



DEPARTMENT OF THE ARMY
HEADQUARTERS, 1ST INFANTRY DIVISION and FORT RILEY
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FORT RILEY, KANSAS 66442-7000

A CO XX ENG BN
Hearing Program
SOP

HEARING PROGRAM

1. **PURPOSE.** To establish and outline policies for the control of noise hazards and to protect personnel from hearing loss due to occupational noise exposure.
2. **SCOPE.** The requirements herein are applicable to all military and civilian personnel in or employed by the Battalion who are exposed to hazardous noise.
3. **AUTHORITY FOR PROGRAM.** The provisions of Department of Defense Instruction (DODI) 6055.12, DOD Occupational Safety and Health Program, directed by Army Regulation (AR) 385-10, The Army Safety Program, and Army Regulation (AR) 40-5, Preventive Medicine, prescribe a comprehensive Hearing Conservation Program for all Department of the Army (DA) civilian and military personnel. Essential features and guidelines for hearing conservation programs are presented in DA PAM 40-501, Hearing Conservation. In addition, Executive Order 12196 requires that all Federal Agencies comply with the Occupational Safety and Health Act (OSHA) of 1970. Standards for hearing conservation are found in 29 CFR 1910.95, Occupational Noise Exposure. Guidelines for the implementation of the hearing conservation program at all facilities controlled by DA, are provided in DA PAM 40-501
4. **DEFINITIONS AND JUSTIFICATION.**
 - a. Background noise is defined as unwanted sound. Sound is the variation of air pressure about a mean (atmospheric) pressure. This sound pressure level is measured in decibels (dB). For hearing conservation purposes, the sound pressure levels are measured using the A-weighted network for steady-state noise and are expressed as dBA. For small arms ranges, the linear weighted Hearing Conservation Unit SOP network is currently being used. The peak sound level (dBP) is used to evaluate this noise. This weighting is also commonly used to measure the dBP from impulse events. The linear weighting network weights the sound energy contained in all frequencies equally.
 - b. The increasing noise levels associated with the diverse and complex modern civilian and military equipment used in today's Army causes concern because of its adverse effect on the hearing of personnel, especially as it affects their personal welfare and ability to perform efficiently. Experience has shown that noise levels from such

equipment as hand or shoulder fired weapons, artillery, generators, combat vehicles, construction equipment, helicopters, etc, are of such high intensity that they can cause permanent hearing loss in those individuals who operate them without suitable hearing protective devices (HPDs). Permanent hearing loss is frequently not recognized by the individual until it interferes with the ability to understand the speech of others and requires him/her to ask people to repeat phrases. The longer an individual is exposed to hazardous noise without adequate hearing protection the more likely his/her auditory sensitivity will deteriorate. Noise-induced hearing loss is a painless, bloodless, and sightless disability. By the time the individual recognizes the problems; the damage is done and is irreversible. However, an effective Hearing Conservation Program will prevent further deterioration of one's hearing ability due to noise exposure.

c. Unprotected ears exposed to noise may cause individuals to suffer permanent hearing loss and have a marked loss of communication ability that usually results in task errors because of misunderstanding, lack of alertness of hazards to him and others, degrading job/mission performance. Hearing loss may also require a permanent change of profile which frequently excludes an individual from working in his/her primary MOS or job assignment, resulting in costly retraining, reclassifying, and disqualification for reenlistment, commissioning, or retention.

d. While preventable, noise-induced hearing loss is permanent and irreversible. A significant number of combat troops and DA civilian employees lose some degree of hearing before completing their military and Civil Service careers.

5. CRITERIA.

a. All personnel working in noise-hazardous areas must use properly fitted hearing protection devices (HPDs). Personnel may select the type of HPD they desire, unless their selection is medically contra- indicated or inappropriate for a particular noise-hazard area.

b. For steady-state noise levels--

(1) Greater than or equal to 85 dBA, but less than or equal to 108 DBA, personnel must wear single protection.

(2) Greater than 108 dBA, but less than or equal to 118 DBA, personnel must wear earplugs and noise attenuation muffs/helmet in combination.

(3) Greater than 118 dBA, but less than or equal to 138 DBA, personnel must wear hearing protectors in combination and comply with the time limits on daily exposure.

(4) Greater than 138 dBA, personnel must obtain approval from the OTSG, HQDA (SGPS-PSP), 5109 Leesburg Pike, Falls Church, VA 22041-3258.

(5) Noise levels associated with Army helicopters, must be evaluated following the procedure found in MIL-STD-1294A.

c. For impulse levels-

(1) Less than 140 dBP, personnel may wear HPDs if desired.

(2) Equal to or greater than 140 dBP, but less than or equal to 165 DBP, personnel must wear single hearing protection. It is a policy of this unit that prior to rodding a weapon on a live fire or blank fire range, the rodder will also inspect the soldier to ensure earplugs are fitted properly, i.e., deep fit with no air leaks around the earplug either hand-formed or pre-formed. Note: The noise level of a blank round from an M-16, 50 Cal or SAW is greater than 140 dBP, therefore hearing protection is required when exposed to blank weapon fire.

(3) Greater than 165 dBP, but less than or equal to curve Z, (MIL-STD-1474C, figure 10) personnel must wear earplugs in combination with a noise muff or noise-attenuating helmet.

(4) Greater than curve Z, personnel must obtain approval from the OTSG, HQDA (SGPS-PSP), 5109 Leesburg Pike, Falls Church, VA 22041-3258, e.g., Ranger Anti Armor Anti Personnel Weapon (RAAWS) or similar very loud weapon requires that soldiers be limited to only 6 rounds per day of live or blank weapon fire with this extremely loud weapon.

6. RESPONSIBILITIES.

a. The Commander has overall responsibility for implementing and conducting the Hearing Program.

b. The Commander will:

(1) Appoint a unit Hearing Program Officer/NCO and oversee that this individual:

(a) Inspects helmets and/or noise muffs semi-annually to determine serviceability status, including CVC/VIS or SPH4 helmets. Note: for these helmets to be effective in the reduction of noise, the chin strap must be fastened.

(b) Requisitions appropriate and authorized HPDs and ensures an adequate supply of all sizes of the triple or quad-flange earplug, in addition to three sizes of polyvinyl foam earplug (small, medium and large) are available for use in noise hazardous areas and for ranges, FTX and other training exercises.

(c) Makes periodic checks of the maintenance/shop and operational areas to determine if noise levels are increasing, areas are posted as noise-hazardous and personnel are using appropriately fitted and authorized HPDs.

(d) Makes periodic checks to ensure supervisors are complying with established directives and utilizing properly fitted and authorized HPDs in noise hazardous areas.

(e) Ensures newly assigned personnel have been properly fitted with authorized hearing protection and have received a hearing evaluation within past 6 months.

(f) Monitors Hearing Readiness Classification (HRC) of unit Soldiers to maintain deployable hearing readiness status designations for troops. Schedules unit test sessions with Installation Hearing Readiness technicians at the Soldier Readiness Processing Center as needed.

(g) Ensures that Soldiers identified with STS (significant threshold shifts) during annual/pre- or post-deployment hearing evaluations complete follow-up evaluations within 30 days. Those Soldiers requiring diagnostic testing (Class 3) must complete appointment with Installation Hearing Program Manager (HPM) to receive a Class 2 deployable HRC status. Appointments with the HPM are made at the Hearing Readiness Clinic at the Soldier Readiness Processing Center.

(h) Advises the Commander on policies concerning hearing readiness, including notifications of Soldiers with significant hearing loss currently in his Command.

(2) Purchase new equipment that generates the lowest noise levels feasible. (e.g., weed-eaters; \$20.00 more per unit may result in a tool that is less than 85dBA).

(3) Require noise-exposed soldiers to wear the correct size of authorized earplugs and the earplug carrying case as part of the army combat uniform when appropriate. Standard location is front right belt loop.

c. Commanders and Supervisors of noise-hazardous areas will:

(1) Ensure that noise-exposed personnel under their supervision:

(a) Are provided properly fitted and authorized HPDs and annual, pre-/post-deployment audiometric evaluations.

(b) Attend annual health education briefing.

(c) Ensure annual fit tests of hearing protection.

(d) Follow recommendations for audiometric examinations, medical evaluations, and noise surveys.

(e) Wear properly fitted and authorized hearing protective devices in all hazardous noise, including blank weapons fire.

(f) Report for scheduled medical exams.

(g) Ensure all personnel in noise-hazardous areas retain a pair of properly fitted, preformed earplugs as an item of individual equipment. Polyvinyl foam (handformed) earplugs can be used as long as the Soldier uses the correct size.

(2) Provide copies of regulations, technical bulletins, and other hearing program documents to soldiers, or civilian employees, on request.

(3) Ensure that noise-hazardous areas and equipment are marked with proper danger signs and decals per AR 385-30.

(4) Post the OSHA standard (29 CFR 1910.95) in all industrial noise-hazardous areas.

(5) Refer any personnel under their supervision to the Soldier Readiness Processing Center Hearing Readiness Clinic (walk in basis – no appointment required) for any hearing problems or complaints associated with the wearing of hearing protectors.

(6) Initiate disciplinary action when appropriate, to include counseling statements for those Soldiers/personnel caught without proper hearing protection in noise hazardous areas.

d. Personnel will:

(1) Exercise all necessary precautions and wear authorized and properly fitted HPDs when exposed to hazardous noise levels.

(2) Report for all scheduled medical examinations, evaluations and treatment, as well as health education briefings concerning the hazards of noise and hearing protection measures.

(3) Report any hearing problems or difficulties associated with hearing protectors currently in use to their supervisor.

(4) Comply with recommendations of medical and safety personnel regarding protection of hearing and maintenance of HPDs.

e. The Battalion Company Commanders will ensure hearing program policies are being adhered to within their respective sections of responsibility.

7. ESSENTIALS OF HEARING PROGRAM. ***The prevention of hearing loss from exposure to noise involves the coordinated application of noise hazard identification and evaluation, posting of noise-hazardous areas with appropriate danger signs, engineering control measures, the use of HPDs, and pre-placement, periodic monitoring and termination audiometry of personnel identified as working in noise-hazardous areas, supplemented by health education, supervision, and discipline of personnel.***

8. REFERENCES.

a. Department of Defense Instruction (DODI) 6055.12, DOD Hearing Conservation Program, 6 July 1987.

b. Army Regulation (AR) 385-10 The Army Safety Program, 29 February 2000. Paragraph 1-4., O. **“Commanders at all levels will be responsible for the protection of personnel and equipment under his or her command and the effective implementation of safety and occupational health policies.”**

c. Army Regulation (AR) 40-5, Preventive Medicine, 22 July 2005.

d. Department of The Army (DA PAM) 40-501, Hearing Conservation, 10 December 1998.

e. Executive Order 12196, Occupational Safety and Health Programs for Federal Employees, 26 February 1980.

f. Occupational Safety and Health Act (OSHA) of 1970.

g. 29 Code of Federal Register (CFR) 1910.95, Occupational Noise Exposure, Revised 1 July 1991.

h. Military Standard 1294A (MIL-STD-1294A), Acoustic Noise Limits in Helicopters, 12 August 1985.

i. MIL-STD-1474C, Noise Limits for Military Materiel, 7 September 1990.

j. AR 385-30, Safety Color Code Markings and Signs, 15 September 1983.

9. This SOP also serves as the command emphasis letter explaining the importance of hearing conservation IAW AR 40-5.

COL,
COMMANDING