
UI Respiratory Medical Evaluation and Fit Test Policy

SUBJECT/TITLE: RESPIRATOR MEDICAL EVALUATION AND FIT TEST POLICY FOR UNIVERSITY EMPLOYEES (Non-UIHC)

PURPOSE: To explain the University policy on respirator medical evaluations and fit testing that a non-UIHC department must comply with prior to authorizing employee respirator use in that department.

DEFINITIONS: UIHC – University of Iowa Hospitals & Clinics
EHS – Environmental Health & Safety
UEHC – University Employee Health Clinic
HCP – A Licensed Health Care Professional legally permitted to make a medical determination of employee fitness to use a respirator.
SCBA – Self-contained Breathing Apparatus

POLICY:

All employees required to wear a respirator must have an initial medical evaluation. For employees not required to wear respirators (which OSHA calls Voluntary Use), medical evaluations are required only if the device has an elastomeric (rubber or silicone) tight-fitting face piece.

Employees required to wear a tight-fitting face piece respirator must have an initial and then annual respirator fit test (an assessment to assure the respirator will fit properly under conditions of use).

The employing department is responsible for ensuring that respirator users complete their medical evaluations and fit tests.

Other requirements for respirator programs are addressed on the EHS website in the EHS document titled “[Respirators/Dust Masks – Required and Voluntary](#).” Other requirements include hazard assessments, assignment of Respirator Program Administrators, department specific written program, respirator selection, routine and foreseeable emergency situations, respirator maintenance, training, recordkeeping, and ongoing program evaluations.

MEDICAL EVALUATION:

- A. Prior to initial use, medical evaluations shall be provided to employees required to use a respirator and in cases in which a voluntary-use respirator has an elastomeric tight-fitting face piece. In addition, employees who wear an SCBA are required to undergo an annual medical evaluation. UEHC will provide medical evaluations which may consist of completing a questionnaire or seeing the HCP, or both, at the discretion of the HCP. Employees scheduled to go to the UEHC will need to fill out the OSHA required [Respirator Fitness Questionnaire](#) online beforehand.

B. Additional medical evaluations are required under any of the following circumstances:

- If an employee reports medical signs or symptoms related to ability to use respirator;
- If the physician or other licensed healthcare provider, program administrator, supervisor recommends reevaluation;
- If information from the respirator program, including observations made during fit testing and program evaluation, indicates a need; or
- If a change occurs in workplace conditions that may substantially increase the physiological burden on an employee.

C. Medical evaluations will include:

1. A medical history, including previously diagnosed disease, particularly known cardiovascular or respiratory diseases;
2. Psychological problems or symptoms including claustrophobia;
3. Problems associated with breathing during normal work activities;
4. Past problems with respirator use;
5. Past and current usage of medication; and
6. Any known physical deformities or abnormalities, including those which may interfere with respirator use.

D. The following may disqualify an employee from wearing a respirator:

1. Facial deformities and facial hair, where the respirator forms a seal to the face;
2. Perforated tympanic membranes;
3. Respiratory diseases affecting pulmonary function;
4. Symptomatic coronary artery disease, significant arrhythmias, or history of recent myocardial infarction;
5. Endocrine disorders which may cause the employee to suffer sudden loss of consciousness or response capability;
6. Inability to perform coordinated movements and conditions affecting response and consciousness due to neurological disabilities;
7. Use of medications that affect judgment, performance or reliability or alter the state of awareness or consciousness;
8. A history of claustrophobia may require further evaluation; or
9. Any other condition which the physician believes might require special restriction.

FIT TESTS:

- A. After written receipt of medical clearance from UEHC is received, each employee required to wear a tight-fitting face piece respirator must pass a respirator fit test. A fit test is not required for loose fitting helmet or hood respirators or for “not required” (voluntary) use respirators.
- B. Ensuring that fit tests are completed is the responsibility of the department or laboratory in which the employee works. The fit tests can be contracted out or EHS will provide fit test procedure training if the department or laboratory decides to perform their own fit tests.

- C. Fit testing will be performed before initial use of a respirator, annually thereafter, and whenever conditions (such as employee's physical condition) change that could affect respirator fit.
- D. The fit test shall be administered using the OSHA-accepted protocol found in Appendix A in 29 CFR 1910.134, the OSHA respirator standard. Fit testing requires the respirator user to handle the respirator, have it fitted properly, test the face piece-to-face seal, and to wear it in normal air for a familiarity period. The fit test must be performed using the same make, model, style, and size respirator the employee will use. [Please note that separate respirator training is also required.]
- E. Respirators requiring a protection factor of more than 10 must be fit tested using a quantitative method with a challenge agent.

REFERENCES AND CORRESPONDING POLICIES:

Occupational Safety and Health Administration (OSHA) respirator standard: 29 CFR 1910.134.

[Respirators/Dust Masks – Required and Voluntary](#) (EHS website)

Date Approved 3/29/10

Date Effective: 4/1/10

Date Revised: 1/26/17

Date Reviewed:

UNIVERSITY OF IOWA
QUALITATIVE FIT TEST RECORD

Rev. 9/2011

Within the last year, you have been medically cleared by UEHC staff to wear a respirator and you have a "Respirator Fitness Medical Form". Yes___No___

Since your last medical evaluation, you have **not** experienced any medical signs or symptoms that impact your ability to wear a respirator. Yes___No___

*If you answered no to either question, **do not** proceed with the fit test. Contact UEHC (at 6-3631) to request an appointment. Fill out the OSHA questionnaire (see following 2 pages) and take with you to your appointment. Sign on the line immediately below:*

Employee's signature _____ Date _____

Name _____ Date _____

University I.D.# _____ Job Title _____

Department or Workgroup _____

Pos. ___ and/or Neg. ___ Pressure Check Employee Initials _____

Type of qualitative fit test used _____

Name of test operator _____ Initials _____

Sensitivity Test: Pass ___ / Fail ___ Protection Factor = 10

of squeezes needed to detect test solution 10 20 30

	RESPIRATOR BRAND	MODEL	SIZE	PASS/FAIL?
#1	_____	_____	S M L	P / F
#2	_____	_____	S M L	P / F
#3	_____	_____	S M L	P / F

NOTES: _____

This record indicates that you have passed or failed a qualitative fit test as shown above for the particular respirators shown. You are only eligible to wear the respirator types for which you passed a fit test in the last 12 months. If you need or desire any additional type of respirator, you must pass a fit test on that specific type.

THE UNIVERSITY OF IOWA
Quantitative Fit Test Record

Within the last year, you have been medically cleared by UEHC staff to wear a respirator and you have a "Respirator Fitness Medical Form". Yes No

Since your last medical evaluation, you have **not** experienced any medical signs or symptoms that impact your ability to wear a respirator. Yes No

*If you answered no to either question, **do not** proceed with the fit test. Contact UEHC (at 6-3631) to request an appointment. Fill out the OSHA questionnaire (see following 2 pages) and take with you to your appointment. Sign on the line immediately below:*

Employee's signature _____ Date _____

QUANTITATIVE FIT TEST RECORD

Name _____ Department _____ University I.D. _____ Job _____

Title _____

Fit Test Date _____

Respirator Brand _____ Test Operator _____

Model _____ Test Apparatus _____

Size _____ Positive / Negative Pressure Check _____

FIT TEST ACTIVITY (90 seconds each)

FIT FACTOR

NORMAL BREATHING (sitting/standing in place, no talking) _____

DEEP BREATHING (normal rate) _____

TURN HEAD SIDE TO SIDE _____

MOVE HEAD UP AND DOWN _____

SPEAKING (read the rainbow passage, or similar) _____

GRIMACE, SMILE, FROWN _____

TOE TOUCH _____

NORMAL BREATHING _____

AVERAGE FIT FACTOR (minimum required _____) _____

This record indicates that the employee listed above has passed a quantitative fit test for the specific brand, model, and size respirator listed. Employee is eligible to wear the type of respirator listed above. The respirator has a protection factor of _____, meaning when used properly and against contaminants it is approved for, the respirator provides adequate protection at concentrations up to but not exceeding _____ times the acceptable airborne level.

If the employee needs or desires to wear an additional type of respirator, he/she must take and pass a fit test on that respirator type.

Operator Initials _____

Employee Initials _____

