

**R9-13-101. Definitions**

In this Article, unless the context otherwise requires:

1. "Assistive listening device" has the meaning in A.R.S. § 36-1901.
2. "Audiologist" means an individual licensed under A.R.S. Title 36, Chapter 17.
3. "Audiometer" means an electronic device that generates signals used to measure hearing.
4. "Calibration" means a determination of the accuracy of an instrument by measurement of a variation from a standard.
5. "Cochlear implant" means a surgically inserted device that electrically stimulates the hearing nerve in the inner ear.
6. "dB" means decibel.
7. "dB HL" means decibel hearing level.
8. "Deaf" has the meaning in A.R.S. § 36-1941.
9. "Department" means the Arizona Department of Health Services.
10. "Documentation" means signed and dated information in written, photographic, electronic, or other permanent form.
11. "Effusion" means the escape of fluid from a blood or lymphatic vessel into tissue or a cavity.
12. "Frequency" means the number of cycles per second of a sound wave.
13. "Hard of hearing" has the meaning in A.R.S. § 36-1941.
14. "Hearing aid" has the meaning in A.R.S. § 36-1901.
15. "Hearing screening" means a test of a student's ability to hear certain frequencies at a consistent loudness performed in a school by an individual who meets the requirements in R9-13-107.
16. "Hz" means Hertz, a unit of frequency equal to one cycle per second.
17. "Immittance" means the ease of transmission of sound through the middle ear.
18. "Inner ear" means the semicircular canals, auditory nerve, and cochlea.
19. "Intensity" means the strength of a sound wave striking the eardrum resulting in the perception of loudness as expressed in decibels or decibels hearing level.
20. "Kindergarten" means the grade level immediately preceding first grade.
21. "Middle ear" means the eardrum, malleus, incus, stapes, and eustachian tube.
22. "mm H<sub>2</sub>O" means millimeters of water.
23. "Noise floor" means sounds present in the auditory canal from either the environment or bodily functions such as breathing and blood flow.
24. "Otitis media" means inflammation of the middle ear.
25. "Otoacoustic emissions" means the sounds generated from the inner ear.
26. "Outer ear" means the pinna, lobe, and auditory canal.
27. "Parent" has the meaning in A.R.S. § 15-101.
28. "Physician" means an individual licensed under A.R.S. Title 32, Chapter 13 or 17.
29. "Preschool" means the instruction preceding kindergarten provided to individuals three to five years old through a:
  - a. School as defined in A.R.S. § 15-101,
  - b. Accommodation school as defined in A.R.S. § 15-101,
  - c. Charter school as defined in A.R.S. § 15-101, or
  - d. Private school as defined in A.R.S. § 15-101.
30. "Primary care practitioner" means an individual licensed as a registered nurse practitioner under A.R.S. Title 32, Chapter 15 or a physician assistant under A.R.S. 32, Chapter 25.
31. "Pure tone" means a single frequency sound.
32. "Reproducibility" means the correlation of two responses measured simultaneously and reported by percentage.
33. "School" means:
  - a. School as defined in A.R.S. § 15-101;
  - b. Preschool,
  - c. Kindergarten,
  - d. Accommodation school as defined in A.R.S. § 15-101,
  - e. Charter school as defined in A.R.S. § 15-101, or
  - f. Private school as defined in A.R.S. § 15-101
34. "School administrator" means an individual or the individual's designee assigned to act on behalf of a school by the body organized for the government and the management of the school.
35. "School year" means the period between July 1 and the following June 30.
36. "Screener" means an individual qualified to perform a hearing screening in a school according to R9-13-107.
37. "Special education" has the meaning in A.R.S. § 15-761.
38. "Speech-language pathologist" means an individual licensed under A.R.S. Title 36, Chapter 17.
39. "Student" means an individual enrolled in a school.
40. "Supervision" has the meaning in A.R.S. § 36-401.
41. "Tympanogram" means a chart of the indirect measurements of the ease of movement of the parts of the middle ear as air pressure in the auditory canal changes.
42. "Tympanometer" means a device that indirectly measures the ease of movement of the parts of the middle ear as air pressure in the auditory canal changes.
43. "Tympanometry" means the indirect measurement of the ease of movement of the parts of the middle ear as air pressure in the auditory canal changes.

**R9-13-102. Hearing Screening Population**

- A. A school administrator shall ensure that the following students have a hearing screening each school year:
1. A student enrolled in preschool, kindergarten, or grade 1, 2, 6, or 9;
  2. A student enrolled in grade 3, 4, or 5, unless there is written documentation that the student had a hearing screening in or after grade 2;
  3. A student enrolled in grade 7 or 8, unless there is written documentation that the student had a hearing screening in or after grade 6;
  4. A student enrolled in grade 10, 11, or 12 unless there is written documentation that the student had a hearing screening in or after grade 9;
  5. A student receiving special education; and
  6. A student who failed a second hearing screening in the prior school year.
- B. A school administrator shall ensure that a student has a hearing screening at the request of the student, the student's parent, a schoolteacher, a school nurse, a school psychologist, an audiologist, a physician, a primary care practitioner, a speech language pathologist, or Department staff.
- C. A hearing screening is not required if a:
1. Student is age 16 years or over;
  2. Student's parent objects in writing to the screening as allowed under A.R.S. § 36-899.04;
  3. Written diagnosis or evaluation from an audiologist states that a student is deaf or hard of hearing; or
  4. Student has a hearing aid, an assistive listening device, or a cochlear implant.
- D. In addition to meeting the requirements in subsections (A) and (B), a school administrator shall ensure that a student who meets the criteria specified in State Board of Education rule R7-2-401 has a hearing screening required under R7-2-401.

**R9-13-103. Hearing Screening Requirements**

- A. Before performing a hearing screening, a screener shall visually inspect a student's outer ears for:
1. Fluid or drainage,
  2. Blood,
  3. An open sore, or
  4. A foreign object.
- B. If a screener inspects a student's outer ears and finds any of the conditions in subsection (A), the screener shall not perform a hearing screening.
- C. A screener shall perform a hearing screening in each ear using one of the following hearing screening methods:
1. Four-frequency, pure tone hearing screening that screens at each of the following frequencies and intensities:
    - a. 500 Hz at 25 dB HL,
    - b. 1000 Hz at 20 dB HL,
    - c. 2000 Hz at 20 dB HL, and
    - d. 4000 Hz at 20 dB HL;
  2. Three-frequency, pure tone hearing screening with tympanometry that:
    - a. Includes a tympanogram that is generated automatically or is plotted at a minimum of the following three points:
      - i. +100 mm H<sub>2</sub>O,
      - ii. Point of maximum immittance, and
      - iii. -200 mm H<sub>2</sub>O; and
    - b. Screens at each of the following frequencies at 20 dB HL:
      - i. 1000 Hz,
      - ii. 2000 Hz, and
      - iii. 4000 Hz; or
  3. Otoacoustic emissions hearing screening using otoacoustic emissions equipment that generates a pass or no pass result:
    - a. Using a minimum of three frequencies,
    - b. At no less than 3 dB above the noise floor, and
    - c. With reproducibility greater than 50%.

**R9-13-104. Criteria for Passing a Hearing Screening; Requirements for Performing a Second Hearing Screening**

- A. A student passes a hearing screening if:
1. During a four-frequency, pure tone hearing screening, the student responds in each ear to each frequency at each intensity listed in R9-13-103(C)(1)(a) through (C)(1)(d);
  2. During a three-frequency, pure tone hearing screening with tympanometry, the student:
    - a. Responds in each ear to each frequency as described in R9-13-103(C)(2)(b); and
    - b. Reaches a point of maximum immittance in each ear within the range of +100mm H<sub>2</sub>O to -200mm H<sub>2</sub>O; or
  3. During an otoacoustic emissions hearing screening, the student receives a pass result in each ear according to R9-13-103(C)(3).
- B. If a student does not pass a hearing screening according to subsection (A), a screener shall perform a second hearing screening on the student no earlier than 30 days and no later than 45 days from the date of the first hearing screening. The screener shall perform the second hearing screening using the same method as the first hearing screening.

**R9-13-105. Referral; Notification; Follow-up**

- A. If a school administrator finds that a student does not require a hearing screening under R9-13-102(C)(3) or (C)(4), the school administrator shall provide to the student's parent, within 10 days from the date the finding is made, a referral to have the student's current hearing status evaluated by an audiologist, including an electroacoustic analysis of any hearing aid or assistive listening device, unless there is documentation from an audiologist specifying a different evaluation schedule.
- B. If a screener finds any of the conditions listed in R9-13-103(A) and a student does not have a hearing screening:
1. A school administrator shall provide to the student's parent, within 10 days from the date the condition is found, a referral to have the student's outer ears evaluated by a physician or primary care practitioner; and
  2. A screener shall perform the hearing screening on the student no earlier than 30 days and no later than 45 days from the date the screener finds the condition.
- C. If a student does not pass a second hearing screening or does not complete a second hearing screening within the time period required under R9-13-104(B), a school administrator shall provide to the student's parent, within 10 days from the date of the second hearing screening or from the date the period for completing a second hearing screening ends, a referral to have the student's current hearing status evaluated by one of the following:
1. An audiologist, a physician, or a primary care practitioner if the screener used only the four-frequency, pure tone hearing screening method;
  2. A physician or primary care practitioner if the student did not pass the tympanometry portion, but passed the three-frequency, pure tone portion of the hearing screening;
  3. An audiologist if the student did not pass the three-frequency, pure tone portion, but passed the tympanometry portion of the hearing screening; or
  4. An audiologist, a physician, or a primary care practitioner if the screener used the otoacoustic emissions hearing screening method.
- D. A referral identified in subsection (C) is not required if a school-provided audiologist:
1. Assesses a student's hearing status and the condition of the middle ear at the conclusion of a hearing screening; and
  2. Within 10 days from date of the assessment, provides the student's parent with a written diagnosis and recommendation for treatment, if applicable.
- E. A referral required under subsections (A), (B), or (C), shall include a form requesting the following:
1. The name, address, and telephone number of the student evaluated;
  2. The date of evaluation;
  3. An assessment of the condition of the outer ear, if applicable;
  4. An assessment of hearing status and the condition of the middle ear, if applicable;
  5. A diagnosis and recommendation for treatment, if applicable;
  6. The signature and title of the individual evaluating the student and completing the form; and
  7. A request that the individual completing the form or the student's parent return the completed form to the school.
- F. Under State Board of Education rule R7-2-401, a school administrator shall ensure that a student referred under subsections (A) or (C) is evaluated.
- G. If a school receives notice of a diagnosis that a student is deaf or hard of hearing from an audiologist, the school administrator shall notify, within 10 days from the date the notice of diagnosis is received, each of the student's teachers and the person responsible for the school's special education services of the diagnosis.

**R9-13-107. Screener Qualifications**

- A. An audiologist may perform a hearing screening.
- B. An individual who is not an audiologist may perform a hearing screening only if the individual passes a hearing screener course that:
1. Includes 90 minutes of classroom instruction in the introduction to hearing covering:
    - a. Development of speech and language;
    - b. Anatomy and physiology of the ear;
    - c. Signs and prevention of hearing loss in children; and
    - d. A.R.S. Title 36, Chapter 7.2 and 9 A.A.C. 13, Article 1;
  2. Includes 120 minutes of classroom instruction in hearing screening covering:
    - a. Auditory development,
    - b. Early identification of hearing loss,
    - c. Principles of hearing screening,
    - d. Selection of hearing screening methods, and
    - e. Components of setting-up a hearing screening program;
  3. Includes 75 minutes of classroom instruction in referral and reporting covering:
    - a. Results of a hearing screening,
    - b. Responses to a hearing screening outcome,
    - c. Procedures for recording and tracking,
    - d. Communication with parents,
    - e. Role of community resources, and
    - f. Reporting hearing screening results;

4. For an individual who will perform a hearing screening using three-frequency or four-frequency, pure tone hearing screening, includes 120 minutes of classroom instruction covering:
    - a. Selecting and setting-up a hearing screening site,
    - b. Performing a pure tone hearing screening, and
    - c. Identifying children who need referral and evaluation;
  5. For an individual who will perform a hearing screening using tympanometry with three-frequency, pure tone hearing screening, includes 60 minutes of classroom instruction covering:
    - a. The anatomy and functions of the middle ear,
    - b. What tympanometry measures and identifies,
    - c. Using a tympanometer,
    - d. Performing a tympanometry hearing screening, and
    - e. Identifying children who need referral and evaluation;
  6. For an individual who will perform a hearing screening using otoacoustic emissions hearing screening, includes 60 minutes of classroom instruction covering:
    - a. What otoacoustic emissions identify and measure,
    - b. Using otoacoustic emissions equipment,
    - c. Performing an otoacoustic emissions hearing screening, and
    - d. Identifying children who need referral and evaluation;
  7. Requires an individual to pass the course by scoring 80% or more on an examination that tests what the individual has learned;
  8. Is taught by an individual who:
    - a. Is an audiologist, or
    - b. Meets the screener qualifications in subsection (B) or (C) and has performed at least 50 hearing screenings within 24 months before teaching a hearing screener course; and
  9. Provides an individual who passes the course with a certificate of completion that includes:
    - a. The individual's name;
    - b. Whether the following were completed:
      - i. Introduction to hearing,
      - ii. Hearing screening,
      - iii. Referral and reporting,
      - iv. Pure tone hearing screening,
      - v. Tympanometry hearing screening, and
      - vi. Otoacoustic emissions hearing screening;
    - c. An attestation that the course meets the requirements in subsection (B) or (C); and
    - d. The name and signature of the individual who taught the course.
- C. Every five years after completing a hearing screener course described in subsection (B), a screener who is not an audiologist shall pass a hearing screener course that:
1. Includes 195 minutes of classroom instruction covering the material required under subsections (B)(1), (B)(2), and (B)(3);
  2. For an individual who will perform a hearing screening using three-frequency or four-frequency, pure tone hearing screening, includes 60 minutes of classroom instruction covering the material required under subsection (B)(4);
  3. For an individual who will perform a hearing screening using tympanometry with three-frequency, pure tone hearing screening, includes 30 minutes of classroom instruction covering the material required under subsection (B)(5);
  4. For an individual who will perform a hearing screening using otoacoustic emissions hearing screening, includes 30 minutes of classroom instruction covering the material required under subsection (B)(6); and
  5. Meets the requirements in subsections (B)(7), (B)(8), and (B)(9).
- D. Before performing a hearing screening, an individual who passes a hearing screener course described in subsection (B) or (C) shall give a copy of the certificate of completion described in subsection (B)(9) to the school.
- E. An individual who does not meet the screener qualifications in subsection (A), (B), or (C) may perform a four-frequency, pure tone hearing screening, other than a second hearing screening required under R9-25-104(B), only under the supervision of an individual who meets the screener qualifications in subsection (A), (B), or (C).

### **R9-13-108. Equipment Standards**

- A. A school administrator shall ensure that a pure tone audiometer used to perform a three-frequency or four-frequency, pure tone hearing screening is:
1. Calibrated every 12 months according to the American National Standard Specification for Audiometers, S3.6-1996, Standards Secretariat, c/o Acoustical Society of America, 120 Wall Street, 32nd Floor, New York, New York 10005-3993, January 12, 1996, incorporated by reference in R9-16-209(B)(1); and
  2. Inspected within 24 hours before use to ensure that:
    - a. The calibration complies with subsection (A)(1),
    - b. The power source and power indicator are working,
    - c. The earphone cords are securely connected and have no breaks,
    - d. Each frequency and intensity required under R9-13-103(C)(1) is present,
    - e. A signal does not cross from one earphone to the other, and
    - f. Each earphone is free of noise or distortion that could interfere with a hearing screening.

- B. A school administrator shall ensure that a tympanometer used to perform the tympanometry portion of a hearing screening:
  - 1. Is calibrated every 12 months according to the American National Standard Specifications for Instruments to Measure Aural Acoustic Impedance and Admittance, S3.39-1987, Standards Secretariat, Acoustical Society of America, 335 East 45th Street, New York, New York 10017-3483, October 5, 1987, not including any later amendments or editions, incorporated by reference and on file with the Department and the Office of the Secretary of State; and
  - 2. Is inspected within 24 hours before use to ensure that the calibration complies with subsection (B)(1).
- C. A school administrator shall ensure that otoacoustic emissions equipment used to perform an otoacoustic emissions hearing screening is:
  - 1. Calibrated every 12 months according to manufacturer's specifications; and
  - 2. Inspected within 24 hours before use to ensure that:
    - a. The calibration complies with manufacturer's specifications,
    - b. No obstruction is in the probe microphone, and
    - c. The test signal is present.

**R9-13-109. Recordkeeping, Reporting Requirements**

- A. A school administrator shall retain, for Department review and inspection, a written record of:
  - 1. The date and results of a student's hearing screening for no less than three complete school years beginning on the first July 1 after the student's last date of attendance at the school, and
  - 2. All calibration dates for a piece of hearing screening equipment currently used in the school.
- B. By June 30th of each year, a school administrator shall submit to the Department the following information for the school year ending that June 30th:
  - 1. On a form available from the Department, the number of students by grade in each of the following categories:
    - a. Were enrolled at the time of a first hearing screening,
    - b. Did not have a first hearing screening under R9-13-102(C),
    - c. Had a first hearing screening,
    - d. Did not pass a first hearing screening,
    - e. Had a second hearing screening,
    - f. Did not pass a second hearing screening,
    - g. Were evaluated by an audiologist,
    - h. Were evaluated by a physician or a primary care practitioner,
    - i. Were first diagnosed as deaf or hard of hearing during the current school year, and
    - j. Were diagnosed as deaf or hard of hearing during a prior school year; and
  - 2. The name of each individual who performed a hearing screening in the school and:
    - a. The individual's license number to practice audiology, or
    - b. Evidence that the individual successfully completed a hearing screening course described in R9-13-107(B) or (C).