CSD - Communication Sciences and Disorders

Courses numbered 500 to 799 = undergraduate/graduate. (Individual courses may be limited to undergraduate students only.) Courses numbered 800 to 999 = graduate.

CSD 504. Aural Rehabilitation (3).
Discussion and labs concerning the role of speech-language pathologists and audiologists in evaluation and treatment of hearing-impaired children, adolescents, adults and their families. Students focus on understanding psychological, social, educational and occupational impacts of hearing loss; on applying a rehabilitative model, technology, individual and group therapies, and collaboration with families and professionals to help hearing-impaired persons improve or cope better with their communication problems. Prerequisite: CSD 351 or instructor's consent.

CSD 506. Acoustic and Perceptual Phonetics (3).
Study of the physical patterns (acoustic) of speech sounds and the importance of these acoustic patterns to speech recognition (perception). Focuses on segmental phonemes (vowels and consonants) and on suprasegmental characteristics such as stress and intonation. Introduces different types of speech analysis techniques and discusses how they may be used to study the acoustic patterns of speech sounds. Studies how different aspects of the speech signal relate to listener perception. Prerequisites: PHYS 210 and CSD 301.

CSD 506H. Acoustic and Perceptual Phonetics - Honors (3).
Study of the physical patterns (acoustic) of speech sounds and the importance of these acoustic patterns to speech recognition (perception). Focuses on segmental phonemes (vowels and consonants) and on suprasegmental characteristics such as stress and intonation. Introduces different types of speech analysis techniques and discusses how they may be used to study the acoustic patterns of speech sounds. Studies how different aspects of the speech signal relate to listener perception. Honors section. Prerequisites: PHYS/CSD 210 and CSD 301.

Discusses communication differences, delays, and disorders in children. Emphasis will be placed on the potential impact on quality of life and on academics resulting from communication disorders associated with special populations of children with speech-language impairments, intellectual disabilities, hearing impairment, acquired language disorders, and craniofacial anomalies. Prerequisites: CSD 304 and CSD 306.

CSD 512H. Communication in Special Populations: Children Honors (4).
Discusses communication differences, delays, and disorders in children. Emphasis will be placed on the potential impact on quality of life and on academics resulting from communication disorders associated with special populations of children with speech-language impairments, intellectual disabilities, hearing impairment, acquired language disorders, and craniofacial anomalies. Prerequisites: CSD 304 and CSD 306.

CSD 517. Communication in Aging (3).
Focuses on how communication is affected by aging, what communication problems may be experienced by older persons, and what the implications are for speech-language pathologists and audiologists providing services to older persons. Explores prevention activities geared toward maintaining functional communication abilities in older adults as well as functional treatment approaches geared toward the specific communication needs of older persons. Course is appropriate for students in other fields of study. Course includes diversity content.

CSD 517H. Communication in Aging - Honors (3).
Focuses on how communication is affected by aging, what communication problems may be experienced by older persons, and what the implications are for speech-language pathologists and audiologists providing services to older persons. Explores prevention activities geared toward maintaining functional communication abilities in older adults as well as functional treatment approaches geared toward the specific communication needs of older persons. Honors section. Course is appropriate for students in other fields of study. Course includes diversity content.

CSD 518. Deaf Culture (3).
Examines various cultural aspects of the deaf community. Presents the interrelationship of language and culture along with a study of socialization, norms and values. Course includes diversity content.

CSD 519. Genetic and Organic Syndromes (3).
Introduces human genetics and the impact of chromosomal and structural anomalies of communication disorders. Assessment and remediation of cleft palate speech. Prerequisites: CSD 301, 302 with grades of B (3.000 points/credit hour) or better. Corequisite: CSD 521.

CSD 519H. Genetic and Organic Syndromes - Honors (3).
Introduces human genetics and the impact of chromosomal and structural anomalies of communication disorders. Assessment and remediation of cleft palate speech. Prerequisites: CSD 301, 302 with grades of B (3.000 points/credit hour) or better. Corequisite: CSD 521.

CSD 520. ASL: Nonverbal Communication (3).
Nonverbal way of communication which forms an integral base for communication in American Sign Language. Emphasizes the use and understanding of facial expression gestures, pantomime and body language. Role play and acting out are required as part of this class. Prerequisite: CSD 370 or instructor's consent.

CSD 521. Genetic and Organic Syndromes Lab (1).
Laboratory experience which provides students the opportunity to observe and document assessment and treatment of individuals with various communication disorders caused by syndromic and/or gene-linked conditions. Prerequisites: CSD 301, 302 with grades of B (3.000 points/credit hour) or better. Corequisite: CSD 519.

CSD 522. Deaf Heritage (2).
Considers the history, nature and uses of language and its effect upon human thought and action. Also covers the ideas and ideals expressed by deaf people over many periods of time through drama, philosophy, painting and related areas. Course includes diversity content.

CSD 605. Neuroscience of Speech and Language: Basic Processes (4).
A consideration of basic neuroanatomy and neurophysiology necessary for obtaining an understanding of the representation of speech and language in the human central nervous system and of conditions resulting from neurological impairment. Prerequisites: CSD 301 with a grade of B (3.000 points/credit hour) or better, senior standing.

CSD 605H. Neuroscience of Speech and Language: Basic Processes - Honors (4).
A consideration of basic neuroanatomy and neurophysiology necessary for obtaining an understanding of the representation of speech and language in the human central nervous system and of conditions resulting from neurological impairment. Prerequisite: senior standing.

CSD 635H. Senior CSD Honors Practicum (1).
Focuses on techniques and methods for developing clinical skills for a selected supervised practicum setting in speech-language pathology at the university’s Evelyn Hendren Cassat Speech-Language-Hearing
Clinic. Clinical practice skills include knowledge related to universal precautions, procedures for assessment/intervention, and electronic record keeping. Restricted to senior CSD honors students who have applied and been accepted according to department guidelines.

CSD 705. Counseling in Communication Disorders (3).
Provides information on the structure and conduct of interviews, basic counseling strategies, and consideration of the "helping" role as practiced by communication disorders professionals. Focuses on information supportive of developing effectiveness in these roles. Considers multicultural concerns. Course includes diversity content.

CSD 710. Autism Spectrum Disorder (3).
An overview of the characteristics and etiology of autism spectrum disorder and the knowledge needed to conduct effective communication and language assessments and develop evidence-based treatment strategies for individuals with ASD. Covers guidelines for the assessment and intervention of communication skills, including decision making for the selection of functional communication systems, structured teaching and positive environmental supports for effective learning. Course includes diversity content.

CSD 740. Selected Topics in Communication Sciences and Disorders (1-3).
Individual or group study in specialized areas of communication sciences and disorders. Repeatable for credit to a maximum of 6 hours. Prerequisite: instructor's consent.

CSD 740L. Speech Sound Disorders (2).
Discusses basic methods and procedures for identifying, assessing, analyzing and remediating speech-sound disorders. Practice in phonetic transcription of highly unintelligible speech samples. Includes classroom and clinic observations. Prerequisite: Admission to CSD graduate program.

CSD 750. Workshop in Communication Sciences and Disorders (1-4).
Individual or group study in specialized areas of communication sciences and disorders. Repeatable for credit to a maximum of 8 hours.

CSD 750Q. Improving Communication Skills of Children (1).
“Communication = Power! Improving the communication skills of individuals with complex communication challenges.” Workshop designed for teachers and speech-language pathologists who work with individuals who have been diagnosed with various disabilities, including autism spectrum disorder (ASD) and are minimally verbal or nonverbal. Participants engage in activities focused on selecting appropriate assessment tools, using a guided decision making process for developing instructional supports, setting goals and objectives based on assessments and observations, and implementing collaborative evidence-based instructional strategies, including augmentative alternative communication, in the classroom and/or home.

CSD 781. Cooperative Education (1-4).
A work-related placement that integrates theory with a planned and supervised professional experience designed to complement and enhance the student’s academic program. May not be used toward degree requirements. Repeatable for credit. Graded Cr/NCr.

CSD 803. Intro to Psychoacoustics (4).
Fundamental principles, measurement methods, research findings, laboratory practice, and readings relating physical properties of nonspeech and speech sounds to people’s subjective sensations and perception responses.

CSD 804. Clinical Audiology I (3).
Lectures, labs and case studies concerning measurement of hearing sensitivity with the pure tone audiogram. Topics include types and features of audiometers, audiometric test environments, behavioral and electro-acoustic calibration, pure tone air-conduction and bone-conduction threshold testing, clinical masking, audiometric tuning fork testing, and verbal and written interviewing and reporting of pure tone results.

CSD 805. Clinical Audiology II (4).
Lectures, labs and case studies concerning auditory evaluation beyond the pure tone audiogram, focusing on differential diagnosis of auditory site-of-lesion. Topics include speech audiometry, acoustic immittance testing, behavioral testing of cochlear versus retrocochlear sensorineural hearing loss, auditory processing evaluation in adults, and assessing nonorganicity. Prerequisite: CSD 804.

CSD 806. Advanced Anatomy and Physiology of the Auditory System (3).
An in-depth study of the structure and function of the ear, emphasizing the conductive and sensory mechanisms and cochlear processes of acoustic signals. Introduces neuroanatomy and electrophysiology of the auditory system, including the efferent system. Highlights major clinical and pathologic correlates to link basic science principles and practice.

CSD 807. Acoustics & Instrumentation (3).
Study of basic acoustics for the hearing and speech sciences, including physical and mathematical concepts in sound generation, transmission, manipulation, measurement and wave analysis. Introduces the fundamentals of electricity and electronics related to research and clinical application in audiology, including essential concepts and function of circuits and electronic devices, and technical knowledge of major forms of instrumentation.

CSD 808. Otoacoustic Emissions (2).
Study of theoretical consideration of otoacoustic emissions in evaluating cochlear function and clinical applications of different types of measures, including instrumentation, stimulus and acquisition parameters; effects of intrinsic and extrinsic variables, and interpretation of test results. Prerequisites: CSD 807.

CSD 809. Language & Literacy for Young Children: Assessment and Intervention (3).
Emphasis on etiology and characteristics of language deficits of young children. Provides current evidence relevant to language assessment and intervention strategies for children birth to school age. Includes examination and development of culturally sensitive individual and family treatment plans, facilitation of emergent literacy, and problem-based application of the descriptive developmental treatment model. Prerequisite: previous coursework in typical language development.

CSD 810. Motor Speech Disorders (2).
Studies the neurologic bases for motor speech production and dysfunction: dysarthrias and apraxia. Covers assessment of motor speech disorders and clinical management principles and strategies for the speech subsystems of respiration, phonation, articulation, resonance and prosody. Pre- or corequisite: coursework in neuroscience.

CSD 811. Dysphagia (2).
Covers the disorder of dysphagia as it affects persons of all ages, but with a focus on adults. Examines evidence-based assessment and treatment procedures. Addresses the importance of interprofessional teamwork and ethical issues. Provokes discussions on the art and science of evaluation and intervention in dysphagia management.

CSD 811L. Dysphagia Lab (2).
Study and labs targeting specific populations — from infant to geriatric patients — have various feeding and swallowing issues. Hands-on practice with instrumentation for dysphagia, and supervised observation/participation on teams and with patients live or through video presentation/case studies. Additional coursework
to enhance knowledge and skills concerning specific disease groups and populations, with accompanying evaluation and treatment considerations. *Course includes diversity content.* Prerequisite: CSD 811 (may be concurrent).

**CSD 812. Aphasia (3).**
Designed to prepare students for clinical work with people with aphasia. Students integrate background information from neurophysiology to understand aphasia. Emphasis is placed on psycholinguistic and neurolinguistic theories of language processing, assessment, differential diagnosis of neurogenic language disorders, and the development of appropriate restorative and compensatory intervention plans. Also focuses on the clinical description and characteristics of the impairments as well as on the psychosocial changes in life activities and participation of people who live with aphasia.

**CSD 814. Speech-Sound Disorders (2).**
Reviews current theories on the etiology and development of the disorder. Considers behaviorally based diagnostic procedures for children and adults, as well as methods for clinical intervention, including procedures for parent interviewing and counseling, and multicultural concerns. Provides opportunities for observation, one focus being demonstration of intervention methods.

**CSD 815. Augmentative and Alternative Communication (2).**
Provides information about assistive technology for persons with special needs across the life span (e.g., cerebral palsy, degenerative neurological diseases, autism). Considers physical, linguistic and cognitive factors in the design and implementation of assistive technology resources. Provides resources for assessment, intervention, partner training and report writing. Studies use of augmentative and alternative communication systems and computer applications/modifications. Explores resources for purchase and funding of AAC systems.

**CSD 816. Language and Literacy for School-Age and Adolescents (3).**
Examination of various approaches to working with children and adolescents with language and literacy deficits which compromise school success. Explores the multidimensional nature of the language and literacy needs of students in the classroom to meet Common Core standards. Includes multicultural aspects and collaboration strategies.

**CSD 817. Voice Disorders (3).**

**CSD 818. Fluency Disorders (3).**
Reviews current theories on the etiology and development of the disorder. Considers behaviorally based diagnostic procedures for children and adults, as well as methods for clinical intervention, including procedures for parent interviewing and counseling, and multicultural concerns. Provides opportunities for observation, one focus being demonstration of intervention methods.

**CSD 819. Cognitive Communication Disorders (2).**
Addresses cognitive communication disorders that result from brain injuries (e.g., traumatic brain injury, right hemisphere stroke and dementia). The similarities and differences between cognition and the language are considered. Evaluation and treatment methods are introduced for adult clients with these acquired disorders.

**CSD 820. Graduate Methods and Practicum in Speech and Language Evaluation (2).**
Discusses clinical methods for evaluation and diagnosis of children and adults presenting with speech and/or language disorders. Prerequisites: CSD 510, medical clearance, and insurance.

**CSD 821. Educational Settings Practicum (3).**
Provides supervised clinical experiences in identification, diagnosis, evaluation, treatment, referral and counseling of children with speech or language impairments in a school setting. Demonstration of applied clinical skills in the elementary and/or secondary school levels is completed. Prerequisites: CSD 809, 816, 822, medical clearance, liability insurance, and departmental approval one year prior to enrollment.

**CSD 822. General Clinic Practicum (1-2).**
Provides supervised clinical experiences in settings with preschoolers, school-aged children and adults with a wide variety of communication disorders. Covers concepts of clinical practice, including diagnosis, data collection, report writing, counseling and treatment techniques. Repeatable for credit Prerequisites: admission to CSD graduate program on a clinical track, medical clearance and liability insurance.

**CSD 823. Medical Settings Practicum (3).**
Provides supervised clinical experiences in individual and group therapy diagnostics, documentation, consultations and interdisciplinary staffings in a medical setting. Prerequisites: CSD 810, 811, 812, 822, medical clearance, liability insurance and departmental approval one year prior to enrollment.

**CSD 824. External Placement Practicum (1).**
Supervised clinical experiences in off-site locations for advanced clinical experiences in a variety of settings as well as a wide spectrum of speech and language disorders. Repeatable for credit. Prerequisites: CSD 822, medical clearance, liability insurance and departmental approval.

**CSD 831. Auditory Assessment—SLP Practicum (1).**
Discusses proper hearing screening techniques for all age groups that are commonly conducted by speech-language pathology students. Students engage in practical experiences throughout the semester.

**CSD 832A. Critical Thinking in Clinical Practice I (3).**
Introduction to critical thinking and problem solving related to clinical practice in speech-language pathology. Content includes introduction to evidence-based evaluation/assessment, goal writing, data collection, treatment models and report writing. Case-based inquiry is used along with clinical role playing and cooperative/interprofessional learning. Prerequisite: admission to CSD graduate program.

**CSD 832B. Critical Thinking in Clinical Practice II (2).**
Provides further introduction to critical thinking and problem solving related to clinical practice in speech-language pathology. Content includes further discussion of evidence-based evaluation/assessment, goal writing, data collection, treatment models and report writing. Case-based inquiry is used along with clinical role playing and cooperative/interprofessional learning. Prerequisite: CSD 832A.

**CSD 832C. Critical Thinking in Clinical Practice III (2).**
Further development of critical thinking and problem solving related to clinical practice in speech-language pathology. Content includes further discussion of evidence-based evaluation/assessment, goal writing, data collection, treatment models and report writing. Case-based inquiry is used along with clinical role playing and cooperative/interprofessional learning. Prerequisites: CSD 832A, 832B.

**CSD 836. Clinical and Research Writing (1).**
A study of basic writing skills, scientific writing, and professional writing, particularly for assessment reports, treatment plans, progress
CSD 837. Clinical Assessment of Speech-Language Disorders (1).
Study of the basic diagnostic procedures used in speech-language pathology. Emphasis placed on criteria for test selection, techniques in test administration, and interpretation of test results. Course includes diversity content.

CSD 838. Supervisory Process in Speech-Language Pathology and Audiology (1).
Study of theories and strategies used in the supervision of student speech-language pathology and audiology clinicians. Discusses professional standards and methods for analyzing the teacher-learning process. Course includes diversity content.

CSD 851. Medical Audiology (3).
Introduces medical aspects of hearing impairment and other auditory disorders, emphasizing pathological changes of the auditory system and diagnosis of prevalent diseases related to the auditory system. Links up audiologic findings with otologically diagnosed disorders. Introduces general information on embryologic development of various portions of the auditory system. Addresses fundamental knowledge on human genetics such as DNA structure and function, genes, modes of genetic transmission, hereditary deafness. Discusses application of genetic testing and prenatal diagnosis of genetic disorders. Prerequisite: CSD 806, or instructor's consent.

CSD 854. Hearing Conservation (2).
Discussion and labs concerning prevention of hearing loss in the workplace, military, community and recreation. Students focus on risk factors of major preventable hearing impairments including noise, chemical ototoxicity, measurement, calculation and reporting of noise levels; application of forensic audiology and government regulations; and implementing prevention programs through noise control, hearing testing, hearing protection devices, and worker and public education.

CSD 855. Pediatric and Educational Audiology (3).
Discussion and labs concerning identification, evaluation and intervention with infants, children and adolescents with hearing losses, other auditory problems, or developmental disabilities. Students focus on newborn hearing screening programs, auditory and global development of children and their importance in behavioral, functional and electrophysiological evaluation of hearing and listening; administering school hearing conservation and aural rehabilitation programs, classroom acoustics and amplification, interdisciplinary teamwork and collaboration with families and educators, and legal protections of hearing-impaired students, including individual education plans.

CSD 860. Amplification I (3).
Introduction to the area of amplification. Students learn basic knowledge and skills in topics such as types of hearing aids, hearing aid components, hearing aid systems, electroacoustic performance and measurement, hearing aid plumbing, basic compression systems, probe microphone verification, hearing aid candidacy, problem solving, assessing outcomes and hearing aid orientation/counseling. Prerequisite: CSD 804.

CSD 861. Amplification II (3).
Students investigate topics such as advanced probe microphone measures, advanced signal processing, advanced hearing aid design, remote microphone options in amplification, and special amplification options, such as cochlear implants and bone-anchored hearing aids. Students have the opportunity to interact with professionals representing various aspects of the industry. Prerequisite: CSD 860.

CSD 863. Professional Seminar in Audiology (3).
An exploration of current topics in audiology that delves into principles, practices, innovation, conduct and interpretation of research. Covers professional issues of the field that can impact the profession. Examines current professional, ethical and service issues that can impact the practice of audiology.

CSD 866. Auditory Evoked Potentials (3).
Provides information on the anatomic and physiologic basis of auditory-evoked potentials generated from the peripheral and central auditory systems. Discusses techniques for the administration and interpretation of auditory-evoked potentials, including cochlear potentials (ECochG), the auditory brainstem responses (ABR), and the late-occurring evoked potentials (MLR, ALEAP, MMN, and P300). The use of evoked potentials in intraoperative monitoring is also discussed. Lab component provides opportunities for hands-on learning and independently performing various auditory-evoked potential tests. Prerequisites: CSD 804, 806.

CSD 868. Diagnosis and Management of Persons with Balance Disorders (3).
Discussion and labs concerning an audiologist's role in diagnosis and management of persons with vestibular and balance disorders. Students focus on anatomy, physiology, development and disorders of vestibular and ocular-motor systems; subjective evaluations using interviewing and scaling; objective evaluations using ENG/VNG, rotational testing, posturography and vestibular evoked potentials; balance rehabilitation, and interdisciplinary collaboration and communication. Prerequisite: CSD 806 or instructor's consent.

CSD 870. Current Topics Amplification (2).
Explores the role of evidence-based practice in the selection/provision of amplification. Facilitates the critical consumption of current original research in the area of hearing aids. Explores the perceptual effects of new technologies in the form of peer-reviewed journals, trade journals and hearing aid manufacturer's white papers. Discusses additional considerations for special populations. Prerequisites: CSD 860, 861.

CSD 871. Current Topics in Auditory Disorders (2).
Advanced audiology course covering the latest evidence-based research in evaluation and intervention with persons who have special auditory problems that are increasingly influential for audiologists now and in the future (e.g., tinnitus, hyperacusis, auditory neuropathy, age-related hearing loss, dual sensory loss).

CSD 886. Clinical Practicum in Audiology (1-2).
Supervised clinical practicum at the WSU Evelyn Hendren Cassat Speech-Language-Hearing Clinic and/or an off-campus clinical rotation site. Clinical expectations and responsibilities vary with the student's level of experience and the requirements of the placement site. Practicum assignments are determined by each student's competency needs, ASHA requirements and availability of rotation sites. Repeatable, but total credit hours may not exceed 8. Prerequisite: departmental approval.

CSD 890. Independent Study in Speech and Language Pathology or Audiology (1-4).
Arranged individual, directed study in specialized content areas in speech and language pathology or audiology. Repeatable for credit to a maximum of 4 credit hours. Prerequisite: instructor's consent prior to enrollment.

CSD 891. Nonthesis Research (1-3).
The benchmark for the applied research experience in the Master of Arts program in communication sciences and disorders. A directed research project which may include literature searches, data collection or interpretation of data. Independent projects must involve extensive data collection, analysis and preparation of a written manuscript.
CSD 892. Presentation of Research (1).
The benchmark for the applied research experience in the Doctor of Audiology program in communication sciences and disorders. A directed research project which may include literature searches, data collection and interpretation of data. Culminates in the oral presentation of capstone project, which may also be prepared for publication. Repeatable, but total credit hours may not exceed 5. Prerequisites: research methods course, departmental consent prior to enrollment.

CSD 990. Advanced Independent Study in Speech and Language Pathology, Audiology or Speech Science (1-3).
Arranged individual, directed study in specialized content areas in speech and language pathology, audiology or speech sciences. Repeatable. Prerequisites: advanced standing and instructor's consent.

CSD 992. Advanced Presentation of Research (1-3).
A directed research project for doctoral students culminating in a manuscript appropriate for publication.

CSD 995. Research Proseminar (1).
A weekly seminar of informal discussion and formal presentation of ongoing or planned research by the CSD faculty and doctoral graduate students. Goal is to provide CSD doctoral students with new and valuable knowledge and insights regarding how real-world research is performed. Prerequisite: doctoral student standing.

CSD 996. University Teaching (1).
A weekly seminar on university teaching. The pedagogy, theories and research of teaching are discussed through presentation of readings, observation of teaching, and teaching experiences. The goal is to provide doctoral students with information and experience in university teaching. Repeatable. Prerequisite: doctoral student standing.

CSD 997. Audiology Residency (4-7).
Full-time supervised clinical experience at an approved clinical facility. Repeatable, but total credit hours may not exceed 18. Prerequisite: advancement to candidacy in the AuD program.

CSD 999. Doctoral Dissertation (1-18).
Successful completion of this course assures that the student has participated in an independent research activity that includes aspects of literature review, data collection and analysis, and scholarly writing. The expectation is that one or more manuscripts may be prepared for submission to scholarly journals based on this research experience. Course serves as the benchmark for the applied research experience in the Doctor of Philosophy program in CSD. Repeatable, but total credit hours counted toward degree requirements shall not exceed 18 credit hours. Graded S/U. Prerequisite: instructor's consent.

CSD 990. Advanced Selected Topics in Communication Sciences and Disorders (1-4).
Advanced individual or group study in specialized areas of communication sciences and disorders. Intended for doctoral students or advanced master's-level students. Repeatable.

CSD 990Q. Advanced Selected Topics in CSD: Technology Design (1-4).
Directed study into how technology impacts speech, language, and social/emotional development in children. Emphasis on research methods being used to analyze such impacts, current therapeutic applications, current consensus findings, and areas requiring further study.

CSD 940. Advanced Selected Topics in Communication Sciences and Disorders (1-4).
Advanced individual or group study in specialized areas of communication sciences and disorders. Intended for doctoral students or advanced master's-level students. Repeatable.

CSD 940P. Cognitive Communication in Children (1-4).
Covers selected topics relevant to the field on domains of cognitive communication in children and design of a novel research project. Discussions include executive functioning, attention, memory, and problem-solving skills while focusing on domains that predict later achievement (e.g., working memory). Intended for doctoral students.

CSD 940Q. Cultural Diversity in CSD (1-4).
Covers selected topics relevant to cultural diversity in communication sciences and disorders, and design of a novel research project. Intended for doctoral students.

CSD 940U. Concepts of Critical Thinking (1-4).
Designed to engage doctoral students in the process of critical thinking and how it applies to communication sciences and disorder issues. Students learn how to apply critical thinking components to issues related to, but not limited to, concepts in teaching critical thinking, augmentative and alternative communication, and other related communication issues.

CSD 940V. Alternative and Augmentative Technologies - Applications and Research (1-4).
Covers selected topics relevant to the field on Alternative and Augmentative Communication (AAC), and design of a novel research project. Discussions include fundamental principles of AAC assessment, research planning and implementation, data collection and interpretation, and potential problems faced by researchers.