

EFF Assessment Task

Noise in the Workplace

Characteristics of this Assessment Task

Action (Performance Goal)

Read with understanding OSHA information about “Occupational Noise Exposure” in order to evaluate the usefulness of the information and apply it to specific workplace situations

Text Type

Safety recommendations from OSHA (Occupational Safety and Health Administration) longer text w/sections, sub-headings, and a glossary of terms

Content

General and specialized vocabulary, abbreviations and content related to the OSHA Hearing Conservation Program

Environment

Familiar, comfortable environment, such as the classroom

Estimated time to complete task

45 minutes

Materials

OSHA bulletin and definitions

Answer Sheet 1

Pens, Pencils, Highlighters, Dictionaries (bilingual dictionaries may be used in addition to English dictionaries)

Knowledge and strategies that are the focus of this assessment task

(proficient performance on this task will require fluent and independent use of the following knowledge and strategies)

- Recognizing and interpreting abbreviations and specialized vocabulary
- Familiarity with everyday and some specialized content knowledge and vocabulary, and with paragraph structure and document organization
- Locating important information, reading identified sections for detail, and determining missing information using a wide range of strategies (such as skimming, scanning, and using headings/titles, key words, context clues, and graphics/pictures)
- Monitoring and enhancing comprehension using a wide range of strategies (such as recalling, restating and summarizing information from multiple sources)
- Organizing and analyzing information and reflecting upon its meaning using a range of strategies (such as classification, categorization, comparison/contrast)
- Using new information to evaluate prior knowledge

Additional knowledge and strategies that may affect performance on this task

- Familiarity with workplace safety instructions and advice
- Familiarity with filling out a chart

Evidence of learner performance that will be collected using this assessment task

Observations

There are no observations for this task

Work Products

1. Answer Sheet 1

Step-by-step procedures for administration

This task may be administered to a group of students; however, arrange to have a private one-to-one post-task interview with each student. There is no time limit on this task, but it should take less than 45 minutes to complete. You may repeat the reading of any of the steps as needed but repetition must be in English and you must read the steps exactly as they are written in the scripts each time. You may also model any requirement of the task to help clarify, as needed.

Step 1. Explain the task requirements to the learner(s):

This task assesses how well you can read and understand a document about noise in the workplace.

Step 2. Hand out copies of the OSHA bulletin, the list of definitions, and Answer Sheet 1. Hold up a copy of the OSHA bulletin and explain to the readers the requirements of the task:

In a moment, I am going to ask you to read this document about noise in the workplace, written by the Occupational Safety and Health Administration. While you are reading, you may find words that are not familiar to you. You may use the page of definitions (hold up page of definitions) to figure out what a word means. You can also use a dictionary if you find a word you don't understand. You can also make notes and highlight on the document if it will help you.

Do you have any questions?

After answering student questions (or if there are none), hold up a copy of Answer Sheet 1, and say:

After you have finished reading the OSHA bulletin, you will write answers to the questions on Answer Sheet 1. You may reread the bulletin and the list of definitions, and you may make notes and highlight on any of these documents if it will help you to complete the answer sheet. In some cases, there is more than one right answer to a question.

Do you have any questions?

After answering student questions (or if there are none), say:

You may begin the task now. When you have finished reading and answering the questions on Answer Sheet 1, bring your copies of the OSHA document, the list of definitions, and your completed answer sheet to me.

Step 3. Collect all task materials and record the approximate time taken by student to complete this task

Scoring Rubric for Noise in the Workplace (Level 5)

Student Name:

Unable to Score	Beginning	Proficient	Advanced
	<ul style="list-style-type: none"> • Recognizes and uses everyday vocabulary and some of the specialized vocabulary from the reading, but may confuse the meanings of some terms or use some of them in the wrong context in responses to the questions on Answer Sheet 1 • Accurately locates and provides detail about some key information in the text; correctly answers fewer than 3 of questions 1-5 in Section 2 on Answer Sheet 1 • Strategies for monitoring and enhancing comprehension need improvement; correctly summarizes 3 or fewer of the main components in the reading in Section 1 of Answer Sheet 1, possibly indicating inaccuracies in summary or difficulty with analyzing information • Draws on prior knowledge to answer questions 6-8 in Section 2 on Answer Sheet 1, but may have difficulty synthesizing and using new information to evaluate it; responses to questions 6-8 do not indicate the effective application of prior knowledge integrated with new knowledge from the reading; does not introduce information not from the reading and integrate it with information from the reading to answer these questions • Has some difficulty completing the task without direction or support 	<ul style="list-style-type: none"> • Recognizes, accurately interprets, and correctly uses everyday vocabulary and most of the specialized vocabulary from the reading needed to respond to the questions on Answer Sheet 1 • Accurately locates, and supplies sufficient detail about, key information in the reading to correctly answer 3 of questions 1-5 in Section 2 on Answer Sheet 1 • Effectively monitors and enhances comprehension by accurately summarizing and analyzing information from the reading; correctly summarizes 4 of the main components in the reading in Section 1 of Answer Sheet 1 with few major errors, and thoroughly and appropriately uses information from the reading • Answers to questions 6-8 in Section 2 on Answer Sheet 1 reveal some ability to recall prior knowledge and integrate it with new information from the reading to appropriately answer questions; introduces information not from the reading and integrates it with information from the reading; effectively synthesizes and offers the most “important” information, and reasonably explains its importance • Completes the task with little apparent difficulty, needing little direction or support 	<ul style="list-style-type: none"> • Accurately interprets and uses everyday vocabulary and terms related to the reading in responses to the questions on Answer Sheet 1 • Accurately and quickly locates and details key information in the text to correctly answer 4 or more of questions 1-5 in Section 2 on Answer Sheet 1 • Shows superior monitoring and comprehension skills; easily and accurately summarizes and analyzes information from the text to correctly summarize all 5 of the main components in the reading in Section 1 of Answer Sheet 1 with few minor errors and thoroughly and appropriately uses information from the reading. • Answers to questions 6-8 on Answer Sheet 1 show strong, effective use of prior knowledge; introduces information not from the reading and integrates it with new information from the reading to provide reasonable, thoughtful responses to the questions, synthesizing and offering the most “important” information, and detailed explanations as to why it is important • Completes the task without hesitation, direction, or support

DEFINITIONS

Intensity: concentration, strength or force

Duration: length of time

Conservation: protection or maintenance

Impairment: injury or disability

Monitor: check, watch, keep an eye on

Decibel: sound level

Audiometric: measurement of hearing capability

Acuity: sharpness, keenness

Exposure: contact

Calibrate: adjust, regulate or standardize

Baseline: starting point

Name: _____

Answer Sheet 1 Noise in the Workplace

Instructions: Read the document about noise in the workplace, written by the Occupational Safety and Health Administration. While you are reading, you may find words that are not familiar to you. You may use the page of definitions to figure out what a word means. You can also use a dictionary if you find a word you don't understand. You can also make notes and highlight on the document if it will help you. After you have finished reading the OSHA bulletin, you will write answers to the questions this Answer Sheet. You may reread the bulletin and the list of definitions, and you may make notes and highlight on any of these documents if it will help you to complete the answer sheet. In some cases, there is more than one right answer to a question.

Section 1: Fill in the chart by listing each component of OSHA's Hearing Conservation Program, and then summarize in your own words what the reading says about each component :

Component	Summary (state in your own words)
1.	
2.	
3.	
4.	
5.	

Section 2: You have worked at Front Factory for 3 months. The average noise level on the shop floor of the Front Factory is 95dB. Find information in the reading to answer the following questions:

1. When can you expect to be given an audiogram? Which kind of audiogram will be given to you first?
2. After you are tested, you are told about some follow-up procedures. Why should audiometric testing programs include follow-up procedures?
3. Why is it a good idea for you to wear hearing protectors while on the job?
4. What kind of situation described in the reading might cause you permanent hearing damage?
5. As a worker at the Front Factory, how is this OSHA information important to your own health and safety?

Occupational Safety and Health Administration (OSHA) Bulletin

INTRODUCTION: OCCUPATIONAL NOISE EXPOSURE

Exposure to high levels of noise in the workplace causes hearing loss and may cause other harmful health effects as well. The extent of damage depends on the intensity of the noise and the duration of the exposure. Noise-induced hearing loss can be temporary or permanent. Temporary hearing loss results from short-term exposures to noise, with normal hearing returning after a period of rest. Generally, prolonged exposure to high noise levels over a period of time gradually causes permanent damage.

OSHA's hearing conservation program is designed to protect workers with significant occupational noise exposures from suffering hearing impairment even if they are subject to such noise exposures over their entire working lifetimes.

FIVE COMPONENTS OF OSHA'S HEARING CONSERVATION PROGRAM

1. MONITORING

Employers must monitor noise exposure levels in a manner that will accurately identify employees who are exposed to noise at or above 85 decibels (dB) averaged over 8 working hours. The exposure measurement must include all continuous, intermittent, and impulsive noise within an 80 dB to 130 dB range and must be taken during a typical work situation.

Instruments used for monitoring employee exposures must be carefully checked or calibrated to ensure that the measurements are accurate. Calibration procedures are unique to specific instruments. Employers have the duty to ensure that the measuring instruments are properly calibrated. They may find it useful to follow the manufacturer's instruction to determine when and how extensively to calibrate.

2. AUDIOMETRIC TESTING

Audiometric testing monitors the sharpness and acuity of an employee's hearing over time. It also provides an opportunity for employers to educate employees about their hearing and the need to protect it. The audiometric testing program should include follow-up procedures to determine whether the employer's hearing conservation program is preventing hearing loss.

The employee needs a referral for further testing when test results are questionable or when problems of a medical nature are suspected. There are two types of audiograms required in the hearing conservation program: baseline and annual audiograms.

3. BASELINE AUDIOGRAMS

The baseline audiogram is the reference audiogram against which future audiograms are compared. Baseline audiograms must be provided within 6 months of an employee's first exposure at or above 85 dB. Employees must be fitted with, issued, and required to wear hearing protectors for any period exceeding 6 months after their first exposure until the baseline audiogram is obtained.

4. ANNUAL AUDIOGRAMS

Annual audiograms must be conducted within 1 year of the baseline. It is important to test hearing on an annual basis to identify deterioration in hearing ability so that protective follow-up measures can be initiated before hearing loss progresses. Annual audiograms must be routinely compared to baseline audiograms employee has lost hearing ability.

5. HEARING PROTECTORS

Hearing protectors must be available to all workers exposed to 8-hour noise levels of 85 dB or above. This requirement will ensure that employees have access to protectors before they experience a loss in hearing. Employees should decide, with the help of a person who is trained in fitting hearing protector, which size and type protector is most suitable for their working environment.

Hearing protectors must adequately reduce the severity of the noise level for each employee's work environment. If workplace noise levels increase, employees must be given more effective protectors. Employees must be shown how to use and care for their protectors and must be supervised on the job to ensure that they continue to wear them correctly.

[adapted from OSHA website]

Answer Key For Answer Sheet 1 Noise in the Workplace

Instructions: Read the document about noise in the workplace, written by the Occupational Safety and Health Administration. While you are reading, you may find words that are not familiar to you. You may use the page of definitions to figure out what a word means. You can also use a dictionary if you find a word you don't understand. You can also make notes and highlight on the document if it will help you. After you have finished reading the OSHA bulletin, you will write answers to the questions this Answer Sheet. You may reread the bulletin and the list of definitions, and you may make notes and highlight on any of these documents if it will help you to complete the answer sheet. In some cases, there is more than one right answer to a question.

Section 1: Fill in the chart by listing each component of OSHA's Hearing Conservation Program, and then summarize in your own words what the reading says about each component :

Note: Specific answers will vary; the following answers are examples of correct responses; a proficient response will correctly identify the main components and give a cogent summary of the component as it was described in the reading, in the student's own words.

Component	Summary
1. Monitoring	<i>Employers must monitor noise to identify those employees exposed to noise at or above 85 dB. The measurements must be taken during a typical work situation using instruments that are properly calibrated.</i>
2. Audiometric Testing	<i>This testing monitors employee hearing over time. Employers can also educate their employees about their hearing during this testing. The employer should also follow-up after the test to see if the conservation program is helping to prevent employee hearing loss. The employee should be given a referral for more tests if he or she is found to have hearing problems.</i>
3. Baseline Audiogram	<i>One of two types of audiograms required in a hearing conservation program. These audiograms are what all future audiograms are compared to. They must be given within 6 months of an employee's first exposure of 85dB or above. Employees must be given, and required to wear, hearing protectors for any period over 6 months after their first exposure until the employer gets the baseline measurement.</i>
4. Annual Audiogram	<i>The other type of audiogram required in a conservation program. These are given within a year of the baseline measurement, and are compared to the baseline audiogram. Hearing should be tested every year to find instances of hearing loss so that employers can implement protective measures to help prevent further hearing loss.</i>
5. Hearing Protectors	<i>Hearing protectors must be made available to employees exposed to 85dB or higher noise levels. Employees will be given assistance with deciding which protector is best for their particular work environment. These protectors should be adapted when changes occur in work environments to ensure employees are getting the best protection, and employees should be trained in how to use their protectors and supervised to ensure they are wearing their protectors.</i>

Section 2: You have worked at Front Factory for 3 months. The average noise level on the shop floor of the Front Factory is 95dB. Find information in the reading to answer the following questions:

Note: Specific Answers will vary; the following are examples of correct responses. A proficient response will provide correct information from the reading and, when required, will incorporate this reading with some prior knowledge.

1. When can you expect to be given an audiogram? Which kind of audiogram will be given to you first?
*Within 6 months of being exposed to noise at 85dB or above, and year after.
A Baseline audiogram will be given first.*
2. After you are tested, you are told about some follow-up procedures. Why should audiometric testing programs include follow-up procedures?
To determine whether the employer's hearing conservation program is preventing hearing loss.
3. Why is it a good idea for you to wear hearing protectors while on the job?
Because they prevent hearing loss.
4. What kind of situation described in the reading might cause you permanent hearing damage?
Being exposed to noise levels of 85dB or higher for 8 hours a day.
5. As a worker at the Front Factory, how is this OSHA information important to your own health and safety?
It explains the potential dangers for hearing loss in the workplace, it describes the conditions where hearing loss may take place, and it lists the employer's responsibilities for making sure that I am properly tested for hearing loss and given the proper hearing protection against hearing loss.

Note: Specific answers to questions to 6-8 will vary based on the student's experience. Proficient answers will reflect the student's own experience with workplace noise, and provide information from the reading that is combined with his or her prior knowledge.

6. Did you learn new information about workplace noise?
7. If so, what?
8. What kinds of noise (on the job, at home, or in the community) might be harmful?