

Audiology Clinic Handbook

Procedural Manual to be used in Audiology Clinical Practicum

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Please note that COVID-19 protocols and procedures override many of the sections in this handbook. See COVID-19 training and procedural materials for adjustments that will continue to be ongoing and revised.

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Description of Services

The Audiology Clinic offers services to people of all ages, from infants to adults. The Clinic's goal is to improve communication through diagnostic evaluation and rehabilitative intervention. The initial contact with the patient is typically an audiological assessment to determine the hearing status of the patient and the extent of the problem. Based on the results of this evaluation, and the patient's needs, recommendations are made to the patient and his or her family regarding the avenues available for improved hearing and communication.

The Audiology Clinic dispenses hearing aids and assistive listening devices (i.e., FM listening systems, personal amplifiers, telephone amplifiers, and alarm/warning devices). An in-depth orientation is provided to patients and their family members to insure the proper care and use of these devices, along with communication strategies to gain the most benefit within the individual's unique listening environment.

The Audiology Clinic provides the following diagnostic and rehabilitative services:

- Preschool speech, language, and hearing screenings
- Adult hearing and speech-language screenings
- Hearing Conservation Program
- First Steps (birth to three) Program
 - Diagnostic hearing evaluation of infants and toddlers
- Greater Lafayette Area Special Services (GLASS)
 - Comprehensive pediatric hearing assessment
- Comprehensive adult hearing assessment
- Hearing Aid Program (for infants, children and adults)
 - Hearing aid selection, evaluation and fitting
 - Assistive listening device evaluation and dispensing
- Aural Rehabilitation Program
 - Periodic off-site, on-site, and telehealth adult aural rehabilitation
 - Individual pediatric and adult aural rehabilitation (in conjunction with the Speech-Language Clinic)
- Vestibular Diagnostic Program
- Cochlear Implant Program
 - Candidacy evaluation
 - Mapping/Re-mapping

Purdue University
M.D. Steer Audiology Clinic
Professional Protocol for Clinical Practice -- Revised 2016

- A. ETHICAL PRACTICES
- Conducts all clinical work in accordance with the Purdue University Professional Protocol and the Code of Ethics set forth by the American Speech-Language-Hearing Association.
- B. DEPENDABILITY
- Prepares for and conducts clinical services as assigned.
 - Prepares for and conducts meetings/conferences/consultations (reviews charts, develops questions and/or key points for discussion).
 - Carries out all duties to accomplish total case management (e.g., forms, phone calls, referrals, etc.).
 - Makes appropriate arrangements and notifies all concerned regarding any schedule/location change or cancellation.
- C. PUNCTUALITY
- Conducts clinical contacts within appropriate time frame.
 - Begins and ends session promptly in order to allow sufficient time for clean up and setting-up the next session.
 - In case of student clinician illness, accepts responsibility to
 - (a) Notify clinical instructor first
 - (b) Discuss arrangements for make-up appointments with clinical instructor.
 - When a patient is late, checks with appointment secretary to see if they cancelled. Then checks with clinical instructor. Never leaves the clinic without notifying/checking with clinical instructor first.
 - Requests approval for absence from clinic in writing in advance of any anticipated absences from professional responsibilities.
 - Submits all written assignments (e.g., test results, reports, letters, etc.) in acceptable form (appropriate grammatical usage, paragraph structure, punctuation, and spelling) by scheduled deadlines.
 - Attends all meetings/conferences/consultations on time.
- D. CONFIDENTIALITY
- Retains any clinic paper charts in assigned locations in clinic, main office, therapy rooms, or graduate room.
 - Utilizes discretion concerning patient information in written and oral communication with others.
- E. PERSONAL APPEARANCE
- Utilizes discretion in dress and behavior in professional activities.
 - Wears name badge.
 - Maintains and promotes a positive professional image.

- Does not wear **ANY** scented products (i.e., perfume, hair products, body lotions, etc.).
- Maintains proper personal hygiene.

F. **COMMUNICATION**

- Utilizes appropriate communication in all professional activities.
- Provides appropriate communication model for patient and family.
- Uses appropriate written and oral communication with all persons involved in the case including clinical instructor, co-clinicians, and other professionals.
- Contacts clinical instructor regarding inability to complete work by designated deadline.
- Checks mailboxes at least once per day.

G. **ACCOUNTABILITY**

- Keeps documentation (test results, data on specific goals, correspondence, release of information, hearing aid status etc.) up-to-date in the patient's electronic chart.
- Reviews information in the Purdue University Audiology Clinic Handbook each semester.

If exhibited behaviors violate these standards of our profession, the clinical instructor who deems your conduct as inappropriate will complete a Professional Protocol Notice. (See sample form on the next page)

Failure to meet these standards will result in probationary status to be determined by the Audiology Clinic Director and the Clinical Instructors directly involved. The result may also be lowering of the semester clinical grade and/or termination of clinical responsibilities.

Professional Protocol Notice

To: _____, Student Clinician

From: _____, Clinical Instructor

Date: _____

On _____ (date), you _____

This behavior is not consistent with the standards of clinical behavior at Purdue University's Audiology Clinic. Please review the Protocol of Professional Behavior, and the Written and Oral/non-verbal Communication Protocols described in the Audiology Clinic Handbook and the Knowledge and Skills Assessment in Calipso. If you have questions following that, please make an appointment to discuss them with me. You will be notified if a remediation plan is appropriate and we will meet to formulate this plan in consultation with the Director of Clinical Education in Audiology.

Please review the Graduate Handbook which describes in detail Clinical Practicum Privileges, Policies and Implementation: Evaluation of Clinical Practicum Performance and Progress.

Please indicate that you have read this memo by signing and dating it and leaving it immediately in my mailbox.

Student Clinician

Date

Clinical Instructor

Date

Cc: Shannon Van Hyfte, Director of Clinical Education in Audiology

_____, Advisor

PROFESSIONALISM AGREEMENT

During my externship experience, I am a guest at the healthcare externship setting. I understand that my task is to learn so that I can become a more effective professional. I agree to abide by the specific institutional values and policies as well as highest standards of professionalism at all times.

I agree to maintain professional, legal, and ethical conduct at all times. I will respect the privacy of all clients/patients, families, and medical professionals and protect the confidentiality of confidential personal information that I encounter.

I agree to be on site when and where I am expected. In the event that I cannot attend or will be late, I will follow proper notification procedures to let the appropriate individuals know in advance.

I agree to maintain a professional demeanor and appearance, in accordance with the standards of the site where I am placed.

I agree to complete my assigned tasks, duties, and responsibilities on time.

I agree to interact and communicate in a positive and professional manner with all clients/patients, families, and medical professionals. I will avoid bias, prejudice, or lack of fairness toward individuals or groups of people.

I agree to remain committed to improving my own instructional practices. I will remain flexible and open to feedback from others.

I agree to demonstrate commitment to my field of study and to the speech-language pathology profession.

I agree to follow the ASHA Code of Ethics and Scope of Practice.

I understand that failure to comply with this agreement may result in the execution of a remediation plan and/or placement termination. ASHA clock hours will not be granted for an incomplete or a failing grade.

Healthcare Externship Coordinator

Date

Graduate Student

Date



CODE OF ETHICS

Reference this material as: American Speech-Language-Hearing Association. (2016). Code of Ethics [Ethics]. Available from www.asha.org/policy.

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PREAMBLE

The American Speech-Language-Hearing Association (ASHA; hereafter, also known as "The Association") has been committed to a framework of common principles and standards of practice since ASHA's inception in 1925. This commitment was formalized in 1952 as the Association's first Code of Ethics. This Code has been modified and adapted as society and the professions have changed. The Code of Ethics reflects what we value as professionals and establishes expectations for our scientific and clinical practice based on principles of duty, accountability, fairness, and responsibility. The ASHA Code of Ethics is intended to ensure the welfare of the consumer and to protect the reputation and integrity of the professions.

The ASHA Code of Ethics is a framework and focused guide for professionals in support of day-to-day decision making related to professional conduct. The Code is partly obligatory and disciplinary and partly aspirational and descriptive in that it defines the professional's role. The Code educates professionals in the discipline, as well as students, other professionals, and the public, regarding ethical principles and standards that direct professional conduct.

The preservation of the highest standards of integrity and ethical principles is vital to the responsible discharge of obligations by audiologists, speech-language pathologists, and speech, language, and hearing scientists who serve as clinicians, educators, mentors, researchers, supervisors, and administrators. This Code of Ethics sets forth the fundamental principles and rules considered essential to this purpose and is applicable to the following individuals:

- a member of the American Speech-Language-Hearing Association holding the Certificate of Clinical Competence (CCC)
- a member of the Association not holding the Certificate of Clinical Competence (CCC)
- a nonmember of the Association holding the Certificate of Clinical Competence (CCC)
- an applicant for certification, or for membership and certification

By holding ASHA certification or membership, or through application for such, all individuals are automatically subject to the jurisdiction of the Board of Ethics for ethics complaint adjudication. Individuals who provide clinical services and who also desire membership in the Association must hold the CCC.

The fundamentals of ethical conduct are described by Principles of Ethics and by Rules of Ethics. The four Principles of Ethics form the underlying philosophical basis for the Code of Ethics and are reflected in the following areas: (I) responsibility to persons served professionally and to research participants, both human and animal; (II) responsibility for one's professional competence; (III) responsibility to the public; and (IV) responsibility for professional relationships. Individuals shall honor and abide by these Principles as affirmative obligations under all conditions of applicable professional activity. Rules of Ethics are specific statements of minimally acceptable as well as unacceptable professional conduct.

The Code is designed to provide guidance to members, applicants, and certified individuals as they make professional decisions. Because the Code is not intended to address specific situations and is not inclusive of all possible ethical dilemmas, professionals are expected to follow the written provisions and to uphold the spirit and purpose of the Code. Adherence to the Code of Ethics and its enforcement results in respect for the

professions and positive outcomes for individuals who benefit from the work of audiologists, speech-language pathologists, and speech, language, and hearing scientists.

TERMINOLOGY

ASHA Standards and Ethics – The mailing address for self-reporting in writing is American Speech-Language-Hearing Association, Standards and Ethics, 2200 Research Blvd., #313, Rockville, MD 20850.

advertising – Any form of communication with the public about services, therapies, products, or publications.

conflict of interest – An opposition between the private interests and the official or professional responsibilities of a person in a position of trust, power, and/or authority.

crime – Any felony; or any misdemeanor involving dishonesty, physical harm to the person or property of another, or a threat of physical harm to the person or property of another. For more details, see the “Disclosure Information” section of applications for ASHA certification found on www.asha.org/certification/AudCertification/ and www.asha.org/certification/SLPCertification/.

diminished decision-making ability – Any condition that renders a person unable to form the specific intent necessary to determine a reasonable course of action.

fraud – Any act, expression, omission, or concealment—the intent of which is either actual or constructive—calculated to deceive others to their disadvantage.

impaired practitioner – An individual whose professional practice is adversely affected by addiction, substance abuse, or health-related and/or mental health-related conditions.

individuals – Members and/or certificate holders, including applicants for certification.

informed consent – May be verbal, unless written consent is required; constitutes consent by persons served, research participants engaged, or parents and/or guardians of persons served to a proposed course of action after the communication of adequate information regarding expected outcomes and potential risks.

jurisdiction – The “personal jurisdiction” and authority of the ASHA Board of Ethics over an individual holding ASHA certification and/or membership, regardless of the individual’s geographic location.

know, known, or knowingly – Having or reflecting knowledge.

may vs. shall – May denotes an allowance for discretion; shall denotes no discretion.

misrepresentation – Any statement by words or other conduct that, under the circumstances, amounts to an assertion that is false or erroneous (i.e., not in accordance with the facts); any statement made with conscious ignorance or a reckless disregard for the truth.

negligence – Breaching of a duty owed to another, which occurs because of a failure to conform to a requirement, and this failure has caused harm to another individual, which led to damages to this person(s);

failure to exercise the care toward others that a reasonable or prudent person would take in the circumstances, or taking actions that such a reasonable person would not.

nolo contendere – No contest.

plagiarism – False representation of another person's idea, research, presentation, result, or product as one's own through irresponsible citation, attribution, or paraphrasing; ethical misconduct does not include honest error or differences of opinion.

publicly sanctioned – A formal disciplinary action of public record, excluding actions due to insufficient continuing education, checks returned for insufficient funds, or late payment of fees not resulting in unlicensed practice.

reasonable or reasonably – Supported or justified by fact or circumstance and being in accordance with reason, fairness, duty, or prudence.

self-report – A professional obligation of self-disclosure that requires (a) notifying ASHA Standards and Ethics and (b) mailing a hard copy of a certified document to ASHA Standards and Ethics (see term above). All self-reports are subject to a separate ASHA Certification review process, which, depending on the seriousness of the self-reported information, takes additional processing time.

shall vs. may – Shall denotes no discretion; may denotes an allowance for discretion.

support personnel – Those providing support to audiologists, speech-language pathologists, or speech, language, and hearing scientists (e.g., technician, paraprofessional, aide, or assistant in audiology, speech-language pathology, or communication sciences and disorders).

telepractice, teletherapy – Application of telecommunications technology to the delivery of audiology and speech-language pathology professional services at a distance by linking clinician to client/patient or clinician to clinician for assessment, intervention, and/or consultation. The quality of the service should be equivalent to in-person service.

written – Encompasses both electronic and hard-copy writings or communications.

PRINCIPLE OF ETHICS I

Individuals shall honor their responsibility to hold paramount the welfare of persons they serve professionally or who are participants in research and scholarly activities, and they shall treat animals involved in research in a humane manner.

RULES OF ETHICS

- A. Individuals shall provide all clinical services and scientific activities competently.
- B. Individuals shall use every resource, including referral and/or interprofessional collaboration when appropriate, to ensure that quality service is provided.

- C. Individuals shall not discriminate in the delivery of professional services or in the conduct of research and scholarly activities on the basis of race, ethnicity, sex, gender identity/gender expression, sexual orientation, age, religion, national origin, disability, culture, language, or dialect.
- D. Individuals shall not misrepresent the credentials of aides, assistants, technicians, support personnel, students, research interns, Clinical Fellows, or any others under their supervision, and they shall inform those they serve professionally of the name, role, and professional credentials of persons providing services.
- E. Individuals who hold the Certificate of Clinical Competence may delegate tasks related to the provision of clinical services to aides, assistants, technicians, support personnel, or any other persons only if those persons are adequately prepared and are appropriately supervised. The responsibility for the welfare of those being served remains with the certified individual.
- F. Individuals who hold the Certificate of Clinical Competence shall not delegate tasks that require the unique skills, knowledge, judgment, or credentials that are within the scope of their profession to aides, assistants, technicians, support personnel, or any nonprofessionals over whom they have supervisory responsibility.
- G. Individuals who hold the Certificate of Clinical Competence may delegate to students tasks related to the provision of clinical services that require the unique skills, knowledge, and judgment that are within the scope of practice of their profession only if those students are adequately prepared and are appropriately supervised. The responsibility for the welfare of those being served remains with the certified individual.
- H. Individuals shall obtain informed consent from the persons they serve about the nature and possible risks and effects of services provided, technology employed, and products dispensed. This obligation also includes informing persons served about possible effects of not engaging in treatment or not following clinical recommendations. If diminished decision-making ability of persons served is suspected, individuals should seek appropriate authorization for services, such as authorization from a spouse, other family member, or legally authorized/appointed representative.
- I. Individuals shall enroll and include persons as participants in research or teaching demonstrations only if participation is voluntary, without coercion, and with informed consent.
- J. Individuals shall accurately represent the intended purpose of a service, product, or research endeavor and shall abide by established guidelines for clinical practice and the responsible conduct of research.
- K. Individuals who hold the Certificate of Clinical Competence shall evaluate the effectiveness of services provided, technology employed, and products dispensed, and they shall provide services or dispense products only when benefit can reasonably be expected.
- L. Individuals may make a reasonable statement of prognosis, but they shall not guarantee—directly or by implication—the results of any treatment or procedure.
- M. Individuals who hold the Certificate of Clinical Competence shall use independent and evidence-based clinical judgment, keeping paramount the best interests of those being served.
- N. Individuals who hold the Certificate of Clinical Competence shall not provide clinical services solely by correspondence, but may provide services via telepractice consistent with professional standards and state and federal regulations.
- O. Individuals shall protect the confidentiality and security of records of professional services provided, research and scholarly activities conducted, and products dispensed. Access to these records shall be

harm—to the person or property of another, or (2) any felony, shall self-report by notifying ASHA Standards and Ethics (see Terminology for mailing address) in writing within 30 days of the conviction, plea, or finding of guilt. Individuals shall also provide a certified copy of the conviction, plea, nolo contendere record, or docket entry to ASHA Standards and Ethics within 30 days of self-reporting.

- T. Individuals who have been publicly sanctioned or denied a license or a professional credential by any professional association, professional licensing authority or board, or other professional regulatory body shall self-report by notifying ASHA Standards and Ethics (see Terminology for mailing address) in writing within 30 days of the final action or disposition. Individuals shall also provide a certified copy of the final action, sanction, or disposition to ASHA Standards and Ethics within 30 days of self-reporting.



SCOPE OF PRACTICE IN AUDIOLOGY

AD HOC COMMITTEE ON THE SCOPE OF PRACTICE IN AUDIOLOGY

Reference this material as: American Speech-Language-Hearing Association. (2018). Scope of Practice in Audiology [Scope of Practice]. Available from www.asha.org/policy.

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ABOUT THIS DOCUMENT

This scope of practice document is an official policy of the American Speech-Language-Hearing Association (ASHA) defining the breadth of practice within the profession of audiology. The *Audiology Scope of Practice* document has not been updated since 2004. The aim of this document is to reflect the current and evolving clinical practice in audiology. Such changes include, but are not limited to, telehealth, discussion of hearing technologies beyond traditional hearing devices (e.g., over-the-counter [OTC]), and personal sound amplification products (PSAPs). Additional updates in advancements in hearing device implantation, vestibular assessment and rehabilitation, hearing preservation, educational audiology, and interoperative monitoring practice are included.

This document was developed by the ASHA Ad Hoc Committee on the Scope of Practice in Audiology. Committee members were Julie Honaker (chair), Robert Beiter, Kathleen Cienkowski, Gregory Mannarelli, Maryrose McInerney, Tena McNamara, Jessica Sullivan, Julie Verhoff, Robert Fifer (board liaison), and Pam Mason (ex officio). This document was approved by the ASHA Board of Directors on August 20, 2018.

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INTRODUCTION

DEFINITION OF TERMS

Audiologist: By virtue of education, training, licensure, and certification, audiologists engage in professional practice in the areas of hearing and balance assessment, nonmedical treatment, and (re)habilitation. Audiologists provide patient-centered care in the prevention, identification, diagnosis, and evidence-based intervention and treatment of hearing, balance, and other related disorders for people of all ages. Hearing, balance, and other related disorders are complex, with medical, psychological, physical, social, educational, and employment implications. Treatment services require audiologists to know existing and emerging technologies, intervention strategies, and interpersonal skills to counsel and guide individuals and their family members through the (re)habilitative process. Audiologists provide professional and personalized services to minimize the negative impact of these disorders, leading to improved outcomes and quality of life. Audiologists are licensed and/or regulated in all 50 states and in the District of Columbia.

Balance: Includes all aspects of equilibrium, specific to the balance and vestibular systems, both peripheral and central. This includes management of symptoms and signs consistent with both peripheral and central etiologies.

Hearing: Includes all peripheral and central functional components of sound reception and analytic processing. This also includes management of symptoms and sequelae of disorders of the auditory system such as tinnitus, hyperacusis, misophonia, and other auditory perceptual disorders.

Hearing, balance, and other related disorders: Throughout this document, the broad term hearing, balance, and other related disorders is used to reflect all areas of assessment and intervention within the audiology scope of practice.

IEP/IFSP/504 Plan: The *Individualized Education Plan* (IEP) is a written statement that guides the educational plan for a child, ages 3–21, in accordance with the Individuals with Disabilities Education Act of 2004 (IDEA). The *Individual Family Service Plan* (IFSP) guides the early intervention services for a child with disabilities and their family. The IEP and IFSP are developed, reviewed, and revised in accordance with federal law. Also, under the IDEA, a student with disabilities is ensured a Free and Appropriate Public Education (FAPE) as well as monitoring the student's progress. The parents/guardians play a central role in the IEP/IFSP progress (IDEA, 2004). A *504 Plan* is a plan developed to ensure that a child with a disability receives accommodations for a general education classroom.

Individuals: The term *individuals* is used throughout the document to refer to students, clients, patients, children, adults, families, and caregivers who are served by the audiologist.

Interprofessional collaborative practice (IPP): This term stems from the World Health Organization's (WHO) framework of looking at a health condition alongside a person's functional ability, social community, and personal goals, in concert with the perspective of other health care providers. Health care professionals must communicate and collaborate with each other and the individual receiving care, along with the individual's family or support system. This is called *interprofessional collaborative practice (IPP)*. The blending of skill sets results in better outcomes, improved quality of life, and greater satisfaction. It also minimizes the cost of care and improves the individual's safety and sense of well-being (Skevington, Lotfy, & O'Connell, 2004).

Management: This refers to the organization and coordination of activities in order to develop and provide relevant audiologic care for individuals. These activities include assessment techniques and treatment/intervention strategies. Appropriate management aids in the achievement of goals and objectives set forth for individuals with hearing and/or vestibular difficulties.

Other related disorders: This term is intended to reflect that audiologists with the appropriate training can use their skills and techniques to contribute to the knowledge, understanding, and overall care of individuals with other disorders outside the hearing and balance system. A few purely illustrative examples of this could include (a) performing a battery of facial nerve function tests on a patient with a facial palsy or (b) performing a battery of auditory tests on a patient with a developmental or cognitive delay. This type of care is increasingly used as a part of an interprofessional collaborative practice team.

Person-centered care: This approach considers the whole person, taking into account more than the physical symptoms of a specific, discrete disorder. It includes psychological, social, cultural, and environmental factors. Optimal outcomes are achieved when working collaboratively—along with

input and accountability—with the individual, supportive family members and with fellow professionals.

Quality of life: WHO defines *quality of life* as an individual's perception of their position in life in the context of the culture and value systems in which they live and in relation to their goals, expectations, standards, and concerns. It is a broad-ranging concept affected in a complex way by the person's physical health, psychological state, personal beliefs, social relationships, and relationship to salient features of their environment (Skevington et al., 2004; WHOQOL Group, 1994).

Telehealth: the use of electronic information and telecommunications technologies to support long-distance clinical health care, patient and professional health-related education, public health, and health administration.

Working at the top of license: This is the concept that audiologists should engage in patient care activities that require their (i.e., the audiologists') specialized level of expertise and skill. Other less skilled tasks may be delegated to other individuals (e.g., assistants, automated systems, and/or individuals and family members; Burkhard and Trembath, 2015). This would greatly decrease the cost of achieving outcomes (and also increase family satisfaction by decreasing the inconvenience, cost, and overall burden of care; ASHA, 2013). Working at the top of the license is not meant to imply nor does it prohibit audiologists from completing tasks that are not at the top of the license.

Treatment/Intervention: These terms refer to the application of care given to an individual to directly address hearing and/or vestibular difficulties. *Management* (defined above) is the overall coordination of activities that address the needs of individuals. *Treatment/intervention* is one of those direct activities.

STATEMENT OF PURPOSE

The purpose of the *Scope of Practice in Audiology* is as follows:

1. Delineate areas of professional practice.
2. Inform others (e.g., health care providers, educators, consumers, payers, regulators, and the general public) about professional roles and responsibilities of qualified providers.
3. Support audiologists in the provision of high-quality, evidence-based services to individuals with hearing and balance concerns.
4. Support audiologists working at the top of their license.
5. Support audiologists in the conduct and dissemination of research.
6. Guide the educational preparation and professional development of audiologists to provide safe and effective services.
7. Inform members of ASHA, certificate holders, and students of the activities for which certification in audiology is required in accordance with the ASHA Code of Ethics (ASHA, 2016). Each practitioner evaluates his or her own experiences with pre-service education, practice, mentorship and supervision, and continuing professional development. As a whole, these experiences define the scope of competence for each individual. Audiologists should engage in only those aspects of the profession that are within her or his professional competence. ASHA members and ASHA-certified professionals are bound by the ASHA Code of Ethics (ASHA, 2016) to provide services that are consistent with the scope of their competence, education, and experience.

By virtue of training and practice, audiology is a unique profession that specializes in and provides comprehensive diagnostic and nonmedical treatment services for hearing and balance disorders, and related impairments. These services are provided to individuals across the entire age span from birth through adulthood; these individuals include persons of different races, genders, religions, national origins, and sexual orientations. This position statement is not intended to be exhaustive; however, the activities described in this document reflect current practice within the profession. Practice activities related to emerging clinical, technological, and scientific developments are not precluded from consideration as part of the scope of practice of an audiologist. If the audiologist can document appropriate training for new and emerging clinical or technological procedures that fall under the heading of auditory, balance and other related disorders, then such innovations and advances may be incorporated into the *Audiology Scope of Practice*. Audiologists are trained in all areas of clinical service delivery; however, they commonly have one or more specific areas of specialization. ASHA also recognizes that credentialed professionals in related disciplines have knowledge, skills, and experience that could be applied to some areas within the Audiology Scope of Practice. Defining the scope of practice of audiologists is not meant to exclude other appropriately credentialed postgraduate professionals from rendering services in overlapping practice areas. Often, these partially overlapping skill sets can result in excellent opportunities for IPP.

Audiologists must achieve required competencies in ancillary professional areas. These areas are distinct from but contribute to diagnostic and nonmedical treatment activities. They are very important areas in which to maintain high standards of clinical service. Examples include cultural and linguistic competencies, IPP, patient- and family-centered care, supervision, and mentoring and knowledge of federal and state statutes and regulations.

This scope of practice does not supersede existing state licensure laws or affect the interpretation or implementation of such laws. It should serve, however, as a model for the development or modification of licensure laws.

The goals of this updated *Scope of Practice in Audiology* of the American Speech-Language-Hearing Association (ASHA) are as follows:

1. Revise the current scope of practice for audiologists based on new and evolving training, skills, technology, and literature within the profession.
2. Align our professional activities with the evolving best practice models in audiology within the overall health care field.
3. Serve as a resource for other agencies, professional organizations, and the general public (e.g., federal, state, nongovernmental organizations, licensing and credentialing bodies, etc.).
4. Provide a language and framework that is applicable for all audiologists, regardless of professional setting.

AUDIOLOGY SERVICE DELIVERY AREAS

Clinical service delivery areas include all aspects of hearing, balance, and other related disorders that impact hearing and balance, including areas of tinnitus, cognition, and auditory processing for individuals across the lifespan. Audiologists play critical roles in health literacy (<https://www.asha.org/slp/healthliteracy>); in the screening, diagnosis, and treatment of hearing, balance, and other related disorders; and in the use of the *International Classification of Functioning, Disability and Health* (ICF; WHO, 2014) to develop functional goals and collaborative practice. As technology and science advance, the areas of assessment and intervention related to hearing, balance,

and other related disorders grow accordingly. Clinicians should stay current with advances in hearing and balance practice by regularly reviewing the research literature; regularly consulting the Practice Management (<https://www.asha.org/practice/>) section of the ASHA website, including the Practice Portal (<https://www.asha.org/practice-portal/>); and regularly participating in continuing education to supplement advances in the profession and to provide additional information that can inform the Scope of Practice in Audiology.

DIAGNOSTICS FOR HEARING, BALANCE, AND OTHER RELATED DISORDERS

Audiologists are responsible for the assessment of hearing, balance, and other related disorders, including tinnitus and auditory processing, across the lifespan that includes the following:

- Administration and interpretation of clinical case history.
- Administration and interpretation of behavioral, electroacoustic, and electrophysiologic measures of the peripheral and central auditory, balance, and other related systems.
- Administration and interpretation of diagnostic screening that includes measures to detect the presence of hearing, balance, and other related disorders. Additional screening measures of mental health and cognitive impairment should be used to assess, treat, and refer (American Academy of Audiology, 2013; Beck & Clark, 2009; Li et al., 2014; Shen, Anderson, Arehart, & Souza, 2016; Sweetow, 2015; Weinstein, 2017, 2018).

This assessment includes measurement and professional interpretation of sensory and motor evoked potentials, electromyography, and other electrodiagnostic tests for purposes of neurophysiologic intraoperative monitoring and cranial nerve assessment.

Diagnostic measures should be modified based on patient age and on cognitive and physical abilities of the individuals being assessed. Case findings of dementia, memory, vision, and balance (falling risk) should be used when difficulty in communication and/or change of behavior is evident (Beck & Clark, 2009; Li et al., 2014; Shen et al., 2016; Sweetow, 2015; Weinstein, 2017; Weinstein, 2018). Assessment extends beyond diagnostic evaluation and includes informational counseling, interpretation of results, and intervention.

Assessment is accomplished using quantitative and qualitative measurements—including standardized testing, observations, and procedures and appropriately calibrated instrumentation—and leads to the diagnosis of abnormal audiologic and/or balance function. Interpretation of test results includes diagnostic statements as to the probable locus of impairment and functional ability within the hearing, balance, and other related systems under assessment.

Audiologists collaborate with other professionals and serve on care teams to help reduce the perceived burden of hearing, balance, and other related disorders and maximize quality of life for individuals.

TREATMENT FOR HEARING, BALANCE, AND OTHER RELATED DISORDERS

Audiologists provide comprehensive audiologic (re)habilitation services for individuals and their families across the lifespan who are experiencing hearing, balance, or other related disorders (e.g., tinnitus and auditory processing disorder). Intervention encompasses the following:

- Auditory training for sound identification and discrimination

- Cerumen management
- Communication strategies (e.g., environmental manipulation, mode of communication)
- Counseling
- Manual communication
- (Re)habilitation related to auditory disorders
- Self-advocacy for personal needs or systems change
- Speechreading
- Strategies to address other related disorders (tinnitus, misophonia)
- Technology interventions
- Vestibular rehabilitation to include management of benign paroxysmal positional vertigo as well as peripheral and/or central vestibular disorders

In this role, audiologists

- design, implement, and document delivery of service in accordance with best available practice;
- screen for possible cognitive disorders;
- case-finding for dementia;
- provide culturally and linguistically appropriate services;
- integrate the highest quality available research evidence with practitioner expertise as well as with individual preference and values in establishing treatment goals;
- utilize treatment data to determine effectiveness of services and guide decisions;
- deliver the appropriate frequency and intensity of treatment utilizing best available practice;
- engage in treatment activities that are within the scope of the professional's competence; and
- collaborate with other professionals in the delivery of services to ensure the highest quality of interventions.

As part of the comprehensive audiologic (re)habilitation program, audiologists evaluate, select, fit, verify, validate, and monitor the performance of a variety of technologies interventions for hearing, balance, and other related disorders. Audiologists provide individual counseling and public education about the benefits and/or limitations of various different classes of devices. Treatment utilizing technology interventions include but are not limited to other emerging technologies:

- Auditory brainstem implants (ABIs)
- Assistive listening devices
- Balance-related devices
- Classroom audio distribution systems
- Cochlear implants
- Custom ear impressions and molds for hearing devices, hearing protection, in-ear monitors, swim plugs, communication devices, stenosis stents, and so forth
- Hearing aids
- Hearing assistive technology
- Hearing protection
- Large-area amplification systems
- Middle ear implants
- Over-the-counter (OTC) hearing aids

- Osseointegrated devices (OIDs), bone-anchored devices, and bone conduction devices
- Personal sound amplification products (PSAPs)
- Remote microphone systems
- Tinnitus devices (both stand-alone and integrated with hearing aids)

Treatment for children also includes developmental and educational interventions such as the following:

- Participation in the development and implementation of an IEP/IFSP for school-age children or implementation of an IFSP for children birth to 36 months of age
- Participation in the development and implementation of a 504 plan
- Measurement of noise levels in educational institutions and recommendations for noise reduction modification

EARLY HEARING DETECTION AND INTERVENTION (EHDI)

Audiologists provide screening, assessment, and treatment services for infants and young children with hearing-related disorders and their families. Services include the following:

- Apply Joint Committee on Infant Hearing (JCIH) protocols for early detection and intervention of infants and children with hearing loss (American Academy of Pediatrics, Joint Committee on Infant Hearing, 2007)
- Establish, manage, and/or review programs following the EHDI protocol
- Provide training and supervision to support personnel
- Monitor the program's outcome measures for quality assurance
- Perform audiological diagnostics to confirm or rule out the presence of a hearing loss
- Provide early intervention treatment for hearing loss to enhance communication and to improve cognitive and social skills
- Upon diagnosis of hearing loss, ensure that the child and family are enrolled in an appropriate early intervention program
- Provide comprehensive information about family support, training, and communication options
- Provide education to community/hospital personnel
- Collaborate with other professionals and with parent groups

EDUCATIONAL AUDIOLOGY

Audiologists in educational settings provide a full spectrum of hearing services to support academic and social achievement for school-age children, adolescents, young adults, and their families with hearing and related difficulties. Services include the following:

- Perform assessments and interpret the educational implications of the student's auditory needs. This also includes assessing and making appropriate recommendations as an advocate on behalf of students, ensuring least restrictive environments.
- Collect data from classroom assessments and from observations of students in various environments, and assess the impact of audiologic interventions on academic and social performance
- Collect data on classroom acoustics, and assess the impact on auditory perception

- Ensure IPP with members of the school multidisciplinary team who facilitate listening, learning, and communication
- Collaborate with private sector/community-based audiologists and other professionals relative to the student's educational needs
- Provide instructional training for educators and staff for the development of skills needed in servicing students with hearing difficulties, which includes providing evidence and recommending support services and resources
- Provide (re)habilitative activities in collaboration with classroom teachers and other support personnel
- Monitor personal hearing instruments
- Recommend, fit, and manage hearing assistance technology
- Counsel children to promote personal responsibility, self-advocacy, and social awareness
- Counsel parents on management options, and provide resource information
- Assist with transitions between academic and vocational settings
- Manage school programs for the preservation of hearing and the prevention of hearing loss
- Manage and implement hearing screening programs

HEARING CONSERVATION AND PRESERVATION

The terms *hearing conservation* and *hearing preservation* are often used interchangeably. Both terms focus on preventing noise-induced hearing loss, whether from occupational or recreational sources. *Hearing conservation programs* are most often, although not exclusively, associated with occupational noise exposure and with U.S. Occupational Safety and Health Administration (OSHA) regulations (OSHA, 2002). In addition, hearing conservation programs have additional elements not found in hearing preservation programs: engineering controls for reducing environmental noise levels, administrative controls for monitoring hearing sensitivity levels, mandated use of hearing protection devices when needed, employee training about noise, the potential synergistic effects of chemical exposure combined with hazardous noise, and requirements for communication about hazards (e.g., warning signs, posting of signs in required hearing protection environments).

Hearing preservation programs focus on non-occupational settings and are most often intended to prevent hearing loss from occurring in individuals who enter the program with normal hearing sensitivity. Examples of hearing preservation programs may include (a) monitoring of auditory function for patients receiving chemotherapy or radiation therapy of the head or neck (University Health Network, 2018) or (b) providing education to students and young adults on the effects of recreational noise and methods to prevent hearing loss (see the Save Your Hearing Foundation at www.earpeacefoundation.org). Audiologists are uniquely qualified through education and training to design, establish, implement, and supervise hearing conservation programs for individuals of all ages in schools, in industry, and for the general public (Lipscomb, 1988).

Audiologists who engage in occupational hearing conservation must monitor current OSHA regulations (OSHA, 2002) regarding the impact of noise levels on hearing sensitivity. This extends to the distribution of, and instructions related to the use of, hearing protection devices.

Audiologists test hearing levels, determine functional hearing ability, measure noise levels, and assess the risk of incurring hearing loss from noise exposure from any source, including non-occupational and recreational noise (Franks, Stephenson, & Merry, 1996a, 1996b, 1996c).

Audiologists implement and manage all aspects of hearing conservation activities—including education, testing, and the determination of program effectiveness—and serve as the supervisor for OSHA and other U.S. government-mandated hearing conservation programs (Suter, 2003).

Audiologists educate the public and other professionals on how to recognize hazardous noise, ways of preventing noise-induced hearing loss, and the risks associated with reduced audibility when exposed to high-level sound.

TELEHEALTH

Telehealth, for audiology, is an alternative method of service delivery that encompasses both diagnostics and intervention services. Diagnostic services are provided using either synchronous or asynchronous protocols (i.e., *store and forward*, whereby data are collected, stored within a computer, and forwarded at a later time). Audiologists provide services using an evidence-based standard of care (American Telemedicine Association, 2017). When practicing via telehealth, audiologists provide care consistent with jurisdictional regulatory, licensing, credentialing and privileging, malpractice and insurance laws, and rules for their profession in both the jurisdiction in which they are practicing as well as the jurisdiction in which the patient is receiving care. The audiologists providing the service shall ensure compliance as required by appropriate regulatory and accrediting agencies (American Telemedicine Association, 2017).

Areas in which telehealth is a viable option include the following:

- Aural/auditory (re)habilitation
- Auditory evoked potentials
- Hearing aid and cochlear implant fitting/programming
- Hearing screening
- Otoacoustic emissions
- Otoscopy
- Pure-tone audiometry and speech recognition in noise
- Supervision of electrophysiology services (e.g., intraoperative monitoring and diagnostic examinations)
- Supervision of vestibular services (e.g., vestibular diagnostic examinations)
- Tympanometry
- Vestibular rehabilitation

COUNSELING

Audiologists counsel by providing information, education, guidance, and support to individuals and their families. Counseling includes discussion of assessment results and treatment options. Counseling facilitates decision making regarding intervention, management, educational environment, and mode of communication. The role of the audiologist in the counseling process includes interactions related to emotions, thoughts, feelings, and behaviors that result from living with hearing, balance, and other related disorders.

Audiologists engage in the following activities when counseling individuals and their families:

- Providing informational counseling regarding interpretation of assessment outcomes and treatment options
- Empowering individuals and their families to make informed decisions related to their plan of care
- Educating the individual, the family, and relevant community members
- Providing support and/or access to peer-to-peer groups for individuals and their families
- Providing individuals and their families with skills that enable them to become self-advocates
- Providing adjustment counseling related to the psychosocial impact on the individual
- Referring individuals to other professionals when counseling needs fall outside those related to auditory, balance, and other related disorders.

ADDITIONAL AREAS OF AUDIOLOGY PRACTICE

Audiology is a dynamic profession, and the fact that the audiology scope of practice overlaps with those of other professionals is a reality in rapidly changing health care, education, industrial, and other environments. Hence, audiologists in various settings work collaboratively with other academic and/or health care professionals to make appropriate decisions for the benefit of individuals with hearing, balance, and other related disorders. This is known as *interprofessional collaborative practice (IPP)* and is defined as “members or students of two or more professions associated with health or social care, engaged in learning with, from and about each other” (Craddock, O'Halloran, Borthwick, & McPherson, 2006, p. 237). Similarly, “interprofessional education [often referred to as “IPE”] provides an ability to share skills and knowledge between professions and allows for a better understanding, shared values, and respect for the roles of other healthcare professionals” (Bridges, Davidson, Soule Odegard, Maki, & Tomkowiak, 2011, para. 5). The advantage of using IPP/IPE is that it broadens the care teams' depth of knowledge and understanding of the individual being evaluated and/or treated. This type of collaboration improves outcomes, efficiency, and safety through person-centered care.

RESEARCH

Audiologists conduct and participate in basic and applied/translational research related to auditory, balance, and other related disorders. This research is undertaken as a facility-specific effort or is coordinated across multiple settings. Audiologists engage in activities to ensure compliance with Institutional Review Boards, federal regulations, and international laws pertaining to research. Audiologists also collaborate with other researchers and pursue research funding through grants.

ADMINISTRATION AND LEADERSHIP

Audiologists administer programs in education, higher education, schools, health care, private practice, and other settings. In this capacity, they are responsible for making administrative decisions related to fiscal and personnel management, leadership, program design, program growth and innovation, professional development, compliance with laws and regulations, and cooperation with outside agencies in education and health care. Their administrative roles are not limited to audiology, as they engage in program administration across departments and at different levels within an institution. In addition, audiologists promote effective and manageable workloads in school settings,

provide appropriate services under the Individuals with Disabilities Education Improvement Act of 2004 (IDEA), and engage in program design and development.

EDUCATION

Audiologists serve as educators, teaching students in academic institutions and teaching professionals through continuing education in professional development formats. This more formal teaching is in addition to the education that audiologists provide to individuals, families, caregivers, decision makers, and policy makers, which is described in other domains. In this role, audiologists

- serve as faculty at institutions of higher education, teaching courses at the undergraduate, graduate, and postgraduate levels;
- mentor students who are completing academic programs at all levels;
- provide academic training to students in related disciplines and students who are training to become audiology assistants; and
- provide continuing professional education to audiologists and to professionals in related disciplines.

ADVOCACY AND OUTREACH

Audiologists focus on upholding person-centered care in our complex health care and educational systems. Audiologists advocate for hearing, balance, and other related disorders needs of the individuals and families whom they serve.

Audiologists advocate for the profession and for individuals through a variety of mechanisms, including community awareness, prevention activities, health literacy, academic literacy, education, political action, and training programs. Advocacy promotes and facilitates access to communication, including the reduction of societal, cultural, and linguistic barriers. Audiologists perform a variety of activities related to advocacy and outreach, including the following:

- Advising regulatory and legislative agencies about the continuum of care for hearing, balance, and other related disorders
- Engaging decision makers at the local, state, and national levels for improved administrative and governmental policies affecting access to services for the diagnosis and treatment of hearing, balance, and other related disorders
- Advocating at the local, state, and national levels for funding for services, education, and research
- Participating in associations and organizations to advance the audiology profession
- Promoting and marketing professional services
- Consulting with industry in the development of products and instrumentation related to hearing, balance, and other related disorders
- Helping to recruit and retain audiologists with diverse backgrounds and interests
- Collaborating on advocacy objectives with other professionals/colleagues regarding mutual goals
- Serving as expert witnesses, when appropriate
- Educating individuals about communication; development; disorders pertaining to auditory, balance, and other related systems; and audiology services

- Advocating for fair and equitable services, including accessibility for all individuals, especially the most vulnerable
- Providing case management and serving as a liaison for individuals and their families in order to meet educational and vocational programming needs
- Consulting with individuals, their families, professionals, public and private agencies, and governmental bodies on technology intervention, hearing assistive technology, interpreting services, and other relevant assistive technology needed to enhance communication
- Consulting with state education agencies, local school districts, and interdisciplinary teams on direct service and IFSP, IEP, and 504 plan development
- Advocating for appropriate reimbursement of services

CULTURAL COMPETENCY

Audiologists serve diverse populations, and this includes persons of different races, ages, genders, religions, national origins, and sexual orientations. Audiologists' caseloads include individuals from diverse ethnic, cultural, and linguistic backgrounds as well as persons with disabilities. Culturally based family and community dynamics should be included in the development of an appropriate treatment plan that includes consideration of diversity and evidence-based practice guidelines.

CLINICAL SUPERVISION/PRECEPTING

Supervision is broadly defined as overseeing and directing the work of others. The terms *clinical supervisor* and *clinical supervision* are often used in reference to the training and education of student clinicians, recognizing that supervision is part of the training and education process. However, clinical supervisors do more than oversee the work of the student clinician. They teach specific skills, clarify concepts, assist with critical thinking, conduct performance evaluations, mentor, advise, and model professional behavior (Council on Academic Programs in Communication Sciences and Disorders [CAPCSD], 2013). Supervision is a distinct area of practice; is the responsibility of audiologists; and crosses clinical, administrative, and technical spheres. Audiologists are responsible for supervising clinical externs/trainees, audiology assistants, credentialed technical staff, and other professional and administrative support personnel. Audiologists also supervise colleagues and peers. Audiologists acknowledge that supervision is integral in the delivery of hearing, balance, and other related services and that supervision advances the profession. Supervision involves education, mentorship, encouragement, counseling, and support across all supervisory roles. In this role, audiologists

- possess service delivery and professional practice skills necessary to guide the supervisee;
- apply the art and science of supervision to all stakeholders (i.e., those supervising and being supervised), recognizing that supervision contributes to workplace efficiency;
- seek advanced knowledge in the practice of effective supervision;
- establish supervisory relationships that are collegial in nature; and
- establish supervisory relationships that promote growth and independence while providing support and guidance.

INTERPROFESSIONAL EDUCATION AND INTERPROFESSIONAL PRACTICE (IPE/IPP)

According to ASHA's definition, *interprofessional education* (IPE) is an activity that occurs when two or more professions learn about, from, and with each other to enable effective collaboration and improve outcomes for individuals and families whom we serve (ASHA, n.d.-b). Similarly, *interprofessional collaborative practice* (IPP) occurs when multiple service providers from different professional backgrounds jointly provide comprehensive health care or educational services by working with individuals and their families, caregivers, and communities to deliver the highest quality of care across settings. When both IPE and IPP are used, we refer to this combined term as *IPE/IPP*.

BUSINESS MANAGEMENT

Audiology is a service profession to which principles of business must be applied for success in educational, health care, and industrial settings. For a business entity (profit or nonprofit) to be successful, good business practices are essential. Providing high-quality services that are consistent in type and amount with a person's needs and with professional and ethical standards is good business practice. It is important that revenues collected for services cover and exceed all expenses (e.g., salary, benefits, overhead). Audiologists must understand their individual responsibility for adhering to practice standards that financially support their organization. Each audiologist's daily decisions (clinical and nonclinical) affect the financial viability of his or her organization. Audiologists must remain compliant and current on policy changes related to billing and coding.

LEGAL/PROFESSIONAL CONSULTING

Audiologists may be called upon to provide expertise to other professionals, business, industry, courts, attorneys, public and private agencies, and/or individuals in all areas related to the profession of audiology. Consulting services include but are not limited to

- recommendations for occupational and recreational hearing preservation and conservation, education, and advocacy for policy development;
- quality assessment and improvement; and
- expert witness testimony or second opinion and/or independent evaluation for educational, health, worker's compensation, or other legal purposes.

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MODEL BILL OF RIGHTS
for People Receiving
Audiology or Speech-Language Pathology Services

Clients as consumers receiving audiology or speech-language pathology services have:

- 1) THE RIGHT to be treated with dignity and respect;
- 2) THE RIGHT that services be provided without regard to race or ethnicity, gender, age, religion, national origin, sexual orientation, or disability;
- 3) THE RIGHT to know the name and professional qualifications of the person or persons providing services;
- 4) THE RIGHT to personal privacy and confidentiality of information to the extent permitted by law;
- 5) THE RIGHT to know, in advance, the fees for services, regardless of the method of payment;
- 6) THE RIGHT to receive a clear explanation of evaluation results, to be informed of potential or lack of potential for improvement, and to express their choices of goals and methods of service delivery;
- 7) THE RIGHT to accept or reject services to the extent permitted by law;
- 8) THE RIGHT that services be provided in a timely and competent manner, which includes referral to other appropriate professionals when necessary;
- 9) THE RIGHT to present concerns about services and to be informed of procedures for seeking their resolution;
- 10) THE RIGHT to accept or reject participation in teaching, research, or promotional activities;
- 11) THE RIGHT, to the extent permitted by law, to review information contained in their records, to receive explanation of record entries upon request, and to request correction of inaccurate records;
- 12) THE RIGHT to adequate notice of, and reasons for discontinuation of services; an explanation of these reasons, in person, upon request; and referral to other providers if so requested.

Official Statement of ASHA Approved in 1993

Please refer to <https://www.asha.org/Code-of-Ethics/> for the most current version of the Code of Ethics.

Please refer to <http://www.asha.org/uploadedFiles/SP2004-00192.pdf> for the most current version of the Scope of Practice in Audiology.

Clinic Facilities

Main Office and Front Office

The Main Office is located on the third floor of Lyles-Porter. The Department Head, Graduate Secretary, Assistant to the Head, Business Office, and faculty mailroom are located here. The Main Office is open from 8:00 am to 5:00 pm Monday through Friday.

The Front Office is located in room 1042. It is open from 8:00am to 5:00pm Monday through Friday. The receptionists schedule patient appointments, check-in and check-out patients, send reports, and fulfill other necessary functions related to clinic and the department.

Graduate Student Room

Lockers are available in room 3091A for student clinicians. The graduate student room is #2143. Patient paper charts may be taken to the graduate student room (#2143), but should **never be left unattended**. Patient paper charts should **never leave the building**, but should be secured in the Main Office, Clinical Instructor's office or designated file cabinet in the Audiology Clinical Assistants' office at the close of each day.

Mailboxes

Faculty/staff mailboxes are located in the SLHS Mail Room located on the third floor of Lyles-Porter Hall in the main office. All graduate students are assigned two mailboxes at the beginning of each semester and these are located in the audiology clinic workroom (#2171) and in the EHR room (#2143). Be sure to check your mailbox **daily** since your clinical instructor or office staff may leave important messages for you here regarding patients, which need prompt attention. Use discretion when leaving items of value in your mailbox.

Patient Waiting Room

The patient waiting room is located in Room 1042. Clinical discussions should not take place in the waiting room. If important information needs to be exchanged with patients/parents, it should be discussed in the privacy of a counseling room or test suite.

Resource Room

The Resource Room is located in Room 2161. Extra materials needed for play audiometry or aural rehabilitation may be checked out from the Resource Room. Materials must be signed out and returned promptly after use. Toys for play audiometry are also located in the Audiology Clinic workroom. Be sure not to exchange materials between the Audiology clinic and the Resource Room.

Preschool Screening Equipment

Preschool screening audiometers, tympanometers, screening kits, and dosimeters are located in the audiology file room behind the clinic front desk (Room 1042). If you need to use one of these items, it must be checked out. Index cards in a black box on top of the cabinets are used to identify the audiometer you are checking out, the date you are checking it out, and the date you return it.

Computer Access

Computers will be available in the graduate student/electronic health records (EHR) room (#2143) and in the audiology workroom for clinic related work only.

Electronics and Technical Support

The Electronics & Technical Support Office is located in Room 3080, and supports the Audiology Clinic equipment set-up, maintenance, calibration, and repair. This is also where equipment is stored, assembled, restored, and repaired. Equipment can be checked out for use if needed (e.g., TV cart, laptop, etc.).

Adult Aural Rehabilitation Room/ALD Room

The adult aural rehabilitation room is located in 2168. Assistive listening devices are stored in this room. This room is used for small classes, meetings, and group adult aural rehabilitation sessions as well as storage of additional PPE.

Copying Policy

There is a copy machine in room 2159 that is for clinic use only (i.e., patient audiogram). Personal copies of your materials or coursework needs to be copied at the undergraduate and HSSE libraries or the Purdue Memorial Union.

Keys

Each student clinician obtains keys to the building and clinic in the beginning of the first semester. This allows students access to the clinic facilities after hours.

Telephones

There are several telephones available for students to make local as well as long distance calls to patients (e.g., Audiology Clinic, Audiology Clinical Assistants Office, behind the reception desk). Campus telephone calls may be made by dialing the last 5 digits of the phone number. All other calls can be made by dialing 7 followed by the phone number.

Accessibility

The Audiology and Speech-Language Clinics are accessible to individuals with disabilities. An elevator is located near the entrance. Therapy rooms and audiology testing suites in the clinic are wheelchair accessible.

Patient Parking

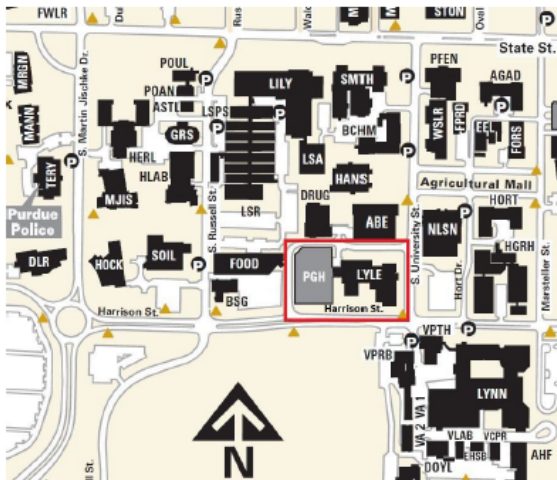
Patients can park anywhere in the garage that is not otherwise designated. Patients should then proceed through the double metal doors and continue down the first floor hallway to check in at the front desk waiting area (on the left – room #1042).

Directions to Lyles-Porter Hall on Purdue University Campus

715 Clinic Drive, West Lafayette, IN 47907

From Chicago

- 165 S to Exit 193
- Turn **right** onto US 231S
- Turn **left** onto US 52
- Turn **right** onto US 231
- Follow US 231 to Martin Jischke Dr.
- Turn **left** onto Martin Jischke Dr.
- Follow that road up to a Traffic circle
- and veer off to the **right** onto Harrison St, staying in the **left** lane.
- Go to the stop sign and go straight
- Take the next **left** onto Clinic Drive.
- Take a **right** into the Harrison Street Parking Garage.



From Indianapolis:

- Follow I65 N
- Take exit 141 for US-52 W
- Continue** onto US-52 W
- Turn **left** onto East 350 South/Veterans Memorial Pkwy S
- Continue **straight** to stay on East 350 South/Veterans Memorial Pkwy S
- Turn **right** onto US-231
- Follow US 231 to Martin Jischke Dr.
- Turn **right** onto Martin Jischke Dr.
- Follow that road up to a Traffic circle
- Veer off to the **right** onto Harrison St, staying in the **left** lane.
- Go to the stop sign and go straight
- Take the next **left** onto Clinic Drive.
- Take a **right** into the Harrison Street Parking Garage.

If using GPS, use Harrison Street Parking Garage. This will bring you directly to the parking garage connected to Lyles-Porter Hall.

You may park anywhere in the garage, unless otherwise designated.

Please bring your parking pass in with you so we may validate it.

If you have any questions, call us at
765-494-3789 or 765-494-4229

M.D. Steer Audiology and Speech Language Clinics • Lyles-Porter Hall • 715 Clinic Drive • West Lafayette, IN 47907
Phone: (765) 494-3789 • Fax: (765) 494-0771 • www.purdue.edu/hhs/slhs

Clinical Practicum

General Guidelines

Student participation in clinical practicum should be considered a privilege rather than a right. Clinical practicum participation is different in many ways from class and laboratory assignments. It involves the welfare of the clients/patients in our clinics as well as the training needs of students. We are ethically bound to protect the welfare of the clients/patients in our clinics, so special policies apply to these educational opportunities. Admission to graduate study in audiology in the Department of Speech, Language, and Hearing Sciences at Purdue University does not guarantee participation in clinical practicum. A basic prerequisite skill is that all student clinicians must pass a screening of their English speech and language skills.

As it is deemed necessary for student clinicians to model communicative behaviors that they are trying to help their clients/patients develop, and for the speech of audiology student clinicians to be understood by their hard of hearing clients and their families, all potential participants in clinical practicum must demonstrate English speech production and spoken English language skills and knowledge at the level necessary to provide appropriate clinical services to their clients/patients. All entering students will be screened for acceptable use of spoken English speech and language before they can be given clinical assignments. Inadequate performance will result in a delay in clinical participation until adequate performance can be demonstrated. The clinical faculty of the appropriate clinic will make the decision about adequacy of demonstrated proficiency in English speech and spoken language for participation in clinical practicum.

Progression of Clinical Assignments

Usually coursework must be completed (or be concurrently taken) in a particular category prior to being assigned clinic in that area. Beginning SLHS 57900 student clinicians will be assigned to audiological assessments, whereas advanced SLHS 57900 student clinicians will be assigned the full range of diagnostics including ABR, OAE, amplification and aural rehabilitation. Advanced student clinicians may also be assigned clinical externships beginning in the third year of the program.

Clinical practicum will begin with registration in SLHS 57900 the first semester of the program. Students will observe for two - four weeks in the Purdue University M.D. Steer Audiology clinic during the first semester of the Au.D program. They will then assume a more active role in clinical service delivery along with their clinical instructor for the remainder of the semester. Attendance and participation in the weekly seminar class for SLHS 57900 is **required**. Any unexcused absences can result in a lowering of the clinic grade. Students will enroll in subsequent SLHS 57900 registrations at the M.D. Steer Clinic until they are judged by the clinical faculty as competent to be placed at external practicum sites.

It should be noted that when a student registers for clinical practicum (SLHS 57900/67900), it is expected that the student will complete the entire semester. Clinic assignments are based upon the enrollments at the beginning of the semester. The student should discuss the request to drop practicum with the clinic instructors, Director of Clinical Education in Audiology and his/her faculty member advisor.

Requirements for the ASHA Certificate of Clinical Competence in Audiology include the acquisition of knowledge and skills as stated in the ASHA standards. For graduation and state licensure, students must complete a minimum of 1820 hours of supervised clinical practicum by audiologists who hold their state license. Purdue University graduation requirements also include the completion of three semesters (summer, fall and spring) in the fourth year even if excess hours are accrued during this time. It is the intent to distribute these hours across the 4-year AuD program in settings that provide a breadth of clinical experiences. These experiences may include basic and advanced auditory and vestibular system assessment, hearing amplification, cochlear implants and other implantable devices, pediatric and adult aural rehabilitation, hearing conservation, educational audiology, sedated assessments and intra-operative monitoring using evoked electrophysiological measures, and business practices in audiology.

All clinical practicum hours obtained by the student must have prior approval by the Director of Clinical Education, as each approved site must have a formal affiliation agreement filed with Purdue University prior to the placement of audiology students.

Students should refer to the ASHA certification section in the Graduate Handbook, which describes enrollment in clinical practicum, clinical practicum privileges and clinical externships. Please also refer to <https://www.asha.org/Certification/Certification-Standards-Change-in-2020/> for the most current version of the 2020 Standards and Implementation Procedures for the Certificate of Clinical Competence in Audiology.

Sample Audiology Clinical Education Practicum Experience Sequence

Time Line	SLHS Clinical Course	Clinical Practicum	Approx. Time
First Fall Semester	SLHS 57900	2 – 4 weeks of active observation leading to participation; M.D. Steer Clinic	50 hours
First Spring	SLHS 57900	M.D. Steer Clinic	60-80 hours
First Summer	SLHS 57900	M.D. Steer Clinic	30-60 hours
Second Fall	SLHS 57900	M.D. Steer Clinic	60 hours
Second Spring	SLHS 57900	M.D. Steer Clinic	60 hours
Second Summer	SLHS 57900	M.D. Steer Clinic/Externship site	30-100
Third Fall	SLHS 57900	M.D. Steer Clinic / Externship site	60-300 hours
Third Spring	SLHS 57900	M.D. Steer Clinic/ Externship site	250-350 hours
Third Summer	SLHS 67900	Fourth year site	250 hours
Fourth Fall	SLHS 67900	Fourth year site	500 hours
Fourth Spring	SLHS 67900	Fourth year site	500 hours
GRAND TOTAL			1850 – 2310 hours

Dress Code

The following dress code applies any time you are in the Audiology Clinic for more than 10 minutes whether or not you are seeing patients. This includes being in the clinic for labs, research, meetings or for clinical assistant duties. This dress code is also the minimum requirement for all off-campus clinical placements. Individual facilities may have additional or more stringent guidelines. Dress must be conservative and appropriate for the clinical population seen in the clinic

1. Student clinicians must wear their name badge when providing services to patients.
2. All attire must appear neat, pressed and professional looking.
3. No denim jeans, Capri length pants or shorts are allowed. Pants must not be excessively baggy or ride excessively low on the hips.
**Leggings are not pants. If wearing leggings, dresses/skirts must come to the knee.
4. Skirts must come to the knee and be loose enough to allow for movement.
5. Any pants/skirt/shirt combination must cover the midriff when the arms are raised and also cover the back when bending over.
6. Shirts for men must have collars and be tucked in. Ties are recommended. T shirts even with collars are not appropriate for men or women.
7. Low-cut tops that show cleavage, sleeveless tops or shirts that show through are not allowed. Tops should not be so tight as to create a gap in the front.
8. Shoes should look professional and be closed in the front. Open back shoes such as mules are acceptable. No flip-flops or athletic shoes are allowed.
9. Unusual hair coloring (e.g. pink, blue, green etc.) and style (e.g. Mohawk) are not allowed. Long hair should be pulled back.
10. Any visible or potential visible body art needs to be removed or covered. Oral or facial piercing (tongue, lip, and eyebrow) must be removed. Tattoos must be covered with long sleeves or a high collar. Ankle or foot tattoos must be covered with pants or dark tights.
11. No perfumes or scented body products allowed at **ANY** time in the front office or clinic areas.

Any student who is not dressed appropriately will not be allowed to participate in clinic.

For this reason, it may be beneficial to keep a change of clothing, sweater etc. in your locker to use if needed.

Please note that black scrubs may be worn instead of business casual dress. You may wear a shirt underneath the scrub top. As described above, scrubs should not be so tight as to hinder movement or show midriff skin. Clean athletic shoes may be worn with scrubs.

Titles

Students will introduce themselves to patients with their first and last name and state that they are a graduate student in Audiology. They will also introduce their clinical instructor by their full name or as Dr. _____ and state they are the ‘supervising audiologist’. Students will ensure that they do not use other titles for themselves, such as Au.D. candidate verbally or as e-mail signatures. Off-campus students in placements will use “Audiology Extern” or other title if suggested by their clinical instructor.

Attendance Policy

Consistent attendance in clinic is required to gain appropriate clinical skills and make adequate progress each semester. **All students are therefore expected to attend each scheduled clinical session during a semester.** Illness or funeral attendance is the only reasons considered acceptable for missing clinic. A doctor's note is required if you miss more than two clinic sessions due to illness during a semester.

If you anticipate that you will miss clinic in order to attend a conference, you are **required** to obtain **written approval** from your clinical instructor(s) **at the beginning of the semester.** **Do not make your travel plans before you obtain approval from your clinical instructor(s).**

Tardiness: Students are also expected to be **on time** and ready for their scheduled clinical session 15 minutes before the scheduled appointment time. If a student is tardy, the clinical instructor will begin the clinic on time and the student may not be allowed to participate in the session, but may participate with the next patient. If a student is tardy more than once, the student may not be allowed to participate in that entire clinical session and the clinic grade will be lowered.

Liability Insurance

Liability Insurance is paid for through student special course fee. The policy is good for one year, from August 1-July 31. **Note that although the clinic is open to students after hours to practice their skills, under no circumstances can students see actual patients, make ear impressions or assess infants without supervision from a clinical faculty member.**

SLHS Special Course Fee

There is a special course fee associated with clinical practicum. This fee covers access to electronic health records system, name badges, and liability insurance. Students will be assessed this fee each time they are registered for SLHS 57900.

Logging Hours

Students are required to log the amount of time spent participating in each session including preparation, report writing etc. Daily clinic hours will be noted on the Daily Feedback Sheet and the student is required to enter this information in Calipso on a weekly basis. Each student is **required** to keep track of their hours each semester including off-campus sites and in the fourth year. The clinical instructor will approve the hours once they are entered by the student. **This information is necessary for state licensure, ASHA Certification and graduation. It is the student's responsibility to maintain accurate records.**

Crossroads Conference

When the Purdue Chapter of the National Student Speech-Language and Hearing Association (NSSLHA) and the Student Academy of Audiology (SAA) host the Crossroads Conference on Communicative Disorders, all student clinicians enrolled in SLHS 57900 are required to attend the Audiology sessions at the conference.

HIPAA (Health Insurance Portability and Accountability Act)/Risk Management

The Health Insurance Portability and Accountability Act is a federal law passed by Congress in 1996. The purpose of HIPAA is to protect the confidentiality and security of health information as it is used, disclosed and electronically transmitted and to create a framework, using standardized formats, for transmitting electronic health information more efficiently. The Audiology & Speech-Language Clinics are covered entities under HIPAA and all students, faculty and staff are required to comply with HIPAA regulations and complete annual HIPAA training. Every student enrolled in SLHS 57900 and 67900 is also required to complete training and paperwork related to Risk Management. Annual training on Universal Precautions, Hepatitis B, TB and HIV transmission is provided each year during the fall semester. Each student is further required to complete a Criminal History check and CPR training as part of Risk Management.

Clinic Procedures

Program Procedures

A binder containing procedural guidelines for the following programs is continually updated in the Audiology Clinic Workroom. Please see this binder for step-by-step instructions necessary to follow guidelines for these programs. Descriptions can also be found in the appendix of this handbook.

- Disability Determination Bureau (DDB)
- First Steps of Indiana
- Lion's Club
- Greater Lafayette Area Special Services (GLASS)
- Hear Now
- Help America Hear
- Vocational Rehabilitation Services
- Hearing Assistance Program of Indiana (HAAPI)
- Purdue Hearing Conservation Program (HCP)

Clinical Assignments

A schedule sheet (see appendix) is provided at the end of each semester for students to record their classes and any other times that they **cannot** be in clinic. This schedule sheet needs to be turned in to the Director of Clinical Education in Audiology before the beginning of each semester before clinical practicum can be assigned. Any special requests for clinical practicum may be made on the schedule sheet. Once the clinic schedule is assigned, changes are very difficult to make.

No-shows/Cancellations

When a patient cancels an appointment, the receptionist will alert the clinical instructor through instant message. Absences are recorded via an encounter note in the patient's electronic medical record. Every opportunity is given to reschedule a patient if the patient needs to cancel an appointment. In the event of a no-show, student clinicians need to be available to see walk-in patients, discuss cases, work through case based learning modules, practice procedures etc.

Patient Scheduling Policy

It is the policy of the Purdue University Audiology Clinic to schedule patients for services based on their waiting list order. This order is determined by the date of the patient's request for services. Priority is given to infants, children and physician referrals.

Exceptions may be made to this policy when taking into consideration the nature and severity of certain communication disorders, research/grant needs, and the clinical requirements of students as reflected by the accreditation policies of the American Speech-Language-Hearing Association.

Clinic Preparation

Student clinicians should review the clinic schedule in the electronic health record system, Point and Click (PNC) at least one week prior to the clinic. Changes may occur to the schedule, so the student should check it regularly. Students should review the patient's electronic medical record through PNC licensed computers in the audiology workroom or EHR graduate student room or the patient's paper record. Preparedness includes knowing details about the patient and why they are scheduled, a plan for the session, and questions for the supervising audiologist related to responsibilities of the student clinician during the session. If the appointment is related to fitting a hearing aid or earmold, it is the student's responsibility to ensure that the item is in the supervisor's drawer and to communicate with the supervisor regarding programming or other needs at least 2-3 days before the clinic appointment.

Patient Paper Charts

Paper charts are located in the main office and basement in various file cabinets as follows:

- Paper charts for patients with appointments already scheduled may be in the file slots in front of the date of their appointment
- All other charts are arranged numerically (by clinic number) in the appropriately numbered file cabinets.
- Paper charts currently in use by a student clinician may be placed in the file slot in front of their name or in their clinical instructor's slot.
- Paper charts for patients who are not current are stored in the audiology file room behind the first floor reception area (room 1042). The appointment secretary has the key to the file room. Older charts may be located in the basement storage room.
- HCP charts are listed alphabetically in a separate filing system.

Prior to the arrival of the patient, the chart should be reviewed. The patient will complete a case history form, designation of individuals involved in treatment/payment form, legal release and request for admission form, and HIPAA acknowledgement form upon arrival at the Clinic. Patients over the age of 65 also may complete the ABN form prior to the appointment.

In most cases, all forms are mailed to new patients in advance. In some cases, due to appointments made on short notice, this may not be possible.

Paper charts may be taken only to the graduate student rooms, audiology workroom, clinical instructor offices, and the audiology assistants' office. They must be returned immediately after obtaining the needed information. **Patient charts are to never be taken out of the building or left unattended anywhere.**

Procedures following the appointment

After the completion of an evaluation, the progression is as follows:

- Reports and any related paperwork should go to the clinical instructor as soon as possible (**within 24 hours**, unless special arrangements have been made with the clinical instructor) via an IM through PNC to the instructor with context attached.
- Chart notes should be made **immediately** following each appointment whenever possible so that important information is not omitted or forgotten.
- The student clinician should ensure paperwork is taken to the receptionist for scanning.
- Clinical instructor reviews chart notes/report and uses IM to alert the student clinician if edits are needed.
- After signing the note, the clinical instructor IMs the receptionist that the report is ready to be mailed to recipients.
- The goal is to mail out patient reports within **one week** of their appointment.

Forms

Patient intake forms (i.e., case history, HIPAA, consent to release info, contact sheets) are located in the Main Office. Audiograms, hearing aid manufacturer, and additional clinic related forms can be found in the Audiology Clinic workroom. When the supply of forms is low, the student clinician should take a copy of the form that needs to be duplicated and put it in the Audiology Assistants' office so that additional copies can be ordered.

Billing Procedures

Schedule of Fees

A copy of the Audiology Clinic Schedule of Fees for Services and Products can be obtained in the audiology workroom and in the front office. This schedule should be used to determine the cost of various services offered by the Purdue University Audiology Clinic. Prices for hearing instruments and hearing aid accessories are available in binders located in each counseling room. If there is some doubt about the charge for a particular hearing aid or other device, consult your clinical instructor. [NOTE: The schedule of fees is reviewed and revised on a regular basis and the new information is provided to student clinicians as soon as it is available.]

Fee Payment Information

The patient will have one of three options for payment. These include:

1. Payment of the total fee at the conclusion of service.
2. Payment of 100% of services and 50% of the hearing aids immediately with the remainder paid in one to two additional installments with the approval of the clinical instructor.
3. Billing a third party, such as First Steps, Medicare, or Vocational Rehabilitation.

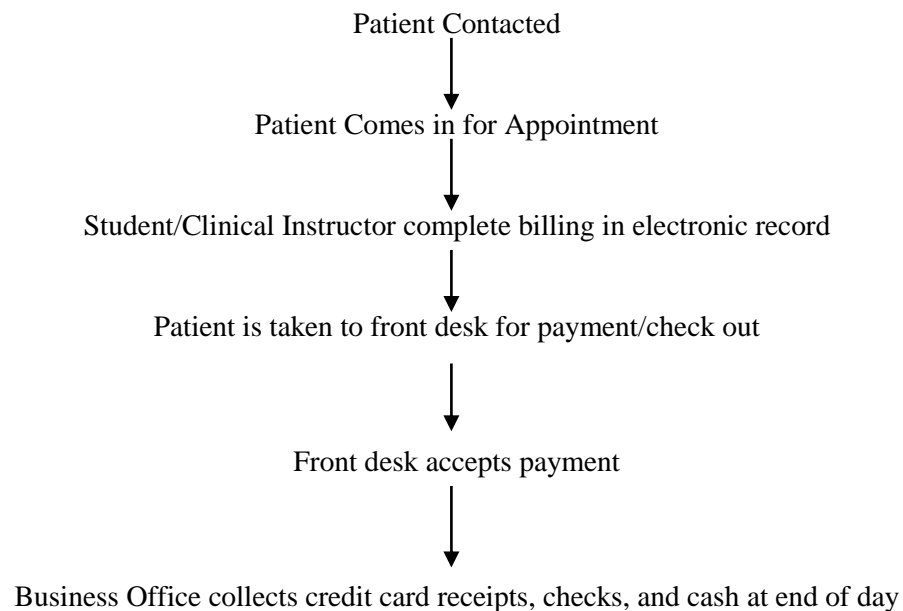
Most insurance companies do not pay for services until after they have been provided. Therefore, patients should plan to make payments and request that insurance reimbursement go directly to them. We would be happy to provide any additional information that may be needed to complete these claims (itemized bills, etc.). All checks must be made payable to Purdue University. Master Card, Visa and Discover are also accepted.

It should be noted that in the event that a patient is not financially able to fully pay for services, a full or partial waiver of fees may be provided with the approval of the Director of Clinical Education.

It is the policy of the Audiology Clinic that charges to patients are submitted at the conclusion of each appointment.

At the end of the clinic, the clinician will complete the charges through electronic medical records, discharge the patient, and escort the patient to the front desk. The front desk receptionist will take payment and assist in any rescheduling if needed.

Audiology Clinic Fee Program Flow Chart



Summary:

All full payments (check, cash, credit card) will be completed at the front desk by the receptionist. If a payment plan is needed, this must be arranged through the clinic instructor and business office.

Audiology Clinic Maintenance

It is the responsibility of all individuals who work in the Audiology Clinic to leave the audiology suites, waiting room area and workroom in a clean, neat condition. All equipment should be replaced in the proper location following test procedures. Immittance probe tips should be placed in designated containers in order to be cleaned and returned for re-use. New batteries for ear lights may be obtained from the inventory cabinet in the clinic hearing workroom and Audiology Assistants should be notified if batteries run low. All otoscopes should be re-charged when they are no longer working. Small desks, chairs and toys used for testing children should be removed from the testing environment after use so that the room is ready for standard testing procedures. All equipment should be turned off at the end of the scheduled day and all rooms should be locked in order to maintain security. **No food or drinks are allowed in the clinic (except for water). Do not enter the Audiology Clinic during scheduled clinic times if you are not dressed in appropriate professional attire.**

Malfunctioning Equipment

If a piece of equipment is not working properly, the student clinician, together with the clinical instructor, should first troubleshoot, attempting to correct the problem. If the problem cannot be fixed, identify what the problem seems to be and leave a note on the equipment indicating the problem and alert the audiology assistants &/or the Clinic Director. They will troubleshoot before emailing hhshelp@purdue.edu who will respond to the request. When the equipment has been repaired, the support personnel will email what was done to remedy the problem.

Start-up

The audiology assistants are responsible for start-up and shut-down of the clinic.

1. Daily biologic checks of clinical equipment:

Audiometers:

Power

AC/BC frequency check (250 - 8000Hz)

Attenuator check

Crosstalk check

Microphone check

CD/Tape players check

Soundfield check

VRA toys check

Immittance Equipment:

Calibrate with coupler

IMPORTANT: Indicate in logbook in each test booth (Daily Audiometer Calibration) and in the Daily Start-up Checklist clinic (back room) that daily biologic check was completed.

2. Ensure that a charged otoscope is placed in each test booth.

3. Ensure that clean immittance tips are available at each immittance bridge (place clean and dried immittance tips from ultrasonic cleaner at each station).

4. Remove cleaned items from the ultrasonic cleaner and place them out to dry.
5. Ensure that test booths are clean and neat.
6. Ensure that specula for otoscopy are stocked in each dispenser.
7. Ensure that each test booth has a supply of audiograms.

Shut-down

At the end of the scheduled clinic day, turn off all equipment including audiometers, immittance bridges, TV and lights. Replace all furniture, cords and tools in their proper place. Place all dirty immittance and tips in the ultrasonic cleaner, to soak for at least 6 hours. Complete cleaning procedures. Make sure the clinic is locked for the night.

IMPORTANT:

- Each student clinician is responsible for the cleanliness and care of the test booths, waiting area, and any other patient area after each patient contact.
- If any supplies are low, write down the item on the order sheet in the clinic back room for the audiology assistant to order.

Legal Release Forms

Acknowledgement of Receipt of Privacy Notice (see appendix).

Each patient signs this form at their first appointment in the clinic and it is **required** to be in their chart.

Legal Release and Request for Admission (see appendix)

Each file should contain a Legal Release and Request for Admission form. Patients sign this form at their first visit, and it is **required** to be in every patient chart prior to being evaluated in the clinic.

Designation of Individuals Involved in Treatment/Payment (see appendix)

Patients list spouses or other family members on this form, allowing us to discuss the case with them, release hearing aids to them etc.

Consent to Release Information Form (see appendix)

A Consent to Release Information form allows clinicians to provide information in terms of test results and reports to physicians, schools and other professionals. Please verify that this form is signed and in the patient's chart before sending out any information regarding your patient. If this form is missing please see that one is completed immediately, prior to sending information. In the case of urgency a verbal release may be used (make a note to this effect in an encounter note), but a written consent should be obtained and placed in the chart as soon as possible. In

accordance with referral policy, all referring parties will be sent a report unless specifically asked by the patient not to do so. This form must be completed at the conclusion of the evaluation session by those patients. This form can also be completed and signed if information is needed from other persons or agencies.

Note: HIPAA regulations allow the disclosure of information for treatment, payment and operations. However the Audiology Clinic policy is to always have a signed Release of Information form prior to releasing information.

Advanced Beneficiary Notice (ABN form)

This form is may be signed by all patients who are eligible for Medicare (> 65 years old). The Purdue University Audiology Clinic is set up to file claims to Medicare

Telehealth Consent Form (see appendix)

This form is to be signed by all patients prior to the start of a telehealth session. The front desk will email this form to the patient and patient will sign via docusign and return. The form will be scanned into PNC when that option is able to happen, but will be kept in filelocker until that time.

Medical Waiver (see appendix)

FDA Regulations have changed and indicate that now that a patient may not need a medical examination within 6 months of the date of hearing aid purchase as was the case in the past. In our clinic, for initial hearing instrument users, where the patient is over 18 years of age and when there are no "medical warnings", the patient may exercise the option to sign a waiver of the Medical Examination. The signed portion of the medical examination waiver must be scanned in the patient's chart. Hearing aids cannot be dispensed until this or the medical examination form has been signed and placed in the patient's folder. Our medical waiver form is one part of the Hearing Aid Selection Agreement form.

If the patient is below the age of eighteen, by law, medical clearance from a physician must be obtained. A medical examination form preferably signed by an otolaryngologist is required before the dispensing of the hearing aid. A medical waiver cannot be signed for patients under the age of 18.

Medical Examination Form (see appendix)

In the event that a hearing aid evaluation has been recommended, this form should be given to the patient at the conclusion of the initial evaluation session if a medical examination is considered necessary. This form is to be completed by the patient's physician prior to the dispensing of a hearing aid. In some cases, the recommendation is for the patient to be evaluated by an otolaryngologist. The student clinician and clinical faculty member should provide the patient a rationale for making this specific recommendation.

Email Consent Form (see appendix)

Patients may opt to provide authorization for our clinic to send email communication by reading and signing this form.

Policy on Medical Referrals

A patient referred to the Audiology Clinic by an otologist or other physician, shall return to the referring physician if further medical attention is indicated. A report of our findings will always be sent to the referring physician. It is generally preferable that an otologist provides the medical diagnosis and treatment for a disease of the ear, but the patient has a choice of physicians. If the audiometric findings indicate that a specialist in otolaryngology/otology should evaluate the patient and the referring physician is not in that specialty, this recommendation may be made verbally to the patient in a way suggested by the following paragraph:

*Our test results indicate that you have a type of hearing loss that may require medical treatment. Because hearing problems of this type sometimes require specialized treatment or diagnostic procedures, we recommend that you see an ear specialist. You may, however, want to discuss this with your family physician. S/he may have additional recommendations or may suggest a specialist for you.

*Note: This paragraph is provided as a model. Do not read aloud to the patient or memorize for presentation.

If the referral source is other than a physician, and a medical referral is indicated, the patient will be referred directly to an otolaryngologist. A printed sheet containing the names of all the physicians specializing in otology is available in the forms supply area. If a patient asks for the name of an ear specialist, this list may be given to him/her.

Audiology Clinic Forms

Case History Form (see appendix)

The case history form is typically mailed to patients and they bring the form with them to their first appointment.

The Audiology clinic utilizes three separate case history forms based on the age of the patient: Infant (0-6 months), Pediatric (6 months-18 years), and Adult (18+ years). It is the student clinician's responsibility to ascertain that all pertinent information is recorded and to obtain more information in areas that are necessary for a clearer understanding of the patient's condition.

Legal Forms (see appendix)

It is the student clinician's responsibility to ascertain that the patient or parent turns in a signed Legal Release and Request for Admission form, HIPAA acknowledgement form, and ABN form (if applicable) if needed (patient >65 years of age). The student clinician should sign as the witness on these forms if this has not already been completed.

Audiograms (see appendix)

An audiogram should be completed for every patient seen for an audiological assessment. The audiogram is sent to the referral source and to other consulting persons or agencies. Therefore, it **must** be completely readable and should leave no ambiguity as to results.

Word Recognition Lists

Word recognition lists are laminated in each sound booth test room. Each list clearly indicates the corresponding track number for the CD. If a hard copy (non-laminated form) is used, it should become a permanent part of the patient's record so that the nature of the speech perception errors is available for rehabilitation and counseling strategies.

Encounter Notes

Every contact made with the patient including telephone conversations should be documented. Chart notes should be made **immediately** following each appointment whenever possible so that important information is not omitted or forgotten. All telephone/personal consultations should be recorded and signed off by the student clinician and the clinical instructor.

The DO List:

- Make chart notes **immediately** following each appointment whenever possible so that important information is not omitted or forgotten.
- Document all patient contacts including walk-ins and telephone calls utilizing the appropriate encounter note within PNC
- Complete entry thoroughly including recommendations for continuity of care
- Use only acceptable abbreviations from the list provided

The DON'T List:

- Document subjective comments about patient: i.e. "patient is crazy"; instead quote the patient's words
- Place a name of a referral or contact person without adequately describing their function or relationship to the patient

Note: All entries must be brief and concise.

Audiologic Assessment Protocol

These are general guidelines and flexibility is the key in terms of individualizing the test procedures and sequences for each patient

Case History- Use age appropriate form- Infant (0 – 6 months), Pediatric (6 months – 18 years), or Adult (18+)

Reminder- if re-evaluation, an abbreviated or complete case history is required

Acoustic Immittance Measures - Tympanogram- obtained using positive to negative sweep

May use screening immittance bridge for children or screenings

Acoustic Reflex Thresholds (ART)-

Ipsilateral reflexes Pulsed obtained at 500, 1000 and 2000 Hz

Contralateral reflexes Steady obtained at 500, 1000 and 2000 Hz

If there is no response, record NR@__ (highest level at which you tested)

Reminder- if using screener, the reflexes are not thresholds, but are fixed presentation levels

Acoustic Reflex Decay- Test at 500 and 1000 Hz contralaterally at 10 dB SL re: ART for that frequency

Do not exceed 110 dB and be aware of patient discomfort

Speech Reception Thresholds (SRT)-

Begin at a comfortable listening level for the patient

Familiarize patient with spondees if needed

Utilize descending technique to obtain threshold

Response criterion is 50%, i.e., 3 of 6 or 2 of 4 spondees at same level is threshold

Mask if necessary, inter-aural attenuation for speech is 50 - 60 dB with insert earphones

If based on case history and immittance you feel there may be a functional component, use ascending technique and do not familiarize

Pure tone Air/Bone Conduction

Air Conduction- Descending technique starting at an audible level

Frequencies 1, 2, 3, 4, 6, 8 kHz, re-check 1kHz if needed, .5, and .25kHz

Test inter-octave frequencies (750, 1500 Hz) if there is a 20 dB or greater difference in threshold between octaves

Mask if necessary, inter-aural attenuation is 50 - 60 dB for air conduction (with inserts)

Bone Conduction- Descending technique starting 10-20 dB above air conduction threshold

Frequencies .25, .5, 1, 2, and 4kHz

Mask if necessary, inter-aural attenuation is 0 dB for bone conduction

(**NOTE:** When recording the masking level utilized in the non-test ear, record the starting and ending levels or the highest noise level at which the correct threshold was established.)

Word Recognition/Identification

Complete at an appropriate presentation level to obtain best possible score

If initial score is lower than expected, increase the presentation level, but be aware of UCL

Utilize CD for presentation of stimulus in most cases and note list used (e.g. ordered by difficulty 10, 25, 50)

Mask if necessary, inter-aural attenuation is 50 - 60 dB re: best BC threshold

Other Clinical Considerations:

Complete Most Comfortable Loudness (MCL), Uncomfortable Loudness Levels (UCL), Quick-SIN test etc. as needed

MASKING

Masking is one of the topics that beginning AuD students have to quickly understand the concepts as well as demonstrate the ability to apply these concepts in clinic. In order to facilitate understanding, ensure learning of concepts and implementation of masking in the clinic, we suggest that you focus on being able to answer the following questions for ANY patient that you see in the clinic.

1. Do you need to mask:
 - a. For air conduction audiometry?
 - b. For speech audiometry
 - i. SRT?
 - ii. WRS?
 - c. For bone conduction audiometry?
 - d. If the answer to all the above is NO, then also be able to answer:
 - i. Why not?
 - ii. What if you used supra aural headphones instead of insert earphones?
 - iii. What would you change on the audiogram such that you do need to mask?
2. If the answer to the above is YES:
 - a. Why do you need to mask?
 - b. What is the minimum masking level you would start with? Why?
 - c. At what noise level would you be in danger of overmasking?
3. Do you need to mask when bone conduction threshold is 10 dB poorer than the air conduction threshold?
4. Other:
 - a. Please discuss these questions with your clinical instructor and make sure you ask them any additional questions which you might have about masking concepts and clinical application.

Report Writing Procedures

Reports are all completed in the electronic health record; however, the individual case and the person receiving information determine the style, content, and length of a report. Individual clinical instructor's styles will also dictate the type and nature of reports to be completed. The following report writing categories are presented to serve as guidelines for report construction:

1. Audiology Report (see appendix): This report is a full and complete summary of all pertinent background information as well as a description of the audiological results obtained in the evaluation. It should be directed to the reader which may be the patient, a referral source, or an outside agency. It must include recommendations presented to the patient following the evaluation. The appropriate audiogram should be attached and can be accomplished by checking the box directing the reader to see the attached audiogram.

2. Hearing Aid Check/Tracking Note: This is made as a new entry in the hearing aid tracking flowsheet. Approved abbreviations should be utilized and the note should be thorough, yet concise. Include patient complaints/concerns, what was done in the appointment, and any recommendations that were made.

HIPAA

In order to comply with regulations from the Health Insurance Portability and Accountability Act of 1996 (HIPAA), the following procedures will be used for the transmission of patient reports and records that are NOT in PNC:

- All protected health information (PHI), including patient full name, address, date of birth, clinic number and telephone number, **must not be used** in the initial draft of the report, or the electronic transmission to clinical instructors and/or students.
- IF writing the report in a word document and emailing it to the supervisor rather than reporting directly in the electronic health record, the student clinician writes the report using the first letter of the first name and the first 1 letter of the last name (Jane Smith would be written: J. S.). Note: Use periods.
- Clinical instructor reads the report and edits via e-mail (if using word format) or via IM if using electronic health record
- Student clinician is responsible for getting paperwork to be scanned to the receptionist.
- The supervisor communicates with the front desk via PNC that the report is ready to be mailed to the recipients.
- The front desk receptionists will then print out the report and mail it.

Main Principles of Clinical Report Writing

The style of report may vary, but the importance of presenting information in an organized and thoughtful manner holds true no matter the format. Consider the following:

Report organization

- Paragraph 1 – answer the 5 “W” questions (who, what, when, where, why)
 - results of the tests (what we found)
 - impression (what we think)
 - recommendations
 - thank you (if appropriate) with solicitation of questions regarding results or recommendations
 - salutation and signatures, cc: to ...

Promptness

- Report to clinical instructor within 24 hours of seeing the patient
- Immediate chart notes
- Timely mailing of reports to referring parties, patient, family etc. (within one week)

Completeness

- Include complete audiogram, ABR waveforms etc.
- Must include conclusions and recommendations

Clarity

- The goal is communication of information

Get to the point
Emphasize what we found, not how
Keep terminology simple and understandable for non-audiologists
Gear each report to the recipient, i.e. different style of reports for patient vs. physicians
Use past tense
Be consistent with sentence structure (active vs. passive voice; present vs. past tense).
Write for the reader: ensure that you avoid audiologic jargon if the report is going to a lay person
Be specific regarding test results, but avoid speculation. The report is a medical record and needs to be accurate.
Follow up on recommendations, especially for pediatric patients. Document all follow up attempts in the folder.
Keep a record of all reports and correspondence.
Neatness and professional appearance of all paperwork is important.

Suggested Professional Vocabulary

Use professional vocabulary:

Determine instead of find
Performed instead of did
Exhibits/demonstrates instead of shows
Reported/indicated instead of said
Remember to reduce technical information on reports to non-audiologists.

Assessing Documentation and Report Writing

Accuracy and professionalism in documentation and report writing are critical aspects of clinical audiology practice. The following areas will be assessed after each weekly clinical session.

File complete and orderly

- Turn in all forms for scanning (copied if necessary so no tape is present on the form)

Completed audiogram and other test items

- Completed identifying information on **ALL** paperwork – (i.e., all paperwork has label containing name, date, age, etc.)
- Entered (circled) PTA, CD/MLV, audiometer, earphones, reliability, etc.
- Circled tympanogram type, entered values
- Wrote in DNT wherever appropriate
- Wrote an appropriate clinical impression (of hearing)
- Completed WRS forms accurately
- Included HA make, model serial number, and identifying information REM taped to sheet

Encounter note entries

- Summarize information without excessive detail
- Date
- Reason for visit (title)

- Presenting complaint
- Assessment
- Recommendations
- Payment or NC
- Initials

Time Management

- Turned in initial draft in 24 hours
- Turned in revision in 24 hours

Report

- Followed clinic format
- Did not have spelling or grammar errors or typos
- All details were accurate
- The report was readable (appropriate for the intended recipient)
- Included all (and only) relevant information
- Interpreted evaluation results accurately
- Made appropriate recommendations
- CC'd to appropriate persons as requested

Acceptable Abbreviations

Assessment terms:

- | | |
|--------------|-------------------------------------|
| • AA | Audiologic assessment |
| • Re-AA | Re-assessment |
| • SNHL | Sensorineural HL |
| • CHL | Conductive HL |
| • AC/BC | Air conduction/bone conduction |
| • OAE | Otoacoustic emissions |
| • ABR | Auditory brainstem response |
| • DPOAE | Distortion product OAE |
| • TEOAE | Transient OAE |
| • Tymps | Tympanograms |
| • RE/LE, R/L | Right ear/left ear |
| • ME | Middle ear |
| • HF/LF | High frequency/low frequency |
| • HL | Hearing loss |
| • OM | Otitis media |
| • Bil | Bilateral |
| • SNR | Signal to noise ratio |
| • UNHS | Universal newborn hearing screening |
| • NBHS | Newborn hearing screening |
| • NR | No response |
| • DNT (E) | Did not test (evaluate) |
| • CNT (E) | Could not test (evaluate) |

- VRA Visual reinforcement audiometry
- BOA Behavioral observation audiometry

Amplification terms:

- HA Hearing aid
- HAF Hearing aid fitting
- HAC Hearing aid check
- REM Real ear measurements
- HAR Hearing aid repair
- ITE In-the-ear
- BTE Behind-the-ear
- ITC In-the-canal
- CIC Completely-in-the-canal
- SAM Starkey All-Make Repair
- EMI Ear mold impression
- EM Ear mold
- EAC Electroacoustic check
- RITE Receiver-in-the-ear

General terms:

- TC/PC Telephone call
- Rec Recommendation
- Pt Patient
- w/o Without
- c/o Complained of
- w/ With
- ENT Ear, nose and throat physician
- Rec'd Received
- RTC Return to Clinic
- PRN As needed
- f/u Follow-up

Protocol for Re-assessment of Children and Adults with Hearing Aids

Case history update

1. Although not necessary to complete a new case history form, it is important to get information updates regarding the patient's hearing, hearing aids, general health and otologic history
2. Make sure new information is recorded in the patient chart

Assessment

1. Complete assessment protocol (see Audiology Clinic Handbook) as usual including all elements (otoscopy, immittance tests, pure tone and speech audiometry, OAE if indicated)

Hearing aid check during re-assessment appointments

1. Follow listening check protocol: sanitize hearing aids, perform listening check before you do anything, clean hearing aids as needed, change tubing if needed, perform electroacoustic check and/or listening check again
2. Perform probe microphone measurements to ensure appropriate benefit from the hearing aids; make adjustments as needed
3. Perform aided tests (functional gain with speech and tones) if desired
4. Counsel patient/parents as needed regarding outcome
5. Remind patient/parents that they may need a tubing change in 6 – 12 months
6. Document recommendations for follow-up in PNC and notify receptionists via IM

Follow-up appointments

1. For children, a hearing re-assessment is required **every year**
2. For adults it can be recommended every two years
3. If you see a child for a hearing aid check and it has been more than one year since their last hearing assessment, please schedule one. You can have parents contact GLASS (school SLP if the child receives services at school) so we get reimbursed for the assessment NOTE: Please refer them/schedule appointment with the audiologist who fit them with their hearing aids
4. For adults recommend a re-assessment if they have not had an assessment in more than two years

Reports

1. Reports are required to be written for all re-assessments

Pediatric Assessment Protocols

Infant assessment (0 – 5 months):

1. Case history
2. Otoscopy whenever possible:
 - a. Be aware of infant's movements; a cursory look will suffice
3. Tympanometry – 1000 Hz probe tone (See Table 1 for normative ranges)
4. ABR:
 - a. Biologic instructions for accessing the computer and basic start-up procedures can be found next to the equipment.
 - b. Preparation:
 - i. Single channel recording, with three electrodes (high forehead or vertex and each mastoid)
 - ii. Vertical ipsilateral recording

- iii. Impedances ≤ 7 kohms, and within 2 – 3 kohms of each other
 - c. Click, 31.1/sec, 60 or 80 dBnHL, alternating polarity, 2000 averages, 12 ms analysis window, 150K gain, 100 – 3000Hz filter settings
 - i. Monitor EEG activity from time to time to check on infant
 - ii. Note minimum number of averages for any response is 1000
 - iii. Monitor artifact rejection; change settings if needed (for example allow more rejections if baby appears to be quiet and you are still getting a number of rejections)
 - iv. Add Line filter if needed to decrease 60 Hz hum
 - v. Check in on infant often especially if not asleep or wiggly (check electrodes, impedance and inserts each time!)
 - d. 2000 Hz TB, 5ms duration, 31.1/sec, 60 or 80 dBnHL, alternating polarity, 2000 averages, 24 ms analysis window, 150K gain, 30 – 3000Hz filter settings
 - i. To improve morphology of responses try decreasing rate, increasing level, increasing number of averages, increasing high pass filter setting to 150 or 300 Hz to remove unwanted LF noise (if response appears to be riding on a LF sine wave)
 - ii. Decrease intensity in 10 – 20 dB steps to find threshold; 20 - 30 dBnHL is considered normal
 - iii. If no response at 20 dBnHL, increase to 25 and then 30 dBnHL
 - e. 500 Hz TB, 5ms duration, 31.1/sec, 60 or 80 dBnHL, alternating polarity, 2000 averages, 24 ms analysis window, 150K gain, 30 – 3000Hz filter settings
 - i. To improve morphology of responses try decreasing rate, increasing level, increasing number of averages, decreasing low pass filter setting to 2000 – 2500 Hz to remove unwanted HF noise
 - ii. Increase analysis window even further if needed
 - iii. Decrease intensity in 10 – 20 dB steps to find threshold; 40 dBnHL is considered normal
 - f. If time permits, try 4000 Hz TB with settings similar as for 2000 Hz
 - i. Preliminary responses at our Clinic from a few infants have been good with responses down to 20 dBnHL for both 2000 and 4000 Hz
- 5. OAE:
 - a. DPOAE: 2 – 6 kHz screening protocol or diagnostic test when possible
 - i. If no response, remove probe, check for occlusion, replace and repeat test
- 6. Recommendations:
 - a. Normal results:
 - i. Monitor for otitis media-counsel regarding high incidence
 - ii. Counsel regarding speech and language developmental milestones and provide written information to parents/guardians
 - b. Normal hearing with flat, negative pressure or wide tympanograms (tympanometric width > 235 daPa):
 - i. Physician consultation; hearing reassessment not necessary
 - ii. Monitor for worsening of any symptoms
 - iii. Counsel regarding effects of untreated or chronic OM
 - iv. Possibly return for tympanometry and OAE check in

- c. High risk infant (family history, congenital anomalies, syndromes, etc.) with normal results:
 - i. Retest in 6 – 12 months
 - ii. Annual evaluations until the age of 5
- d. Conductive hearing loss
 - i. Physician consultation
 - ii. Retest (consider OAE/behavioral assessment depending on age of infant)
 - 1. Schedule appointment in 6 – 8 weeks for tympanometry and OAE
 - 2. Normal results – no further recommendations
 - 3. Flat tympanograms – ENT consultation and appointment again in 6 – 8 weeks
 - 4. Normal tympanograms with absent OAE – schedule ABR, refer for sedated ABR or schedule VRA assessment based on age of child
- e. SNHL: Consider the following recommendations over several visits
 - i. ENT consultation for etiology and medical clearance
 - ii. Possible referral for a genetics workup and vision testing
 - iii. FS Parent Handbook to parents
 - iv. Refer child to First Steps for evaluation and intervention services
 - v. Refer to Center for Deaf and Hard of Hearing Education (CDHHE) for parent resources (parent guide, information)
 - vi. Complete DAE form online per state requirements
 - vii. Complete consent form for CDHHE
 - viii. Re-assessment to confirm the hearing loss / gain additional thresholds
 - ix. HA fitting
 - x. Communication options
 - xi. Referral for CI (if appropriate)

Pediatric assessment (6 – 36 months):

- 1. Case history
- 2. Otoscopy (at the start with co-operative children or at the end with fearful children when possible)
- 3. Immittance test (See Table 1 for normative ranges):
 - a. Tympanometry – 226 Hz probe tone (at the start with co-operative children and at the end with fearful children)
 - b. Ipsilateral reflex thresholds when possible at 1000 Hz
- 4. Choice of test strategy depends on developmental age of child
 - i. Most children in this age group will be assessed using VRA
 - ii. Very few (closer to age 3 and developing normally) may be conditioned for play audiometry
- 5. VRA: SDT in SF
 - a. Consider use of a high chair for child to be seated comfortably and reduce cues from parent
 - b. Start at 50 dB HL - watch for voluntary head turn and reinforce with toy and verbal praise
 - c. Watch VU meter and visual cues

- d. Conditioning trials: If child does not make a voluntary head turn, pair stimulus and reinforcer
 - i. NOTE: Make sure conditioning stimuli are audible to child (use louder stimuli to condition if needed)
 - e. Check for localization to speech
 - f. Decrease level quickly to 30 and then 15 dB HL
 - g. Increase in 5 dB steps if there is no response to find threshold
 - h. Use novel speech stimuli (child's name, "uh oh", "mamama", "dadada", "hi bear" etc.
 - i. Use stimuli at child's language level (usually single words)
 - i. Move on quickly to the next step – no more than 5 – 6 trials with speech
 - j. If child is closer to age 3, has a reasonable vocabulary, and co-operates try the spondee board or pointing to body parts
 - k. Switch to narrow bands of noise
 - i. Start at 500 or 2000 Hz
 - ii. Condition at an audible level (50 dB HL or louder if needed)
 - iii. Decrease level quickly to 30 and then 15 dB HL
 - iv. Increase in 5 dB steps if there is no response to find threshold
 - v. **Keep stimuli changing; no more than 2 – 3 presentations at the same frequency (i.e. jump around frequencies keeping in mind best response obtained at each so as to not repeat same levels again)**
 - vi. Obtain thresholds for 500 – 4000Hz
 - vii. **Don't spend too much time below 15dB**
 - 1. Note DNT below 15 dB HL or SDT \leq 15 dB HL
 - viii. Intersperse conditioning trials as needed to keep child on task
 - ix. OK to move from a 50 dB HL conditioning trial to a 15 dB HL trial (skip 30 dB HL)
 - l. If child is fussy or inattentive
 - i. Use waving hands/fingers, or small "not very interesting" finger puppet toys to center child
 - ii. Do not talk too much as this interferes with stimulus presentations
 - iii. Praise animatedly for correct head turn responses
 - iv. Direct child to the reinforcer if necessary
6. Play audiometry:
- a. Try only with children closer to age 3 and developing normally
 - b. The idea is to get the most information from the child as efficiently as possible (VRA or play); this is not a test of the student's skill level in teaching the task to the child!
 - c. Start with inserts if child co-operates; otherwise starting with SF is OK as some results are better than none (if child starts crying and does not stop when you attempt inserts)
 - d. Use SDT procedure above (e. viii)
 - e. Condition with dropping blocks in a bucket (this task is easier than pegs, puzzles etc. for this age group as the motor skills needed are lower)
 - i. Condition face to face making beeping sounds OR
 - ii. Condition with sounds from SF speakers

- iii. Do it together with child, and parent if necessary; move to child performing task on their own
 - iv. Be animated with praise, clap hands etc.
 - v. Move back quickly to VRA if child does not condition after about 6 trials
 - vi. Recruit parent to hand a block to child after each trial (so one person testing is possible)
- 7. OAE:
 - a. DPOAE: 2 – 6 kHz screening protocol or diagnostic test when possible
 - i. Perform OAE on every child for student training
 - ii. Student to know when OAE was an appropriate test and when they were doing it for training purposes
 - iii. Can do the test at no charge if only for student training purposes
- 8. Overall test procedure should NOT take more than one hour – if questionable or insufficient results are obtained – reschedule, as a tired child will not cooperate and the session will only deteriorate
- 9. Recommendations:
 - a. Normal results – monitor speech and language development, counsel regarding otitis media, follow therapy recommendations, retest in one year if not making adequate progress in speech/language development
 - b. Flat tympanograms with normal hearing – physician consultation, possible ENT referral; discussion of impact of minimal/fluctuating HL on speech and language development at this critical age; retest tympanograms if appropriate – at physician's office
 - c. Flat tympanograms with hearing loss – physician consultation with strong recommendation for ENT consult and retest of hearing; discuss impact of minimal/fluctuating HL on speech and language development at this critical age
 - d. Negative pressure or wide tympanograms (tympanometric width > 200 daPa) with normal hearing – monitor for worsening of symptoms; physician consultation if symptoms worsen
 - e. Negative pressure or wide tympanograms (tympanometric width > 200 daPa) with hearing loss - physician consultation, possible ENT referral; discussion of impact of minimal/fluctuating HL on speech and language development at this critical age; retest tympanograms if appropriate (mark additional test requests on RFA)SNHL – ENT consultation for etiology of HL and medical clearance for amplification, retest to confirm HL, preliminary discussion of need for hearing aids, alert FS re: identification of HL via phone call to OSC
 - i. Discuss hearing aids in more detail at second assessment
 - ii. EMI after medical clearance
 - iii. Fit with loaner hearing aids for 3 – 6 months from our stock or Riley Loaner HA Bank if desired
 - iv. Retest every 3 – 6 months until age 3 years
 - v. Personal HA fitting by age 2 1/2 years to ensure FS reimbursement
 - vi. Communication options
 - vii. Referral for CI (if appropriate)

Pediatric assessment (3 – 6 years):

1. Case history
2. Otoscopy (at the start with co-operative children or at the end with fearful children)
3. Immittance tests (See Table 1 for normative ranges):
 - a. Tympanometry – 226 Hz probe tone (at the start with co-operative children and at the end with fearful children)
 - b. Ipsilateral reflex thresholds
4. Choice of test strategy depends on developmental age of child
 - a. Most children in this age group will be assessed using play audiometry or standard audiometry
 - b. Use of play audiometry with an older child who seems immature will keep the child on task longer
 - c. More advanced play tasks such as peg board, legos, puzzles may be used when appropriate
 - d. Consider use of “fun” responses such as thumbs up, verbal responses like naming favorite things etc.
 - e. Follow procedures and recommendations above
 - i. **Switch between ears/frequencies to obtain some information for each ear**
 - ii. **Keep number of trials low – move on quickly**
 - f. Remember to praise often using the talk forward microphone – monitor level before using!
 - g. Use PBK if appropriate (or WIPI if speech intelligibility is a factor)

Pediatric assessment (> 6 years):

1. Standard adult procedures can be used for the most part unless child is immature, shy, fearful in which case consider play audiometry
2. Use hand raising rather than response button
3. Follow adult test protocol
4. Use PBK if appropriate (or WIPI if speech intelligibility is a factor)
5. Be aware of inconsistent responses in the teenage age range
6. If you suspect elevated thresholds:
 - a. Switch tasks immediately to SRT
 - b. Use ascending procedure
 - c. Vary levels inconsistently
 - d. Use different response format – Yes/No, count the beeps etc.
 - e. Re-instruct at low level or ask questions at low level
 - f. Do not waste time on behavioral tests that are inaccurate
 - g. Switch to OAE and complete immittance test battery including ipsilateral and contralateral reflex thresholds
 - h. If OAE are normal, tell child so and then try behavioral tests again with re-instruction
7. Counseling:
 - a. Do not blame the child for inconsistent responses

- b. Often easier to provide an “excuse” – for example, “you heard the words at the softest levels; the tones are harder, but let us try them again since you did so well with the words” etc.

Table 1: Tympanometry Normative Ranges

	<u>Ear canal volume</u> (ml)	<u>Static compliance</u> (ml)	<u>Middle ear pressure</u> (daPa)	<u>Tympanometric width</u> (daPa)
Pediatric	0.4 to 0.9	0.2 to 0.9	-150 to 50	60 to 150 (>200 considered abnormal)
Adult	0.5 to 1.5	0.3 to 1.6	-150 to 50	50 to 110 (>200 considered abnormal)
Infant (1 kHz tone)	~4 times ECV with 226 Hz	0.55 to 2.55 mmho	—	—

NOTE: These ranges represent 90% of the range of normal values. Always consider ALL test results and patient factors when interpreting these results and making recommendations.

Telehealth Protocol

In March 2020, COVID-19 forced the closure of Purdue University Audiology Clinic. The emerging telehealth service structure began and as of the date of this handbook (June 2020), the protocol is as follows:

- Front desk obtains email of patient and sends telehealth consent form via docusign for patient to complete
- Front desk schedules patient in PNC using the telehealth designation
- Front desk schedules patient via particular clinician’s restricted webex page and sends invite to patient, clinician, and student
- Front desk sends connection procedure information to patient
- Front desk calls the patient the day before the appointment to confirm appointment and troubleshoot the webex connection if necessary
- Clinician and student meet prior to the patient visit for planning
- Clinician and student see the patient and then after ending the session, clinician ‘checks in’ patient via PNC and note/discharge are completed

First Steps

First Steps (FS) is a state program for children from birth to three with any kind of developmental delays or disabilities. A brief overview of the program follows:

- Any concerned individual can contact FS to make a referral (it does not have to be a physician or medical provider).
- An **intake coordinator** gathers information about the child and schedules a visit to the family.
- In order to determine whether the child is eligible for FS services, an Eligibility Determination team (**ED Team**) consisting of at least two providers evaluates the child. The evaluation tool used is called the **AEPS** (Assessment, Evaluation and Programming System), and assesses the child in five domains which are: gross motor, fine motor, adaptive, cognition and social/communication. If a child exhibits specific delays (more than 2 SD in one domain, or more than 1.5 SD in two or more domains) they are eligible to receive services through FS. A child with a syndrome, craniofacial anomaly (e.g. cleft palate), hearing loss etc. is automatically eligible.
- Once eligibility is determined, an Individualized Family Service Plan (**IFSP**) is formulated for the child outlining the goals and services he/she will receive and a **service coordinator** is assigned to the child who assists the family with appointments, updates etc.
- FS promotes therapy services in the child's "natural environment" which may be the home, day care center, baby sitter's, playground etc.
- The local FS office is FS of Mid-North Indiana or Cluster D, and it covers Benton, Boone, Cass, Carroll, Clinton, Fountain, Howard, Montgomery, Tippecanoe, Warren, and White counties.

When we get a referral from FS, we receive a fax with the patient information, and sometimes the AEPS results and IFSP. We need the following information to be reimbursed for our services:

- An ICD-10 diagnosis code. **If there is no code on the paperwork, please call FS to get the code prior to the appointment.** The phone number for the local FS office is 420-1404.
- A Request for Authorization (RFA) for audiology services. Complete this form and fax it to First Steps (420-1406).

Lion's McKinney Hearing Aid Project

1. A Trustee makes a referral to our clinic through Jennifer Simpson (765) 494-0158, jsible@purdue.edu. A list of Trustees is attached.
2. The patient will be scheduled for a hearing test and eligibility will be listed as "Lions" in the system.
3. There is no charge for the hearing test.
4. If the patient needs hearing aids, the audiologist will order earmolds and BTE hearing aids.
 - a. Earmold procedures: The audiologist chooses a company and orders the earmold/s. The patient is responsible for this fee. If the patient cannot afford this charge, the audiologist can reach out to the Trustee and ask if there are funds to cover this expense.
 - b. Hearing aid procedures: 2 options
 - i. Rexton HA agreement has been suspended and may be replaced locally. As of July 2017, this option is in hold. Previous procedure included the following:
 1. The aids are \$200.00 per ear plus a shipping fee of \$20.00. Patients are responsible for these fees. Patients under 50 are encouraged to utilize this program. Sample order forms are in this binder.
 - ii. The Lions Loaner Bank housed at Riley Hospital for Children offers hearing aids for these patients. The audiologist provides the referring trustee with the audiogram. The trustee will send the audiogram, along with additional paperwork, to Becki Trepcos (administrator of loaner bank). She will select a hearing aid and mail it directly to Purdue. If the patient is under 55, the loan will be for 1 year. If the patient is over 55, the loan maybe indefinite.
5. The patient will be scheduled for a hearing aid fitting appointment.
6. The fitting fee is waived.
7. The charge for the earmold/s will be billed to the patient.
8. Follow up appointments are no charge.

Revised 6/20/19

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Greater Lafayette Area Special Services (GLASS)

- The local area has three school districts: West Lafayette Community Schools, Lafayette School Corporation (LSC) and Tippecanoe School Corporation (TSC). All three school districts as well as private schools (to some extent) are covered by GLASS and children with special needs may receive services through GLASS.
- Children are eligible for GLASS services beginning at age 3 (when they graduate from FS) and until they complete high school or turn 21 years of age (whichever comes first).
- Each school has an assigned speech-language pathologist who is responsible for coordinating hearing screenings at all the public schools. In Indiana, all children have a hearing screening in grades K, 1, 4, 7 and 10.
- Children who fail the hearing screening are referred for a comprehensive hearing assessment either to the Purdue Clinic or to IU Arnett Health (GLASS pays for this assessment).
- GLASS provides FM systems in the classroom as needed. Like the IFSP, a school-age child with special needs has an Individualized Education Plan (IEP) which outlines the services he/she will receive through GLASS.
- GLASS has a preschool program for children with special needs and also sometimes pays for students to attend the Purdue Language Preschool (PLP) Program.
- If we see a school-age child who needs services, we refer them to GLASS, either by having them call the GLASS office at 476-2900 or by calling their school to speak to the school speech-language pathologist.

Disability Determination Bureau (DDB)

The Disability Determination Bureau schedules audiological evaluations with our clinic. These evaluations are scheduled for 1 hour.

Procedures:

1. Paperwork associated with DDB will be in the orange binder in the audiology clinic file room. There will be a Request Letter, an Audiogram Testing Protocol and Report, and a State of Indiana Claim voucher at minimum in the paperwork. There may also be other health records pertinent to the case that you can review.
2. Complete the testing that is stated on the voucher.
3. Complete the Audiogram Testing Protocol and Report
4. Fax signed Voucher (cover page) and Audiogram Report to the number on the voucher within 24 hours of the appointment.
5. Complete the Bill. Only bill for what procedures were authorized.

There are no written reports to turn in. Students may write reports and file them.

Hear Now

Information can be found at:

[file:///C:/Users/MSSQL\\$AB/Downloads/Hear_Now_Program_Application.pdf](file:///C:/Users/MSSQL$AB/Downloads/Hear_Now_Program_Application.pdf)

Procedures:

1. Applicant must complete Hear Now application form (available online or at link above).
 - a. This is a financial based program
 - b. There is a \$125 processing fee for the application which is refunded if the applicant is denied
 - c. There is a 5 year timeline for reapplying for assistance and there is a possible 5 week processing time of applications
2. If applicant is approved and chooses us, we agree to:
 - a. Waive fitting fee
 - b. Waive follow-up HAC for first year
 - c. We CAN charge for the initial diagnostic evaluation
3. You will need to complete pages 8 and 9 of the Hear Now application
 - a. Only BTE or RIC hearing aids are options for you to choose
 - b. If an earmold is needed, the impression should be mailed to Starkey

Help America Hear Program

1. Complete the provider information that they will email you (just a ½ page with your name and address info). It can be faxed or emailed.
2. You will be sent the applicant's contact info, audiogram, medical clearance, signed HIPAA, order form, and current inventory of available hearing aids
3. Our clinic calls to schedule an appointment to make ear impressions and determine hearing aid order
4. Molds and aids are ordered on the same form that they provide you and are mailed to ReSound at:

ReSound
Attn: Aimee Chelmo
8001 Bloomington Freeway
Bloomington, MN 55420

5. Molds and Aids are sent to us; provider agrees to not charge applicant any fees for service for up to 5 visits not to exceed 1 year

HAAPI

Who is eligible?

Children with hearing loss are eligible for HAAPI, if all of the following are true:

- Ages 3-21
- A physician has provided medical clearance.
- They have not received funding from HAAPI in the previous 3 years.
- They do not have sufficient coverage through public or private insurance.

Hearing Aid Pricing:

There are a few hearing aids on the approved hearing aid list that, if selected, will result in an out-of-pocket cost to the family. These hearing aids are noted on the approved hearing aid list at Haapindiana.org/about/approved-hearing-aids. For families with no insurance coverage, choosing devices will result in some additional charges. Please discuss this with families prior to selecting a hearing aid model.

- Note: Pricing (when no insurance coverage exists) is subject to change as negotiations occur with the hearing aid manufacturers.

Up to \$1500 is available to cover the fitting fee (up to \$250), the aid, three-year warranty, pediatric care kit, and an earmold. They will cover an annual audiogram and annual earmolds for 3 years and verification is required as proof of this.

What we do:

1. Provide parent with application and information sheet.
 - Necessary Documentation needed:
 - Medical Clearance
 - Recent Audiogram (within last 12 months)
 - Proof of school enrollment or homeschool enrollment

- Written documentation of insurance denial or partial coverage for hearing aids
2. If child is approved, order hearing aid and earmold through HAAPI:
- Make sure you have the most recent copy of each form by checking the HAAPIndiana.org website.
 - Each hearing aid manufacturer is in the process of creating a hearing aid/earmold order form specifically for HAAPI. In the meantime, we are using temporary order forms to order the earmolds which are included in all hearing aid orders (when no insurance coverage exists).
 - All orders are placed by the audiologist fitting the patient
 - Families without insurance coverage for hearing aids:
 - Family applies and family is notified of approval by HAAPI
 - We will email you an approval letter and hearing aid/earmold order forms
 - Take earmold impressions and complete the hearing aid order form. The HAAPI account number will be prefilled on this order form, but you will need to add your billing address and your shipping address.
 - You must email or fax order form to HAAPI administrators for approval
 - After approval by HAAPI administrators, you will place the order for the hearing aid and earmold at the same time.
- **Participating audiologists will have 60 days from day we approve the hearing aid selection to fit the patient. If you cannot see a patient within sixty days, the hearing aid(s) will need to be returned to the manufacturer.
3. Bill HAAPI the approved amount (\$250) when hearing aid(s) are fit.

Submit Paperwork to: Hearing Aid Assistance Program of Indiana

Attention: Hear Indiana
4740 Kingsway Dr. Suite 33
Indianapolis, IN 46205
Phone: (317) 828-0211
Fax: 888-887-0932
Email: info@HAAPIndiana.org

More information:

- <https://www.haapindiana.org/>
- What do HAAPI funds cover?
 - Covers one or two hearing aids depending on what is most appropriate for the hearing loss, one earmold per hearing aid, a pediatric care kit, and initial fitting fee.
 - The Ponto bone anchored hearing aid (by Oticon Medical) has been added to the approved hearing aid list. Due to the high cost of this hearing aid, there will be a substantial out-of-pocket cost for families. However, the cost will be substantially lower than paying retail cost for the Ponto (when no insurance coverage exists).

IN Vocational Rehabilitation (VR)

Procedures:

IF we are referring the patient to VR:

1. Patient needs to sign a release of information to VR
2. Fax or mail audiology report and audiogram to VR, **making sure you complete the VR audiology form (available in the clinic) and required tests (WRS at 50dB HL and WRS in noise in SF)**
3. You will then receive a “Device Recommendation Form” which is more than 30 pages because it includes all possible makes and models of devices approved by VR
4. Select the devices you want to recommend for your patient (including accessories) and return to VR by mail or fax
5. You will then receive authorization for dispensing the devices (\$700 – binaural)
 - a. VR orders the devices and has them shipped to us
 - b. If an EM is needed or it is a custom device they send us an EM/custom form that we complete and send to the manufacturer
6. Schedule HAE once you receive the devices
7. Bill VR the approved dispensing fee at the HAE
 - a. Include copy of VR authorization with billing form to Tanya
8. Make sure patient signs the VR 30-day trial form

If VR is referring patient to us:

1. You will receive authorization for hearing assessment from VR
2. Complete assessment and fax or mail audiology report and audiogram to VR, **making sure you complete the VR audiology form (they usually send this or it is also available in the clinic) and required tests (WRS at 50dB HL and WRS in noise in SF)**
3. Bill VR for assessment
 - a. Include copy of VR authorization with billing form to Tanya
4. After this, follow steps 3-7 above

Audio/Video File Review

Each of you may have clinical sessions recorded each semester. The goals of recording clinical sessions and having you review them are to facilitate critical thinking and self-analysis. These skills will help foster independence in your clinical work. Here are some tips on what you can listen for and bring to the discussion with your clinical instructor:

1. Rate and volume of your speech
 - a. Could the patient understand you?
 - b. Did you alter the rate and volume based on patient's needs?
 - c. Did you rephrase if needed?
2. Use of fillers like "um", "uh", etc.
 - a. Was your use of fillers excessive?
 - b. Were there awkward and long silences during the session?
3. Case history questions
 - a. Were questions clear and open ended?
 - b. Did you ask appropriate follow-up questions?
 - c. Did you complete the case history efficiently?
4. Test instructions
 - a. Were your instructions clear and easy to understand/
 - b. Were they accurate and complete?
5. Counseling
 - a. Was your counseling clear and easy to understand?
 - b. Was it accurate and complete?
6. Responsiveness to patient's questions and comments
 - a. Were your responses appropriate?
 - b. Were your responses accurate?
 - c. Were your responses professional?

General Expectations in Clinic from ALL Clinical Instructors

1. Read patient's file ahead of time and know pertinent information in file
 - a. Name
 - b. Age
 - c. Referring agency if applicable
 - d. Reason for referral if available
 - e. Prior history if available
 - i. Degree, type and configuration of hearing loss
 - ii. Hearing aid information if applicable
 - iii. Details of most recent visit
2. Dress appropriately for clinic (See Audiology Clinic Dress Code) and address clinical instructors by last name (Mrs. Bell or Dr. Hertz for example)

3. Arrive at least 15 minutes prior to scheduled clinic time
 - a. Meet with clinical instructor in their office or clinic
 - b. Discuss patients scheduled for the day
 - c. Present your plan for each patient to your clinical instructor
4. For ALL patients
 - a. Introduce yourself (first and last name) as a graduate student and introduce your clinical instructor as the audiologist
 - b. Lead the way to the clinic and decide on which room you are going to take the patient in and where you are going to seat them
5. For assessments, follow the protocol in the Audiology Clinic handbook
 - a. Remember to use your “clinic voice” (slightly louder than normal, enunciating each word clearly and not running words together) for patients without hearing aids
 - b. Age appropriate case history form to be completed
 - i. Make additional notes on the form as needed
 - c. Otoscopy
 - i. May be omitted ONLY with fearful children or infants
 - d. Immittance evaluation (get familiar with all equipment in the clinic)
 - i. Tympanograms: on EVERY patient (except if post-op)
 - ii. Ipsilateral acoustic reflexes (500, 100 and 2000 Hz): on EVERY patient except with young children or infants
 - iii. Contralateral acoustic reflexes (500, 100 and 2000 Hz): on ALL adult patients
 - iv. Reflex decay test (500 and 1000 Hz): on ALL adult patients when possible (EXCEPT if reflexes are absent, reflex thresholds are greater than 95 dB or patient complains of discomfort)
 - e. Pure tone audiometry
 - i. Air and bone conduction tests on ALL patients except young children and infants
 - ii. Appropriate masking whenever necessary (>10 dB air-bone gap)
 - iii. Keep monitor low so that beeps are not heard through the wall of single-walled booths (e.g. at ENT facility)
 - f. Speech audiometry
 - i. SRT/SDT on ALL patients
 1. Important for procedure to be efficient
 2. Appropriate masking whenever necessary
 - ii. WRS on ALL patients over 5 years old when possible
 1. Recorded lists whenever possible for direct comparisons
 2. Live voice ONLY when necessary (e.g. child)
 3. Presentation level based on comfort – loudest level that patient will tolerate
 4. Appropriate masking whenever necessary – clinical instructors will ask questions regarding need to mask, sufficient/minimum masking levels as well as overmasking levels in every case
 - iii. Keep voice soft and increase “MIC” level so as not to be heard through the walls of single-walled booths (e.g. at ENT facility)
 - g. MCL/UCL
 - i. Speech and /or tonal MCL and UCL – when suggested by clinical instructor
 - h. OAE
 - i. On EVERY child when possible
 - i. Other

- i. Quick-SIN – when possible
 - ii. HINT, SCAN etc. - when suggested by clinical instructor
- j. Counseling
 - i. Explain test results by summarizing: you do NOT have to talk about each test separately
 - ii. Avoid audiologic terminology including numbers like 20 or 25 dB
 - iii. Make counseling meaningful for the patient and tie it in with their presenting complaints
- 6. For re-assessments on patients who already have hearing aids
 - a. After above assessment, clean and check (listening and/or electroacoustic) hearing aids
 - b. If hearing aids are functioning appropriately, perform verification measurement (usually probe microphone measurements) to ensure appropriate benefit and make appropriate recommendations
 - c. Remember to use “clinic voice TWO” (not as loud as voice ONE) for after hearing aid fitting
- 7. For hearing aid appointments
 - a. Preparation
 - i. Have HA(s) preprogrammed, read information booklets and have HA AGREEMENT FORM COMPLETED ahead of time (NOT the day of the appointment). Seek assistance from clinical instructor if needed
 - ii. Have HA(s) connected to computer with cables and ready with all supplies (batteries, booklets, etc.) for HAE
 - b. Procedures
 - i. Perform verification measurements (probe microphone measurements) to ensure appropriate benefit (note that we have several different pieces of equipment – get familiar with them ALL)
 - ii. Ensure (via conversation) that hearing aids are appropriate for patient
 - iii. Counsel patient and family regarding hearing aids, communication strategies etc.
- 8. Post-session
 - a. Discuss the day’s session with clinical instructor (do NOT schedule other appointments immediately after clinic session, so as to allow time for this)
 - b. Reflect on the session to develop your own critical thinking skills in addition to obtaining feedback from clinical instructor
 - c. Clinical instructors will attempt to ask questions in addition to providing solutions (e.g. you instructed patient by saying “press the button when you hear the tone”; is there anything else you would add to your instructions?)
 - d. Clinical instructors will make detailed observation notes of the session in order to be able to facilitate such discussion (need to be able to recreate what student said or did - e.g. patient said “ouch” when you were performing tympanometry and you continued with the test without responding; what else could you have done? - in order to do this – the more detailed notes the better)
 - e. Ask questions / clarify / take notes to ensure your understanding of the discussion during the meeting
 - f. Implement the feedback provided in the next clinical session
- 9. Documentation: ALL paperwork MUST be complete and submitted within 24 hours after appointment
 - a. Audiogram

- i. Name, Date, Age, Gender, Clinic #, Student name at top
- ii. Clinical instructor will SIGN audiogram (do NOT write in their name)
- iii. PTA
- iv. SRT (or DNT if appropriate)
 - v. Masking levels (start and end or just ending level)
- vi. WRS score (%), presentation level, masking level and list used
- vii. CD, TAPE or MLV circled
- viii. Audiometer
- ix. Earphones used (ER3-A, TDH-50, SF etc., NOT “inserts”)
- x. Reliability (circled), Technique (circled)
- xi. Correct audiometric symbols on audiogram connected together
- xii. Tympanogram type (circled)
 1. Static compliance
 2. Middle ear pressure
 3. Volume
 4. Tympanometric width (gradient)
- xiii. Acoustic reflex thresholds
 1. Entered in the CORRECT boxes
- xiv. DNT wherever appropriate (reflexes, WRS etc.)
- xv. Comments when appropriate (examples below)
 1. Did not test at levels softer than 15 dB
 2. Aided binaurally with Phonak Valeo ITE hearing aids etc.
- xvi. Clinical impression
 1. One to two sentences summarizing the outcome of the appointment
- xvii. Immitance printouts
 1. Tape to blank sheet of paper; keep L and R ear printouts together and tape such that it is possible to copy and send to physician if necessary
 2. Include patient name, clinic # and date
- xviii. WRS lists
 1. Name, audiologist, date, AND check one each of LV or recorded, HL or SL, Phones or SF, aided or unaided etc.
- xix. HA EA checks/REM printouts
 1. Patient name, clinic #, date and HA make, model and serial #) etc. on ALL such sheets in patient file

10. Reports: Read Audiology Clinic Handbook and follow guidelines/samples

- i. Use formats from Handbook for consistency
- ii. Cc: as appropriate – it is YOUR responsibility to remember to do this. For physicians, use John Doe, MD (not Dr. Doe)
- iii. Use past tense and passive voice throughout the report
- iv. Keep grammar consistent throughout report (E.g. Do NOT follow “Mr. Smith reported.....” with “No other history.....”, but rather with “He did not report any.....”)
- v. Proofread / re-read ALL paperwork before turning it in to your clinical instructor. Grammar, spelling and punctuation errors are NOT acceptable.
- vi. Report content
 1. History:
 - a. Include ALL relevant information
 - b. Include ONLY relevant information
 - c. Report information in a logical sequence

2. Evaluation:
 - a. Use either bullet phrases or complete sentences, but not both in one report
 - b. Report results obtained
 - c. Explain what results mean (interpretation)
 - d. Write for the reader: decrease audiologic jargon as much as possible in reports that will be sent to patients, First Steps providers etc. Use audiology terms ONLY on reports to other audiologists or ENT physicians
 - e. Normal tympanograms DO NOT always imply normal middle ear function, but rather normal eardrum mobility
 - f. Normal acoustic reflex thresholds DO indicate normal middle ear function
3. Recommendations:
 - a. Include ALL recommendations discussed
 - b. Include them in a logical sequence
 - c. Make recommendations as meaningful for the patient as possible

Hearing Aid Procedures

After evaluating the hearing sensitivity of a patient and talking with the patient and his/her family, the student clinician may recommend amplification to aid in communication improvement. It is critical that the student clinician work with the patient to find an amplification device that will best fit the patient's communication needs. Currently the clinic offers several hearing aid brands, and it is recommended that each student clinician become familiar with as many products as possible in order to increase his/her breadth of hearing aid fitting knowledge.

Scheduling Procedure for Further Evaluation

Scheduling for follow-up hearing aid evaluations is normally completed at the end of the audiologic assessment. Appointments for hearing aid fittings should be made approximately three weeks after the assessment. The patient should receive a completed appointment card. There must always be a clinical instructor available when a patient is scheduled for an appointment.

Hearing Aid/Earmold Orders

When a hearing aid or earmold is ordered from the manufacturer the following procedures should be implemented:

A. Hearing aid procedure

1. For in-the-ear hearing aids, first complete a hearing aid order form (available in the forms area in the clinic or online). Package the impression(s) and hearing aid order form in the correct manufacturer box or scan and complete order online. (Ensure a copy of the order form is scanned to the patient's electronic health record). Put the impression box with the order form in the bin located in the Audiology Assistant's Office.

2. For behind-the-ear hearing aids, call the manufacturer to place the order or place order online (have manufacturer account number handy and make sure you request the appropriate color choice). Note that the order was placed in the electronic health record.

3. You will be notified when the hearing aid or other accessory has been received when the Audiology Assistant messages you through PNC. The hearing aid, earmold or accessories will be found in the clinical instructors' drawers in the Audiology Clinic Workroom.

B. Earmold Procedure

1. Fill out an earmold order form. The yellow copy of the form should be scanned into the patient's file. Place the white form in the manufacturer box with the impression. Place the box in the bin in the Audiology Assistant's Office.

2. When the earmold is received from the laboratory, the Audiology Assistant will note this in PNC and put the earmold in the clinical instructors' drawer in the Audiology Clinic Workroom.

Hearing Aid Fitting

1. Check the clinical instructor's drawer several days before the day of the Hearing aid fitting appointment or to ensure that the hearing aid or earmold has been received from the manufacturer. Make sure that you perform a listening and electroacoustic check on the hearing aid(s) and pre-program all programmable and digital hearing aids prior to the patient's appointment date. **Seek out your clinical instructor for assistance with this if needed.**

2. On the day of the hearing aid fitting, the patient should either turn in a completed medical examination form or sign the medical waiver form. This needs to be completed before the hearing aid is dispensed. (Note: Children under the age of 18 are required to have a completed medical examination form and cannot sign a medical waiver)

3. Perform appropriate benefit/verification measures during the HA fitting and counsel the patient regarding the use and care of the hearing aid(s).

4. Have the patient sign the Hearing Aid Agreement form (see appendix) which you should fill out prior to the appointment. The form acknowledges receipt of the hearing aid and the patient keeps a copy. It should also be scanned into PNC. It includes information regarding the trial evaluation, medical waiver and battery warning information.

5. Complete charges for the services provided to the patient (HA fitting fee, earmolds and the cost of the hearing aids). The patient will pay 50% of the cost of the hearing aids at the fitting appointment.

6. Schedule a follow up appointment in approximately two weeks for a hearing aid check (HAC).

Hearing Aid Check (HAC)

At the time of the HAC there will be three options, as listed below:

1. Patient may require more time than the usual two – three week trial period:

Note information in PNC and reschedule patient for further HAC. Complete charge slip and extend the trial date of the hearing aid if necessary.

2. Patient may return the hearing aid and the student clinician will send it back to the manufacturer for credit. All returns for credit are to be done via the Audiology Assistants.

3. Patient may decide to purchase the hearing aid(s):

For Option 1 above

Each student clinician is responsible for checking the trial expiration date for his/her patient's hearing aid(s). If a trial date needs to be extended, (e.g., patient needs more time to evaluate the hearing aid) call the manufacturer and request that the trial period be extended. Write the new due date in PNC. Always check to see if due dates need to be extended over any breaks or at the end of the semester.

For Option 2 above

Use the following procedure when you desire to return a hearing aid to the manufacturer for credit:

- a. Prepare the hearing aid for mailing by placing the hearing aid in the mailing box. Place the appropriate mailing label (with street address of manufacturer) on the box.
- b. Facilitate the process of refunding the patient the cost of the hearing aid/s. Escort them to the front desk and the secretaries will refund their money. **NOTE: Earmolds are non-refundable.**

For Option 3 above

- a. Give the patient the following:
 - Any supplies not given at the HAE
 - Warranty expiration information
- b. Pt will pay second 50% cost of the hearing aids
 - Extra batteries if purchased
 - Accessories if purchased
- c. Make sure that you update/correct warranty expiration dates. You may make a telephone call to the manufacturer to start the warranty date from the date the hearing aids were dispensed.

Procedures for Loaner Hearing Aids

- A. When it has been determined that a patient is in need of a loaner hearing aid for temporary use, the following procedures should be implemented:
 1. Select an appropriate hearing aid from the loaner hearing aid supply cabinet.
 2. Make an entry in the Loaner Hearing Aid sign out sheet.
 3. Have patient sign the loaner hearing aid agreement form (see appendix) and place

it in loaner hanging folder until the aid has been returned.

- B. When the hearing aid is ready for return to the loaner stock, the following procedures should be implemented:
1. Assure that the hearing aid is in good working order (listening check **AND** electroacoustic analysis). Complete electroacoustic analysis and place print out, with current date recorded, in the plastic drawer with loaner hearing aid.
 2. Mark the hearing aid as “returned” in the Loaner Hearing Aid sign out sheet.

Procedures for Hearing Aid Repairs

When it is determined that a hearing aid needs to be returned to the manufacturer for repair, the student clinician should complete the following:

1. Perform a listening check and electroacoustic evaluation of the hearing aid and confer with the clinical instructor to discuss the results of these analyses.
2. Determine if the hearing aid is under new aid or service warranty.
3. If it is decided that the hearing aid should be returned for repair, the student clinician should complete the appropriate manufacturer's repair form and have it approved by the clinical instructor. If the hearing aid is >5 years old, call the manufacturer regarding cost and availability of 12 month warranty or send to Starkey All-Make repair lab.
4. The original form is enclosed with the hearing aid to be sent to the repair facility (manufacturer or repair lab). Include the name and phone number of the **clinical instructor** on the repair form so s/he can be contacted if there are questions.
5. Include the following information on the repair form:
 - a. patient name
 - b. the hearing aid problem
 - c. whether the hearing aid is under warranty

If not under warranty, note the length of warranty requested, clinical instructor's name and clinic phone number for contact information, and Purdue University account # and PO#

6. Scan the repair form into PNC in the patient's chart.
7. Package hearing aid using mailing labels with street address
8. Place the packaged hearing aid in the bin in the Clinical Assistant's office.

When the repaired hearing aid is returned to Purdue, the following procedures will be implemented:

1. The Audiology Assistant will:

- a. Notify the student clinician and clinical instructor
 - b. Place the returned aid in the clinical instructor's drawer
2. The student clinician should then:
 - a. Perform a listening check and electroacoustic evaluation of the returned hearing aid.
 - b. If the returned aid is not functioning properly, the student clinician should confer with the clinical instructor about the appropriate course of action.
 - c. If the aid is functioning properly, it is the responsibility of the student clinician to schedule an appointment for returning the aid to the patient as soon as possible (if an appointment has not already been scheduled).
3. If there is a new repair warranty on the hearing aid, the student clinician should ensure the new warranty expiration date is updated in PNC.

Aural Rehabilitation Programs

Aural rehabilitation programs are offered by the Purdue University Audiology Clinic as part of a complete rehabilitation program for hearing impaired children and adults. Graduate students enrolled in clinical practice in audiology are involved in the administration of these services.

Individualized Aural Rehabilitation Programs

Individualized aural rehabilitation programs are available to hearing impaired children or adults. These services are provided in conjunction with the Speech-Language Clinic. The activities provided in the sessions are guided by the types of communication difficulties the individual is experiencing. AuD students may have the opportunity to participate in this if interested.

Rehabilitative Auditory Communication Training (ReACT) Program

The philosophy of the Audiology Clinic's adult aural rehabilitation program is to focus on communication function as it relates to patient needs and expectations. The amplification device is of great importance in this process. However, of equal importance is the patient who wears this device. It is necessary for the patient and his/her family to understand hearing loss and the role of hearing aids in helping to facilitate communication in different settings. As a result, a two to three-week program in communication skills **may** be available as part of the hearing aid selection process. Check with your clinical instructor regarding availability of this program for your patients.

Purdue Hearing Conservation Program

SLHS in conjunction with Radiological and Environmental Management (REM) Occupational Safety and Health Administration Hearing Testing Protocol for Purdue Employees

Approximately 300 Purdue employees are exposed to hazardous levels of noise exposure on the job. Employees are seen for baseline testing, annual HCP testing, 30-day retesting, and hearing conservation training. Other services include custom hearing protection, verification of hearing protection devices (HPD) and educational counseling. HCP clinic will typically be conducted on Friday mornings from 8:00 - 11:00 AM including HCP discussion 11:00 – 11:30 AM. Each semester there MAY also be HCP clinic scheduled on possibly 2-3 Thursday afternoons from 4:00 – 6:00 PM to accommodate 2nd shift employees who are scheduled to work 6:00 PM to 6:00 AM.

- A. REM in conjunction with the HCP monitors noisy areas in question within the Purdue University work place and/or the employees are monitored with a dosimeter for eight hours.
- B. If noise standards are exceeded, the employee is referred to the Audiology Clinic for an audiometric baseline test and counseling. If the noise level is above 90 dBA, the employee is required to wear hearing protection. If the level is 85-90 dBA, hearing protection is offered but not mandatory.
- C. REM contacts the employee's departmental supervisor to schedule an HCP baseline test, and is reminded to ask the employee to observe a 14-hour quiet period immediately before testing. (This can take the form of hearing protection worn at work for annual and 30-day recheck assessments only.) The Audiology Clinic Front Desk staff is scheduling the employees. Employees are also encouraged to seek medical consult prior to audiometric testing if excessive cerumen was previously reported. If employees have known illness on the day of testing (allergies, congestion, ear infection, etc.) which may impact audiometric test results, they are encouraged to contact the Audiology Clinic directly to have the HCP hearing test appointment rescheduled. A copy of the HCP clinic schedule will be provided to the Audiology Clinic reception staff and employee files will be placed in the HCP Friday drawer in the main office.
- D. Forms that must be completed are listed below:
 - 1. Purdue University/Radiological and Environmental Management (REM) Audiometric Testing Program form (see appendix)

Test pure tone thresholds for 500 – 8000Hz, including 3000 and 6000 Hz for both ears. Any significant threshold shift or STS (greater or equal to 10 dB average change at 2000, 3000 and 4000Hz) compared to the baseline test should be noted on the form. The pure tone average of thresholds at 2000, 3000 & 4000Hz should be recorded for each ear.
 - 2. REM Hearing Conservation Program form (see appendix)

Student Clinician must fill the form out completely, even when hearing protection is not necessary, and both the employee and audiologist must sign the form. Give the white (original) of this form to the employee; keep pink copy in employee SLHS paper chart; yellow and golden rod copies are sent to REM attn: Jennifer Kraus (REM- Environmental Technician)
 - 3. Billing Statement

The student will complete HCP appointment documentation in Point and Click (PNC) EMR including billing. Use “Pure Tone Audiometry (Threshold) Air Only” - CPT 92552 for Charge Slip Form. Student clinician will sign the encounter. The supervising clinical audiologist will “discharge” the encounter the same day and sign the encounter when any necessary scanned documents (if applicable) are attached to the PNC encounter note. Use “ENCOUNTER FOR HEARING CONSERVATION AND TREATMENT” - ICD-10 Code Z01.12 for diagnosis. Every effort will be made on Friday morning to reach the employee and their supervisor when employees are at least 10 minutes late for their scheduled appointment. REM is notified the employee was not seen for their hearing assessment and the appointment will be rescheduled via the SLHS Audiology Clinic.

4. Case history form for baseline evaluations

5. HPD verification form if needed

The student will complete HCP appointment documentation in Point and Click (PNC) EMR including billing. Use circumaural Radioear DD450 headphones in Booth #2 (AudioStar Pro) or Sennheiser HDA200 Dynamic headphones in Booth #3 (AudioStar Pro) to complete personal attenuation ratings (PAR) per the Excel program protocol. Students will have access to a “working copy” of the 2015 Personal Attenuation Rating Excel file. This worksheet is located on the desktop all six (6) audiology clinic computers. Students will use this file to efficiently and accurately calculate the personal mean attenuation rating (PAR) provided by the employee’s hearing protection device. Use CPT code 92596 to bill for Ear Protector Attenuation Measurement (Real Ear at Threshold Method - REAT).

6. Age correction calculation form/worksheet; See Age Correction Excel file

Students will have access to a “working copy” of the 2015 OSHA Age Correction Excel file. This worksheet is located on the desktop all six (6) audiology clinic computers. Students will use this file to efficiently and accurately factor out age-related hearing changes when a standard threshold shift (STS) is suspected at the time of the employee’s annual hearing test.

7. Update HIPPA and Release of Information forms

8. Include ROCC (Regional Occupational Care Center) on Release of Information forms

9. Form 89 Request for Occupational Health Services at ROCC (Regional Occupational Care Center) if needed

Point and Click (PNC) Documentation - Hearing Conservation Visit Note Details:

- **Department:** Enter employee department

- **Hearing Thresholds: DO NOT “check” See Attached Audiogram.** HCP audiometric test forms are no longer being scanned in PNC as information is documented in the employee’s paper chart and HearTrak database.

Use this section to write the following chart note:

“SEE AUDIOMETRIC RESULTS IN HCP PAPER CHART and HearTrak Database for additional information and recommendations.”

- **Test Performed:** Select appropriate test conducted:

Annual/Baseline/30-day Recheck/Assessment/HPD verification

- **Plan:** select “I certify that the employee has been provided HCP annual training and has been offered the opportunity to ask questions”

- **Verification of Hearing Protection Device** (if applicable):

Use Ear Protector Attenuation Measurement form Excel sheet;

Use Real Ear at Threshold Method: CPT code 92596

- **Follow-up:** Routinely choose “HEARING CONSERVATION - ANNUAL AUDIOGRAM” and/or other applicable appropriate options including: 30-Day Retest, ROCC Referral, Medical Management, Audiological Assessment

- **Recommendations:** Routinely choose “Continue to utilize hearing protection” and/or other applicable appropriate options including: Revise baseline audiogram; Assess HPD

efficacy; Dispense hearing protection; complete Ear Protector Attenuation Measurement (Real Ear at Threshold Method CPT: 92596) when applicable

- **Check Box:** Copy sent to employee & REM

- **ICD-10/CPT Codes:**

Diagnosis: Use Z01.12 Encounter for hearing conservation and treatment

Charge Slip Form: Select Pure Tone Audiometry (Threshold) Air Only (92552)

Other new diagnosis codes have been added to the EMR including:

- Z01.1 Encounter for examination of ears and hearing
- Z01.10 Encounter for examination of ears and hearing without abnormal findings
- Z01.11 Encounter for examination of ears and hearing with abnormal findings
- Z01.110 Encounter for hearing examination following failed hearing screen
- Z01.118 Encounter for examination of ears and hearing with other abnormal findings
- Z01.12 Encounter for hearing conservation and treatment

- **Graduate Clinician:** Sign encounter; **please do NOT send IM for chart review**

Paper Chart - Hearing Conservation Visit Note Details:

- **Complete brief LEGIBLE hand-written chart note in the employee's paper HCP file**

- Be sure to include the following information:

- DOS
- Type of Test: Annual/Baseline/30-day Recheck/HPD Verification
- Relevant case history or changes in medical history
- Change in job title/duties if applicable
- Otoscopy results
- Explain results - describe audiogram thresholds (i.e. normal hearing sensitivity for both ears)
- Tympanometry results if completed
- Clinical impression - Sample language: "No change noted compared to baseline after age corrections applied" or "Recordable STS noted in RE after age corrections"
- Recommendations - Sample language: "Continue to consistently use HPD both on and off the job and return for annual HCP hearing assessment".
IF STS noted describe next steps which includes 30 day-Recheck appointment. **IF STS confirmed** on 30-day retest describe next steps for ROCC Referral for review and Form 89 completed.

- Complete HCP Contact Page information including clinic HCP Number (i.e. 18-HCP), DOB, Date of Hire (DOH if known) and supervisor (if known)
- Sign chart note using student initials. Do NOT leave space between chart notes and ensure there is no blank space after student/supervisor sign paper chart note and end of line.

Sample annual HCP chart note

1/20/28 Annual: No change in job title or medical history since last HCP assessment. Otoscopy revealed significant non-occluding cerumen in both ears. Tympanograms normal for both ears. Normal hearing sensitivity in both ears. Note 4-year gap in testing. No change compared to baseline for both ears following age corrections. Recommend continued use of HPD both on and off job and return for annual HCP hearing assessment. Billed REM \$47.00. AM/Sommer

Typical HCP Clinic Student Work Flow

- Generally FOUR (4) or more students are assigned to HCP clinic
- All students will be responsible for opening the clinic at 8:00 AM on Friday mornings including completion of daily listening & biological calibration checks of audiometers for all sound booths. See Biological Calibration Data notebook in AA office for additional information.
- Students set up consult rooms with educational materials including but not limited to: HCP training video, NASA JeopEARdy HPC educational game, NIOSH “Inquiring Ears Want to Know”, Sight and Hearing Association Noise Thermometer Graph, Dangerous Decibels OHC damage photos and foam EAR plugs for proper insertion demonstration.
- Generally four (4) students will be testing in sound booths – calculating age corrections when needed, completing paperwork – AND One (1) student rotates through HearTrak data entry station each week, ensures employees have completed HIPPA/case history forms, obtains PNC labels for case history forms, re-launch JeopEARdy &/or HCP training video when needed, frequently checks LYLE 2168 to ensure all employees have checked in and been seen.
- Employees MUST sign in at Audiology Clinic reception desk and noted arrival in PNC.
- Employees follow signage in Lyles- Porter Hall to Room LYLE 2168 to wait for hearing testing; complete case history, HIPPA, Limited Email Communication, ROCC forms if needed.
- Be sure ALL necessary forms are filled out completely including DOB, signed by employee, witness signature and offer patient copy in order to check off “patient declined” before placing documents in a folder for scanning. Include REM and ROCC on signed release of information form.

- h. Be familiar with patient history: Review previous pink REM HCP form in paper chart, last paper chart note, and audiogram. Please note if MASKING was previously needed.
- i. Review Case History (Baseline) / Update case history (Annual)
 - i. Change in medical history?
 - ii. Change in job title?
 - iii. Most recent exposure to noise? (employee MUST be out of noise 14 hours prior to baseline hearing test; employee ideally should be out of noise 14 hours prior to hearing test, however can test if employee wore HPD instead) AND if not out of noise 14+ hours ask:
 - iv. Did use hearing protection prior to the hearing test?
 - v. What type? Plugs (P), Muffs (M), Custom (C), Cap (CA)
 - vi. Any other otologic symptoms? Tinnitus? Ear pain? Ear drainage? Cerumen? Dizziness? Fluctuating HL?
 - vii. Any recent illness? Allergy? Cold?
 - viii. Smoking history?
- j. Follow audiology clinic infection control procedures
- k. Otoscopy
- l. Tympanometry as needed – based on employee complaints or symptoms (cold, allergies etc), confirm cerumen is not impacted. No charge.
- m. Patient should be seated at 90 degree angle (or 180 degree angle per NIOSH best practice) to the booth window to prevent inadvertent visual cuing per the Council for Accreditation in Occupational Hearing Conservation (CAOHC).
- n. Consistent instructions are IMPORTANT even if the employee has received a hearing test EVERY YEAR!! For HCP, it must be stressed to employees we want results to reflect their “best” hearing possible.
- o. For HCP baseline tests, the student clinician will thoroughly review the HCP case history form with the employee and conduct test pure tone thresholds for 500 – 8000Hz, including 3000 and 6000 Hz for both ears. The pure tone average of thresholds at 2000, 3000 & 4000Hz should be recorded for each ear and serve as the baseline OSHA PTA for future comparison with annual hearing tests. The charge for the baseline test should be billed to REM via PNC.
- p. For HCP annual tests, if there is a significant change (greater or equal to 10dB average change for the frequencies 2, 3 and 4kHz) between the baseline OSHA PTA and the annual test OSHA PTA, the HCP Calculation and Application of Age Correction to Audiogram form (see appendix) may be used. This form may help determine whether to recommend a retest, complete assessment or an annual test. The audiologist will counsel the employee as to possible changes in type of hearing protection needed. The charge for the annual test should be billed to REM via PNC.
- q. Use “working copy” of Age Correction Calculation Excel file located on each consult room computer desktop and audiology work room computer desktop (see icon). Fill in ALL required fields; complete calculation; print copy of form in Audiology Lab (LYLE 2170) to be placed in paper chart under HCP Audiogram form.

- r. If the audiologist identifies a hearing impairment requiring further assessment, the employee should be advised to schedule a comprehensive audiological assessment (AA). The student clinician should report this in the Comments Section of the REM Hearing Conservation form. The student clinician is responsible for having his/her clinical instructor sign the REM Hearing Conservation form.
- s. If the audiologist identifies a recordable OR non-recordable significant threshold shift (STS) after age corrections have been applied, the employee is scheduled for a 30-day recheck. The student clinician will escort the employee to the Audiology Clinic reception desk and schedule the 30-day recheck appointment in approximately 3 weeks during a Friday morning HCP clinic.
- t. If the audiologists CONFIRMS a recordable (or non-recordable) significant threshold shift (STS) after age corrections have been applied at the 30-day recheck appointment, a Form 89 is completed requesting Occupational Health Services at the Regional Occupational Care Center (ROCC) attention Patty Scheetz, RN or Jamie Kondelis MD. The purpose of this referral is to determine if the STS is “work related” requiring a HPD change, re-assignment to a quieter area, or the possible need for medical consultation. The supervising audiologist completes the form stating identification of a “possible STS and determine work-relatedness” as reason for referral and signs as the authorized requesting individual. The completed Form 89; audiometric test results including case history is faxed to ROCC for further review. The student clinician makes two (2) copies of the completed Form 89 – the first copy is placed in the employee’s paper HCP file; the second copy is sent to REM for their records noting a referral to ROCC has been requested. The student clinician will also complete a Release of Information Form and obtain the employee’s signature authorizing ROCC to receive the audiometric test results. The audiologist may counsel the employee as to possible changes in type of hearing protection needed. The charge for the 30-day recheck will be billed to REM via PNC.
- u. When an a ROCC referral is advised, fax copies of the following documents to Patty Scheetz, NP or Jamie Kondelis, MD at ROCC for review:
 - Purdue Form 89 - Authorization for Occupational Medical Services
 - Current REM 4 part HCP form
 - Purdue Adult Audiology Case History Form
 - Purdue Industrial HCP Audiometric Test Form
 - Age Correction Calculation Form (if applicable)
 - Employee’s comprehensive review HearTrak report
- v. After ROCC review of the employee’s audiologic history/test results, the employee will be notified to schedule an appointment at ROCC **ONLY** if the reviewer finds it necessary to determine work-relatedness of the suspected STS.
- w. The student obtains access to the HCP database through the log-in of supervising audiologist’s Purdue Career Account. The HearTrak database is a stand-alone data management software program. Quick access notes for the HearTrak software:
 - Supervising Clinical AuD Faculty logs into and Audiology Clinic computer
 - Select the HearTrak icon on the desktop

- Enter the Audiology Clinic password in **BOTH** the HearTrak log in and password fields
 - Enter the data base - select from the toolbar “Select Employee” then “Employee List”
 - Type in the first characters of the last name to search for employee; hit enter.
 - To enter audiogram data – select “Manual Test Entry” tab (top right)
 - To review data – select “Hearing” tab (top left)
 - Enter comments from REM form; reference to appropriate test date and audiologist
 - Document otoscopy results; add notes if needed
 - Document tympanometry results in comments if appropriate
 - Enter annual HCP educational training completion date – note training method used
 - Select ER-3A earphones used for testing
 - Select audiometer used for testing via sound booth 1-4
 - Select supervising audiologist for testing
 - Document employee use of HPD prior to testing
 - Document employee last noise exposure > 14 hours: Yes/No
 - Document ambient room noise acceptable
 - To exit the program – select “Finished – Red X” at the **bottom** of the screen (right)
- x. Baseline and Annual audiometric data must be entered into the HearTrak database within 24 hours after the appointment. Additional Comments also documented in HearTrak include otoscopy results, tympanometry results if applicable, general comments regarding medical or otologic history, insert earphones used, audiometer used and completion of the annual hearing conservation training. Other relevant information may also be included. The supervising audiologist will review the HearTrak database entries and PNC documentation for accuracy. See notes above regarding PNC documentation details. **NOTE HearTrak data is reported LEFT ear first which is opposite of the Purdue Occupational Test Results Form which reports RIGHT ear first.**
- y. See REM memo date July 2014 regarding baseline, annual and 30-day recheck audiometric testing for Purdue Police department and Purdue Fire department employees.

Commonly Used Abbreviations in Hearing Conservation

AAO	American Academy of Otolaryngology
AAO-HNS	American Academy of Otolaryngology – Head and Neck Surgery
AAOO	American Academy of Ophthalmology and Otolaryngology
ACGIH	American Conference of Governmental Industrial Hygienists
ADA	Americans with Disabilities Act
AIHA	American Industrial Hygiene Association

ANSI	American National Standards Institute
CAOHC	Council for Accreditation in Occupational Hearing Conservation
dB	Decibel
dBA	Decibels measured on the A scale of the sound level meter (or dosimeter)
EPA	Environmental Protection Agency
FECA	Federal Employee's Compensation Act
HCP	Hearing Conservation Program
Hz	Hertz
MSHA	Mine Safety and Health Administration
NHCA	National Hearing Conservation Association
NIOSH	National Institute for Occupational Safety and Health
NRR	Noise Reduction Rating
OCH	Occupational Hearing Conservationist
OSHA	Occupational Safety and Health Administration
PAR	Personal Attenuation Rating
PEL	Permissible exposure limit (OSHA) Permissible exposure level (MSHA)
SPL	Sound pressure level
STS	Standard threshold shift
TTS	Temporary threshold shift
TWA	Time-weighted average exposure level

Evaluation of Clinical Practicum

Supervision of Practicum

Student clinicians will be assigned to one or more clinical instructors during each semester of practicum. According to clinic policy and requirements for ASHA certification, the amount of supervision will be dependent upon student clinician skill levels and needs as determined by the clinical instructor.

Clinic Conferences

Initial instructor/student clinician conferences will be used to define the responsibilities of each person in regard to diagnostics, reports and other clinical matters. Generally, each clinical instructor and student clinician will schedule a weekly conference. These meetings can be used

to reflect on the session, evaluate clinical performance, discuss areas of strengths and weaknesses, discuss proposed plans, communicate upcoming responsibilities or jointly work on personal goals established by the student clinician. Plan to use this time effectively; it is your time to talk with your clinical instructor.

Evaluation and Remediation Procedures for Audiology Clinical Practicum

Students receive written and verbal feedback from their clinical instructors weekly via the daily feedback sheet. A copy of this evaluation tool can be found in the Appendix of Forms. Students are encouraged to discuss individual learning styles with their clinical instructors to facilitate clinical learning. A formal evaluation will be completed using the Knowledge and Skills based assessment from ASHA via the online form in Calipso at midterm and the final of the semester. Clinical instructors complete the appropriate sections of the form at mid-term and at the conclusion of the semester that reflects the independence and competence of the student clinician during the practicum experience.

At the midterm and final evaluations the student and instructor will meet and discuss the semester. This is a mechanism for the clinical instructor to identify areas of strength, as well as areas needing improvement and possible remediation.

Clinical faculty (licensed and ASHA certified audiologists) will identify the need for remediation when necessary. Remediation procedures for clinical competencies will result when the student fails to show clinical knowledge and or skills at the level expected for that year. Failure to demonstrate expected levels of performance in any area of clinical skills will be recorded on the evaluation form and specific recommendations for those areas that are not at expected performance levels will be documented.

Students who demonstrate clinical skills below expectations for the current year-level will receive an opportunity to improve these skills through remediation. The remediation will include specific goals, suggested resources, and a reasonable time frame for completion. If the student demonstrates skills within expected levels in the indicated time frame, his/her clinical practicum privileges continue. For those students whose performance in clinical practicum results in a letter grade of a B- or lower, individualized remediation plans will specify the behaviors or skills that the student must demonstrate, the context in which the skills must be performed, and a deadline for remediation. Students who receive a grade of B- or below for two semesters will be ineligible to participate in clinical practicum.

Lines of Communication

In the event that the student has a concern regarding the supervisory support and/or clinical performance, the student should directly discuss the concern with the clinical instructor. A discussion with the instructor should include information about your learning style and suggestions about the MOST beneficial clinical education style for you as a student clinician.

We hope that students will be able to discuss most concerns directly with the involved parties but we know that situations can arise in which other advice is needed. The department head, graduate program director, faculty advisors, directors of clinical education, and the clinic directors are all available to discuss student concerns. In addition, the department head appoints two ombudsmen. Students may discuss any type of grievance with the ombudsmen in complete confidence. The ombudsmen can advise the students of various ways to relieve difficulties, including informal discussions, grievance procedures, referral to counseling services, and so on.

Depending on the nature of the concern or grievance, students may also contact the following:

Purdue Office of the Dean of Students	SCHL 207	(765) 494-1747
Purdue Graduate School	YONG 170	(765) 494-2600
Purdue Committee on the Use of Human Subjects	ENAD 328	(765) 494-5942
Council on Academic Accreditation - ASHA	2200 Research Boulevard, #310	
	Rockville, MD 20850	
	800-498-2071	
ASHA Board of Ethics Director	Director of Ethics	
	www.asha.org	

Risk Management

Annual training is provided to all students every fall semester. See risk management Handbook for details regarding blood borne pathogens, Hepatitis, TB, MRSA, etc.

Hand Washing

Students will be expected to routinely wash hands using the no-rinse hand wash available in every patient room. **Hands MUST be washed in the room in front of the patient prior to touching the patient (usually for otoscopy) the first time.**

Handling ITEs and Earmolds

There is a danger of spreading bacterial and fungal infections through handling earmolds and hearing aids without disinfecting them first. Also, there may be blood or ear drainage on the device, which may or may not be visible at first glance. Therefore, do NOT handle these devices with your bare hands before disinfecting them. Wear gloves prior to taking the hearing aid(s) from the patient and for the entire time you clean/handle the hearing aid(s). Here are several precautionary options:

1. Use a disinfectant wipe to handle the hearing aid/earmold. Have the patient place the device directly into the wipe. You can then wipe the device before handling it **OR**
2. Use a bowl to capture the device, and then disinfect it with a wipe **OR**
3. Have the patient place the earmold in the ultrasonic cleaner.

Other notes to remember:

1. It is possible there could be dried blood or mucous in the sound ports or vents.
2. Always sterilize tools used to clean the aid when blood or mucous is found.
Disinfect the tools when blood or mucous is not present.
3. Never use any tool or instrument that has not been cleaned, disinfected, or sterilized properly.

Toys

In Audiology clinics there are usually toys in the sound booth. These toys will eventually end up in the mouths of the children who play with them. Follow these guidelines to help control infection:

1. Choose toys that are not porous. Pick toys that can get wet and be sprayed with disinfectant easily. Avoid stuffed animals or any “soft” toys.
2. Disinfect used toys daily. Disinfect all toys weekly.
3. Use care when handling the toys. Wash your hands after handling/disinfecting the toys.
4. Always replace broken or old toys.

Disposable Items in Clinic

The following items are disposable in our clinic, therefore eliminating the need for infection control:

1. Insert earphones
2. Otoscopic specula

Injury and Illness

General

Employees and students must notify their immediate clinical instructor or instructor of all illnesses and injuries related to exposure to blood or body fluids.

Employees and students should report to the Purdue University Student Health Center if medical attention is required. Students should be accompanied by a friend, teaching assistant or instructor.

If transportation is necessary, the University Police (EXT. 48221) should be called to get transportation for the victim.

Do not move a seriously injured person unless they are in further danger.

In cases of serious injury or illness, it is imperative that appropriate actions be followed immediately. When in doubt as to what should be done, telephone the University Police at (EXT. 48221) for assistance.

Give emergency and medical personnel the following information:

- * your name, location and nature of the emergency
- * the name of the chemical involved
- * the amount involved
- * area of the body affected
- * symptoms

If you have any questions regarding injury and illness procedures, contact your clinical instructor or the Fire Department.

Association Information

ASHA - The American Speech-Language-Hearing Association

ASHA is the national scientific and professional association for speech-language pathologists, audiologists, and speech-language and hearing scientist. The Council on Academic Accreditation (with ASHA) accredits our graduate programs in Speech-Language Pathology and Audiology. We urge you to become familiar with its goals, its programs, and its publications. You will learn about ASHA in your coursework, from your clinical instructors, and from publications that will be made available to you at various times.

The manner in which you receive your clinical training follows certain guidelines prescribed by the ASHA. The guidelines call for a minimum number of clinical clock hours. However, it is the philosophy of our program that merely meeting minimum requirements does not mean that you have received adequate practicum experience. Our objective is to provide students with the number and quality of clinical experiences that will make them competent professionals. Meeting competency requirements often means that students will accumulate academic and clinical experiences in excess of the ASHA minimum requirements. Your clinical instructors

will be working with you closely to define and help you achieve these competencies. More information regarding ASHA can be found at www.asha.org

NSSLHA - The National Student Speech-Language and Hearing Association

NSSLHA is the national organization for students interested in the study of normal and disordered communication behavior. Membership is open to undergraduate graduate students. Many universities, including Purdue, maintain active chapters, which meet during the year on a regular basis. The Purdue Chapter of NSSLHA encourages your membership and support of its activities. Through Purdue Chapter programs, you will learn more about the opportunities that can result from your professional training, more about the national NSSLHA Chapter, and about the workings of the ASHA. Invited NSSLHA members organize the annual Crossroads Conference every fall and nationally recognized speakers are invited. Graduate students are required to attend the Conference in October. More information regarding NSSLHA can be found at <http://www.nsslha.org/default.htm>

Purdue SAA – Purdue Student Academy of Audiology

Students of the Purdue University Department of Speech, Language, and Hearing Sciences (undergraduates interested in Audiology, Au.D. students or Ph.D. students of Audiology) are eligible to be members of SAA-Purdue Chapter. The purpose of SAA is to have a professional organization for the mutual benefit of its members; to benefit the profession of Audiology, educationally and socially; and to promote academics, research and community involvement. The group fosters interaction between Audiology students ranging from undergraduates to 4th year AuD as well as PhD students.

ISHA - Indiana Speech-Language and Hearing Association

ISHA is the state organization for individuals working or interested in the fields of speech-language pathology and audiology. Membership is open to undergraduate, masters and doctoral level graduate students. ISHA encourages you to become a member and participate in its activities. Through involvement in ISHA you will learn more about the opportunities available in Indiana. More information regarding ISHA can be found at <http://www.islha.org/>

AAA – American Academy of Audiology

AAA is the professional organization for audiologists. Student membership allows you to receive JAAA, the Journal of the American Academy of Audiology and Audiology Today. The annual convention is a site for clinical presentations, new amplification products and job opportunities. More information regarding AAA can be found at www.audiology.org

ADA - Academy of Doctors of Audiology

ADA is a professional organization for audiologists dedicated to the advancement of practitioner excellence, high ethical standards, professional autonomy and sound business practices in the provision of quality audiologic care. ADA's vision is to ensure practitioner ownership of the profession of audiology through the advancement of autonomous practice models. ADA offers an annual convention each fall and ongoing web seminars. ADA publishes a quarterly magazine, *Audiology Practices*. This and more information can be found at www.audiologist.org/.

ARO – Academy for Research in Otolaryngology

ARO is the professional organization for otolaryngologists, physiologists as well as hearing scientists. Student membership entitles students to JARO, the Journal of the Academy for Research in Otolaryngology and reduced registration fees for the annual conference held in Florida. This is a research organization and will be useful for students interested in pursuing a career in hearing science and research. More information regarding ARO can be found at <http://www.aro.org/>

ASA – Acoustical Society of America

ASA is the professional organization for acousticians, engineers, psychoacousticians and hearing scientists. Like ARO, this organization is also a research organization suited for students interested in a career in hearing research, particularly psychoacoustics. More information regarding ASA can be found at <http://asa.aip.org/>

CAOHC – Council for Accreditation in Occupational Hearing Conservation

CAOHC is the professional organization with a mission to advance best practices in occupational hearing conservation worldwide, through credentialing, standards, education, and advocacy. Their goals include being the global leader in the development of high quality cutting edge resources related to occupational noise exposure. More information regarding CAOHC can be found at <https://www.caohc.org/>.

Certification and Licensure**ASHA Certification**

At the successful completion of the 4 year AuD program, students are eligible to apply for ASHA certification (CCC-A) if they choose to do so. The Praxis II exam in Audiology is required for ASHA certification. Information about the exam is available at <http://www.asha.org/students/praxis/>. The Praxis II exam is administered by the Educational Testing Service. The website is www.ets.org/praxis. The address is:

ETS – Praxis Series
P.O. Box 6052
Princeton, NJ 08541-6052
Phone number: 800-772-9476

It is recommended that students register for and take this exam at the end of Year III after completion of all coursework, but prior to their final off-campus clinical practicum rotations. The Praxis II exam scores should be reported directly to the SLHS Department. It is recommended that students print and keep a copy of their results for their records after completing the exam.

The application for ASHA membership and certification is available online at <http://www.asha.org>. Students applying for ASHA certification must complete this online submission. Students can contact the ASHA Action Center at 800-498-2071 for assistance.

State Licensure

State licensure is required in most states to practice Audiology, and the requirements vary by state. IN state licensure requirement information, instructions and application forms are available at <http://in.gov/pla/>. The ASHA CCC-A may be submitted in lieu of evidence of the practicum

hours in some states. Check individual state requirements if you are applying for externships or jobs elsewhere. It is the student's responsibility to understand the law regarding licensure in audiology in other states. Contact information for the Indiana Professional Licensing Agency is:

Attn: SLPA Board

402 West Washington Street, Room W072

Indianapolis, IN 46204

Note: The process of review within the SLHS department of this submitted paperwork can take 2-4 weeks and then can be sent to ASHA for reviewed.