articles that may interfere with the face piece-to-face seal.

8.2 Emergency Procedures

The following work areas have been identified as having foreseeable emergencies:

1. Jail—emergency evacuation due to fires, etc.
2. Patrol Services—civil disturbances, riots, terrorist attacks, etc.
3. Technical Services—crime scene investigations, range operations, etc.

When an emergency in any of these areas arise, personnel trained and medically cleared for use of the respirators will respond and take whatever action is needed to maintain safety and security. Personnel not trained and medically unable will evacuate the affected area, maintain a safe, and secure perimeter.

8.3 Respirator Malfunction

For any malfunction of a respirator {e.g., such as breakthrough, face piece leakage, or improperly working valve}, the respirator wearer should inform his/her supervisor that the respirator no longer functions as intended, and go to the designated safe area to replace or repair the respirator.

8.4 Air Quality

For S.C.B.A.'s, only Grade D breathing air shall be used in the cylinders. Local fire departments will be the supplier for the air.

9.0 RESPIRATOR UP-KEEP

Respirators should be cleaned and disinfected on a regular schedule and after every use. Disposable half-face piece APR's are to be discarded when they become contaminated.

9.1 Cleaning

The following procedure is to be used when cleaning and disinfecting respirators.

1. Disassemble respirator, removing any filters, canisters, or cartridges.
2. Wash the face piece and associated parts in mild detergent with warm water. Do not use organic solvents.

3. Rinse completely in clean warm water.
4. Wipe the respirator with disinfectant wipes {70% isopropyl Alcohol} to kill germs.
5. Air-dry in a clean area.
6. Reassemble the respirator and replace any defective parts.
7. Place in a clean carrier bag or container.

9.2 Maintenance

Officers shall properly maintain respirators at all times in order to ensure they function properly and provide adequate protection. Maintenance involves a thorough visual inspection for cleanliness and defects. Worn or deteriorated parts will be replaced before use. No components will be replaced or repairs made beyond those recommended by the manufacturer. The manufacturer will conduct repairs to regulators or alarms of atmosphere-supplying respirators.

The following checklist will be used, when inspecting respirators:

1. **Face piece:** Check for cracks, tears, or holes. Facemask distortion and loose lenses/face shield.
2. **Head straps:** Check for breaks or tears. Is there any broken buckles?
3. **Valves:** Clear any residue or dirt. Check for cracks or tears in valve material.
4. **Filters/Cartridges:** Check all gaskets and be sure it is the proper cartridge for the hazard. Check for any cracks or dents in the housing.
5. **Air Supply System:** Check the condition of the supply hose and hose connection. Check setting on the regulators and valves.

9.3 Storage

Respirators must be stored in a clean, dry area, and in accordance with the manufacturer's recommendations. Each employee will inspect their own respirator{s} in accordance with the provisions of this program and will store their respirator in a proper storage container.

Respirators must be allowed to dry before placing in the container for storage to prevent microbial growth. Each employee issued an APR will have his/her name on the carrying case.

The Training Unit will store the Sheriff's Offices supply of respirators and respirator components in their original manufacturer's packaging in the Training Unit storage rooms.

9.4 **Defective Respirators**

Respirators that are defective or have defective parts shall be taken out of service immediately. The Training Unit will issue the employee a new APR.

10.0 **TRAINING**

The Training Unit will provide training to respirator users and their supervisors on the contents of the Sheriff's Office Respiratory Protection Program and their responsibilities under it and on the M.I.O.S.H.A. Respiratory Protection Standard. Employees will be trained prior to using a respirator in the workplace.

The training course will cover the following topics:

1. The Sheriff's Office Respiratory Protection Program.
2. M.I.O.S.H.A., Part 451, Respiratory Protection Standard.
3. Respiratory hazards encountered at the Sheriff's Office and their health effects.
4. Proper selection and use of respirators.
5. Limitations of respirators.
6. Respirator donning and user seal {fit} checks.
7. Fit testing, either at site or occupational clinic.
8. Emergency use procedures.
9. Maintenance and storage.
10. Medical signs and symptoms limiting the effective use of respirators.

Employees will be retrained annually or as needed {e.g., if they change divisions and need to use a different respirator}. The Training Unit will document respirator training and the documentation will include the type, model, and size of respirator for which each employee that has been trained and fit tested.

11.0 **PROGRAM EVALUATION**

The Training Unit will conduct periodic evaluations of the workplace to ensure that the provisions of this program are being implemented. The evaluations will include regular consultations with employees who use respirators and their supervisors, site inspections and a review of records.

Problems identified will be noted in an inspection log and addressed by the Training Unit. These findings will be reported to their Commanders, and the report will list plans to correct deficiencies in the Respiratory Protection Program and target dates for the implementation of corrections.

12.0 **DOCUMENTATION AND RECORD-KEEPING**

A written copy of this Program and the M.I.O.S.H.A. standard is kept in the Training Unit office and is available to all employees who wish to review it.

Copies of training and fit test records are also maintained in the Training Unit offices. These records will be updated as new employees are trained, as existing employees receive refresher training, and as new fit tests are conducted.

The Training Unit for the Oakland County Sheriff's Office Respiratory Protection Program will not have access to medical questionnaires provided to the medical vendor for review. The medical vendor will maintain all medical questionnaires. The Sheriff's Office will only retain the physician's written recommendation regarding each employee's ability to wear a respirator.



Michael J. Bouchard
Sheriff