# Texas Tech University Health Sciences Center



School of Allied Health Sciences 2003-2004 Catalog

### **PUBLICATION POLICY**

The programs, policies, statements, fees, and/or courses contained in this document are subject to continuous review and evaluation. The School of Allied Health Sciences reserves the right to make changes at any time without notice. This publication is therefore intended for information purposes only. Matriculation information particular to the individual programs within the School of Allied Health Sciences is contained in departmental handbooks issued to admitted students upon enrollment. Students should consult

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# ACADEMIC CALENDAR

Summe	r 2003	
	May 12 May 19 May 23 May 28 May 29	MOT 2 Fieldwork I Begins MPT2 Clinical Experience I Begins MOT 2 Fieldwork I Ends AT, MP, OT, PA & PT Orientation First Day of Classes
	June 27	MPT2 Clinical Experience I Ends
	July 1-3 July 4 July 7	CLS Final Exams Independence Day Holiday MAT2 Classes Begin MPT2 Classes Begin
	August 6 August 7-8 August 11 August 22	Last Day of Classes Final Exams MOT 2 Fieldwork I Begins MOT 2 Fieldwork I Ends
Fall 200	3	
	September 1 September 2	Labor Day Holiday CD, CLS Orientation AT_MP_OT_PA & PT_Classes Begin
	September 29	OT Fieldwork II:1 Begins
	October 29-31	CLS Final Exams-Seniors
	November 10 November 26-28	CLS Clinical Preceptorships Begin-Seniors Thanksgiving Holiday (Students)
	December 10 December 12-17 December 19	Last Day of Classes Final Exams MOT Fieldwork II:1 Ends CLS Clinical Preceptorships End - Seniors
Spring 2	2004	
-1 0	January 5	CLS Clinical Preceptorships Resume MPT2 & 3 Clinical Experience (II & III) Begin MOT 3 Fieldwork II:2 Begins
	January 14 January 19	Classes Begin MLK Holiday
	February 13 February 16 February 27	MPT2 Clinical Experience II Ends MPT2 Classes Begin MPT3 Clinical Experience III Ends
	March 8 March 15-19	MPT3 Clinical Experience IV Begins MSMP Clinical Preceptorship Begins Spring Break
	March 26	MOT 3 Fieldwork II:2 Ends

May 3

A Message From PAUL P. BROOKE, JR., Ph.D., FACHE Dean Of The School of Allied Health Sciences, Texas Tech University Health Sciences Center



I welcome the opportunity to introduce the School of Allied Health Sciences. Established by the Texas State Legislature in 1981, the School of Allied Health Sciences was created to educate Allied Health professionals to fill crucial shortages in meeting the health care needs of the people of West Texas. The School of Allied Health Sciences has since become a vital member of the Texas Tech University Health Sciences Center team.

From the first class of 18 students in 1983, the school has grown steadily. With campuses in Amarillo, Lubbock, Midland, and Odessa now serves a student population of more than 600 enrolled in fourteen different degree programs at the doctoral, masters and baccalaureate degree levels. In preparing the allied health professional who will meet the evolving health care needs of all Texans in the 21<sup>st</sup> century, the School of Allied Health Sciences remains focused on developing and presenting educational programs of the highest quality in a student-centered learning environment.

Our objective is to offer our learning opportunities that exceed nationally recognized standards of technical competence, while simultaneously developing the professional insight and serviceoriented compassion that will enable our graduates to excel in merging "high tech and high touch"

### **ADMINISTRATION**

**BOARD OF REGENTS** Carin Barth C. Robert Black E.R. Brooks J. Robert Brown John W. Jones Dr. Nancy E. Jones David R. Lopez Brian C. Newby J. Michael Weiss HEALTH SCIENCES CENTER David R. Smith, M.D. Chancellor M. Roy Wilson, M.D. President Elmo Cavin, Jr., M.B.A. Vice President for Fiscal Affairs Glen J. Provost, J.D. Vice President for Health Policy and Planning SCHOOL OF ALLIED HEALTH SCIENCES Paul P. Brooke, Jr., Ph.D., FACHE Dean and Professor Hal S. Larsen, Ph.D., MT (ASCP), CLS (NCA) Associate Dean; Chair, Department of Laboratory Science and Primary Care Rajinder Koul, Ph.D., CCC-SLP Assistant Dean for Research; Chair, Department of Speech, Language and Hearing Sciences Steven F. Sawyer, Ph.D., MPT Chair, Department of Rehabilitation Sciences Michael Hooten, M.H.A. Regional Dean, Amarillo Robin Satterwhite, M.B.A. Regional Dean, Odessa Brenda Bobo Director of Administration Carey Woodward, M.Ed. Director of Admissions and Student Affairs

### **GENERAL INFORMATION**

### MISSION

The mission of the Texas Tech University Health Sciences Center is to provide excellence in the education of health care professionals to serve the West Texas region, the state of Texas, and the nation through innovations in technology, research and patient care.

The Texas Tech University Health Sciences Center fulfills its higher education mission by achieving four strategic goals:

- Develop professionals today to meet the health challenges of tomorrow
- Demonstrate excellence in serving targeted healthcare needs
- Pursue new knowledge in the life sciences and apply research to improve health
  outcomes
- Optimize organizational effectiveness and efficiencies

### GOALS OF THE SCHOOL OF ALLIED HEALTH SCIENCES

- 1. To provide quality education for a maximum number of people in the region served by the Texas Tech University Health Sciences Center.
- 2. To foster cooperation between regional campuses and the School of Allied Health Sciences so students have the opportunity to complete their education in their home communities.
- 3. To provide innovative and flexible programs, recognizing and serving the needs of students of varying backgrounds.
- 4. To be sensitive to and responsive to the educational and health-care needs of under-served populations.
- 5. To provide continuing education opportunities for allied health practitioners.
- 6. To provide society with allied health graduates who are knowledgeable in current practices and who will use innovative service policies.
- 7. To provide educated allied health professionals for the delivery of quality health care to the TTUHSC service area.
- 8. To facilitate health-care services by providiani and h

### **OUR HISTORY**

Science in Molecular Pathology and a Doctor of Science in Physical Therapy. The bachelor's degree in EMS Management has recently merged with the bachelor's degree in Clinical Support Services Management. With the addition and changes of its programs, the School of Allied Health Sciences continues to grow and diversify.

### PROGRAM STRUCTURE

The general format for TTUHSC, School of Allied Health Sciences programs vary. Please refer to specific program descriptions for requirements.

### TRANSFER OF CREDITS

The School of Allied Health Sciences will accept transfer hours from fully accredited U.S. two-year colleges and universities. The School traditionally accepts 66 transfer hours; however, additional hours may be accepted upon program approval.

### APPLYING FOR ADMISSION

Students admitted to Texas Tech University should not consider themselves also admitted to the School of Allied Health Sciences. For admission to any School of Allied Health Sciences program, an application must be made directly to the School of Allied Health Sciences Admissions Office. Each program has its own applicant pool, from which the most qualified students are chosen for an admission review. Those students who best meet the stated qualifications and prerequisites of the individual programs will be accepted as students of TTUHSC and the School of Allied Health Sciences. Students who successfully complete the program will receive one of the following degrees from the Texas Tech University Health Sciences Center: a Bachelor of Science in Clinical Laboratory Science, Speech, Language and Hearing Sciences or Clinical Support Services Management; a Master of Athletic Training, a Master of Science in Speech-Language Pathology, a Master of Science in Molecular Pathology, a Master of Occupational Therapy, a Master of

### WHAT MUST BE DONE TO QUALIFY FOR ADMISSION

A student who wishes to enroll in the School of Allied Health Sciences must fulfill the general admissions criteria contained in this catalog, as well as the specific criteria of each department. Information or applications to any Allied Health program may be accessed via the Texas Tech University Health Sciences Center, School of Allied Health Sciences website at www.ttuhsc.edu/pages/sah.

### WHAT IS EXPECTED OF THE ALLIED HEALTH STUDENT

Students studying in the School of Allied Health Sciences must complete the professional curriculum within the prescribed school and departmental academic and calendar guidelines. Allied Health students are required to observe departmental, school, and institutional regulations and requirements. Allied Health students are expected to maintain a professional attitude toward the patients to whom they will provide health care, and toward the colleagues with whom they learn and work. Class attendance in Allied Health programs is mandatory. Only the specific course instructor can excuse absences. Other policies concerning departmental expectations of Allied Health students are contained in the student handbooks of the respective departments. Students will be held responsible for both the information contained in this catalog and in the departmental handbooks. In addition, students are expected to abide by all stated school or departmental policies and regulations.

#### STUDENT ORGANIZATIONS

TTUHSC and the School of Allied Health Sciences offer a variety of student organizations. The School of Allied Health Sciences sponsors a chapter of *Alpha Eta*, the national honorary society in Allied Health, for students of the school who have distinguished themselves academically.

Each department within the School of Allied Health Sciences has a student group organized for student support and participation in professional activities specific to the department. These organizations are: *Pi Theta Epsilon Honorary; Student Occupational Therapy Association (SOTA); Student Physical Therapy Association (SPTA); Clinical Laboratory Science Student Association (CLSSA); National Student Speech-Language Hearing Association (NSSLHA); and the National Association for Doctors of Audiology (NAFDA).* For more information concerning organizations open to students at TTUHSC, contact the Office of Student Services.

For registration of a new organization please contact the TTUHSC Student Services Office.

### STUDENT LIABILITY

An essential part of allied health education is the clinical experience. Students in all three departments of the School of Allied Health Sciences are placed in clinical settings outside the institution. Because allied health students will practice patient care under the supervision of graduate professionals, students are required to purchase liability insurance coverage. A nominal yearly charge is included in student fees paid at registration.

### STUDENT HEALTH SERVICE

Students who pay the Medical Services Fee and are enrolled in the School of Allied Health Sciences are eligible to receive health care through the Department of Family Medicine at TTUHSC. However, services may vary from campus to campus. Information concerning student health services can be obtained from the TTUHSC Student Services Office.

#### STUDENT HOSPITALIZATION INSURANCE COVERAGE

Students are required to have adequate medical/hospitalization insurance coverage while enrolled as a student in the School of Allied Health Sciences. It is the student's responsibility to obtain and maintain medical/hospitalization insurance through the provider of their choice. TTUHSC offers such coverage. Students should contact the TTUHSC Student Services Office for details.

### IMMUNIZATIONS

Students in the School of Allied Health Sciences born on or after January 1, 1957, must have had the following immunizations:

Tetanus-Diphtheria (within 10 years of matriculation date) Oral Trivalent Polio (at anytime in the past) Measles-Mumps-Rubella (since 1980) Hepatitis B PPD-TB Skin Test (within 1 year of matriculation date, must be renewed annually) Varicella Titer

It is the student's responsibility to obtain and maintain proof of all required immunizations. The cost of all immunizations is also the student's responsibility.

### LEAVE OF ABSENCE

In extreme circumstances it may be necessary for a student to be absent from class for an extended

### STUDENTS WITH DISABILITIES

It is the policy of the School of Allied Health Sciences to conduct educational programs in a place and manner accessible to individuals with disabilities, and to make reasonable modifications and accommodations necessary to achieve this purpose. Students who need special accommodations should be proactive and contact TTUHSC Student Services immediately after accepting a class position. The student will be asked to complete an application requesting accommodation and to supply documentation necessary to support the application.

### STUDENT RECORDS

The School of Allied Health Sciences conforms to the guidelines set forth in the Family Educational Rights and Privacy Act of 1974, and the Texas Open Records Act. Students may limit public availability of personal and demographic information by making this request to the TTUHSC Registrar.

### STUDENT DEBTS

The School of Allied Health Sciences and TTUHSC will not be responsible for debts incurred by students or student organizations, nor will the School or TTUHSC assume the roles of collecting student debts or serve as arbitrator between students and creditors.

### **CHANGE OF ADDRESS**

Students are required to maintain current contact information by submitting changes at www.techsis.admin.ttu.edu/student/. All correspondence, including financial aid refund checks, will be mailed to the address provided by the student.

# GENERAL ADMISSIONS POLICIES AND REQUIREMENTS

### APPLICANTS TO THE PROFESSIONAL PROGRAMS

Applicants to the professional programs must have completed all prerequisite courses and met all other conditions of admission before entering the first professional program course. Acceptable minimum grade point averages vary with department and are stated in the appropriate section of this catalog. A personal interview may be required of each applicant.

#### PREREQUISITE COURSE CREDITS

All questions of course acceptability must be referred to the academic advisors in the Office of Admissions and Student Affairs. All college level, nonvocational courses completed at regionally accredited colleges and universities (not including trade or technical schools) will be evaluated for acceptance of prerequisite course credit by the Office of Admissions and Student Affairs. In general, credit hours with a grade of C or higher will be accepted. However, evaluation of specific courses is required and decisions made by the program are final. Each student will be notified of acceptance of prerequisite courses. If the required science courses were completed seven or more years prior to admission into the School of Allied Health Sciences, the student may be required to retake courses.

### READMISSION

A former student who seeks to be readmitted to a program in the School of Allied Health Sciences must have withdrawn in good academic standing and meet all current admissions and degree requirements for the semester of readmission.

### CREDIT BY EXAMINATION FOR PREREQUISITE COURSES

The School of Allied Health Sciences encourages students to use previous learning experiences. Students will be given the opportunity to receive credit by examination in courses where proficiency may be determined by examination. Students may demonstrate proficiency in certain subject areas through various programs. A grade of Pass (P) will be given on the examination, but the grade will not be considered in determining grade-point averages. Course credit earned by examination is recorded by the TTUHSC Registrar on the student's transcript. Course credit by examination may not be used to satisfy the 30-hour minimum residence credit requirement for graduation. Credit by examination must be completed before the course begins or within the first twelve class days of the course. Credit by examination does not waive tuition and fees for the course.

A student may earn prerequisite course credit by examination by three separate programs. These include:

- 1. Specified College Entrance Examination Board (CEEB) Achievement Tests
- 2. CEEB Advanced Placement Examinations, which are part of the Advanced Placement programs (AP) available in a li

the Testing and Evaluation Division at Texas Tech University. It is the student's responsibility to request that his or her CEEB test scores be sent to the School of Allied Health Sciences. Information concerning each of the testing programs follows.

### Credit for CEEB Achievement Tests

The CEEB achievement tests are part of the CEEB Admissions Testing Program. Each year there are several national administrations of the CEEB Achievement Tests. Students should plan to take the specified tests at national testing centers during their senior year of high school at an early testing date in order that scores may be reported by June. In addition to the national administration,

### APPLICANT POOL

Applicants will be considered for admission only when completed application forms and appropriate supporting documents have been received. All applicants are carefully evaluated by the respective program admissions committees concerning qualifications and potential for successful completion of a professional curricu

### FINANCIAL INFORMATION

#### **Financial Aid**

Grants and loans are available through the TTUHSC Financial Aid Office. All students interested in receiving grants and/or loans must complete a Free Application for Federal Student Aid (FAFSA) and send it to the TTUHSC Financial Aid Office. On-line FAFSA applications are available at www.FAFSA.ED.GOV.

NOTE: Financial aid award letters to other colleges and universities, including TTU, are not transferable to TTUHSC. Separate financial aid applications are required for TTUHSC. For further information regarding financial aid, please contact:

TTUHSC Financial Aid Office 3601 – 4<sup>th</sup> Street, Suite 3B310 Lubbock, TX 79430 806-743-3025

### Scholarships

The School of Allied Health Sciences has scholarships dedicated to currently enrolled students. In addition, there are general scholarships funded by private foundations and organizations. Scholarships are administered by the Office of Admissions and Student Affairs.

Scholarships given to incoming students will be based on the admissions application including all information that is provided by that application and the application process (i.e. grade point average, GRE scores (if applicable), interview, written essay, extracurricular/volunteer activities.)

### **TUITION and FEES**

Texas Tech University Health Sciences Center reserves the right, without notice in this catalog, to amend, add to, or otherwise alter any or all fees, rates or other charges set forth herein by action of the Board of Regents of Texas Tech University or the Texas State Legislature, as the case may be.

Texas residents will be charged tuition at a rate of \$92 per semester credit hour. Non-resident and foreign students will be charged tuition at a rate of \$359 per semester credit hour. Students enrolled in the graduate masters programs in Speech-Language Pathology and Molecular Pathology will be charged an additional \$23 per semester credit hour. Students enrolled in the graduate doctoral programs in Audiology and Physical Therapy will be charged an additional \$46 per semester credit hours.

To be granted status as a resident of Texas for educational purposes, proper documentation must be on file in the Office of Admissions. Each student will be required to complete a written residency oath upon applying. For detailed information regarding residency status, contact the TTUHSC, Office of the Registrar.

### DEPARTMENT OF SPEECH, LANGUAGE AND HEARING SCIENCES

The department sponsors chapters of the National Student Speech-Language-Hearing Association and the National Association of Future Doctors of Audiology. Besides numerous community fundraising events and scholarship drives, the student organizations conduct annual conferences which attract professionals from throughout the Southwest. Locally and nationally recognized speakers spend time with students and other professionals discussing current topics in communication disorders and sciences.

The Speech-Language and Hearing Clinic serves as the primary clinical practica site for students in the department. Under direct faculty supervision, students provide clinical services to people in the local community, Texas Tech University and TTUHSC, as well as the entire West Texas area. Additional practica sites are available through an externship program in hospitals, schools, rehabilitation institutes, private practices, and governmental offices.

Financial assistance may be available from the Office of Financial Aid at TTUHSC. The Department of Speech, Language and Hearing Sciences also offers limited financial assistance to highly qualified students on the basis of scholarship. Students interested in financial assistance through the department should file their requests after they have been accepted to the program.

# UNDERGRADUATE PROGRAM IN SPEECH, LANGUAGE AND HEARING SCIENCES

# SPEECH, LANGUAGE AND HEARING SCIENCES CURRICULUM: UNDERGRADUATE

The following are the departmental course requirements. A cademic policies regarding minimum grade performance are cited in the Student Handbook.

### EXAMPLE UNDERGRADUATE PROGRAM

### FIRST YEAR

Fall Semester	Course	Credit Hours
AHSL 3219	Supervised Observation Lab: AUD	2
AHSL 3220	Supervised Observation Lab: SLP	2
AHSL 3327	Phonetics	3
AHSL 3522	Anatomy & Physiology	5
		Total hours = 12
Spring Semester	Course	<b>Credit Hours</b>
AHSL 3221	Clinical Methods in CD	2
AHSL 3421	Speech and Hearing Science	4
AHSL 3323	Language Development	3
AHSL 3442	Clinical Audiology	4
		Total hours = 13

#### SECOND YEAR

AHSL 4427

Fall Semester	Course	Credit Hours
AHSL 3324	Language Disorders	3
AHSL 3325	Fluency Disorders	3
AHSL 4380/90	Clinical Practicum: SLP/Audiology	3
AHSL 4344	Multicultural Issues	3
AHSL 3426	Articulation & Phonological Disorders	4
	-	Total hours = 16
Spring Semester	Course	<b>Credit Hours</b>
AHSL 4426	Neural Bases of Speech & Language Disorders	4
AHSL 4380/90	Clinical Practicum: SLP/Audiology	3
AHSL 4410	Basic Sign Language for the Health Professions	4

#### COURSE DESCRIPTIONS: UNDERGRADUATE CURRICULUM

AHSL 3219 Supervised Observation Laboratory: AUD (2:2:0) A supervised observation of various audiometric procedures and patient types. Discussion of clinical protocols, assessment, and management for individuals with hearing disorders.

Assessment Procedures in Speech-Language Pathology

nology 4 Total hours = 15

AHSL 3220 Supervised Observation Laboratory: SLP (2:2:0) A supervised observation of clinical assessment and management of individuals with speech and language disorders. May be repeated for credit.

AHSL 3221 Clinical Methods (2:2:0) A review of clinical methodologies used in speech-language pathology and audiology, including specific clinical activities, report writing, and professional development.

AHSL 3320 Introduction to Communication Disorders (3:3:0) An overview of communication disorders which can affect children and adults. The impact of these disorders on an individual's psychological, social, emotional, cultural, and educational status will be discussed.

AHSL 3323 Language Development (3:3:0) An introduction to current theories of language and language development, including methods of obtaining and analyzing language samples.

AHSL 3324 Language Disorders (3:3:0) An emphasis on language disorders in children. Topics include the nature and etiologies of language disorders, with an overview of the principles of assessment and treatment.

AHSL 3325 Fluency Disorders (3:3:0) An extensive review of current information on fluency disorders in children and adults, including clinical assessment and management strategies.

AHSL 3327 Phonetics (3:3:0) An introduction to production and classification of speech sounds; principles and theories of phonetics; emphasis on development of clinical transcription skills.

AHSL 3421 Speech and Hearing Science (3:3:0) An introduction to the physics of sound, speech acoustics, speech perception, and psychoacoustics.

AHSL 3426 Phonetics/Articulation and Phonological Disorders (4:3:1) The basic principles of assessment and treatment for children and adults with phonological and articulatory disorders. Includes lab for practice of advanced clinical transcription skills.

AHSL 3442 Clinical Audiology (4:3:1) An introduction to hearing assessment techniques and auditory disorders, with adaptation of testing for special populations such as infants, geriatrics, and different language backgrounds. The student will gain proficiency with pure-tone, speech, and impedance testing techniques.

AHSL 3522 Anatomy & Physiology (5:5:0) A study of the anatomical and physiological aspects of speech and hearing in both normal and clinical populations.

AHSL 4300 Senior Research Project (3) An individual study of a specific problem in one of the areas of speech, language or hearing disorders. Students are required, in advance of registration, to consult with the instructor and secure approval of the specific project to be pursued.

AHSL 4344 Multicultural Issues in Communication Disorders (3:3:0) Assessment and management of communication disorders in culturally and linguistically diverse populations. Topics include typical and disordered communication, and perspectives on clinical, theoretical, and research implications.

AHSL 4380 Clinical Practicum: SLP (3) A supervised clinical experience in case management. May be repeated for credit.

AHSL 4390 Clinical Practicum: Audiology (3) A supervised clinical experience in case management. May be repeated for credit.

AHSL 4410 Basic Sign Language for the Health Professions (4:4:0) An intensive, introductory course in American Sign Language. Issues related to deaf culture and the use of signs in health care settings will be discussed.

AHSL 4426 Neural Bases of Speech and Language (4:3:1) An exposure to neuroanatomy and neurophysiology through individualized and interactive learning. This course provides strong foundations for future graduate courses in aphasia and motor speech disorders, as well as an understanding of neuroanatomy, neurophysiology, and neuropathologies of speech and language.

AHSL 4427 Assessment Procedures in Speech-Language Pathology (4:3:1) The development of competencies in the selection, use, and interpretation of a wide range of speech and language assessment procedures for children and adults from diverse etiologic, cultural, and ethnic groups.

AHSL 4446 Diagnostic Audiology (4:3:1) This course will present advanced diagnostic techniques for children and adults including those from diverse populations or with special needs.

### GRADUATE PROGRAMS IN SPEECH, LANGUAGE AND HEARING SCIENCES

### **Program in Speech-Language Pathology**

### ADMISSION TO THE SPEECH-LANGUAGE PATHOLOGY PROGRAM

Professional education includes two years of study beyond the baccalaureate level. The application deadline is March 1 prior to the summer/fall semester in which classes begin. Class enrollment is limited each year. Admission requires (1) filing of a formal application for graduate admission, (2) a cumulative GPA of 3.0 on a 4.0 scale, (3) a GPA of 3.0 on a 4.0 scale in audiology and speech pathology courses, (4) demonstration of superior oral and written communication skills, (5) completion of a personal interview with the Admissions Committee, (6) above-average scores on the verbal, quantitative, and analytical subtests of the GRE, (7) proof of appropriate immunizations against infectious diseases, and (8) an earned baccalaureate degree or its equivalent in the area of speech, language and hearing sciences from an accredited institution. Applicants who have earned undergraduate degrees in fields other than speech, language and hearing sciences may apply to the graduate program, but must take one year (two semesters) of leveling course work. Students may take the leveling courses and then apply to the graduate program, or apply and be accepted to the graduate program and complete the leveling courses before beginning graduate studies. Provisional admission may be offered to applicants with a GPA of less than 3.0. Such applications will be reviewed on an individual basis. Students are required to adhere to all policies as outlined by the Department of Speech, Language and Hearing Sciences, the School of Allied Health Sciences and Texas Tech University Health Sciences Center. St ref - 3, 5 () 6, 04 t

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Spring Semester	Course	Credit Hours
AHSL 5100	Foundations	1
AHSL 5325	Childhood Speech Disorders	3
AHSL 5328	Seminar in Voice Disorders	3
AHSL 5380	Graduate Clinical Practicum: SLP/AuD	3
or		
AHSL 5385	Internship in Speech Pathology	3
AHSL 5463	Adult Language Assessment & Intervention	4
AHSL 6000 (opt.)	Master's Thesis	3
		Total Hours = 14-17
Summer Semester	Course	Credit Hours
AHSL 5339	Research in Speech and Language Science	3
AHSL 5380 or	Graduate Clinical Practicum: SLP/Aud.	3
AHSL 5385	Internship in Speech Pathology	3
	(possible 6 weeks out-of-city placement)	
AHSL 6000 (opt.)	Master's Thesis	3
,		Total Hours = 6-9

### SECOND YEAR

Fall Semester	Course	Credit Hours
AHSL 5143	Aural Rehabilitation Lab	1
AHSL 5343	Aural Rehabilitation	3
AHSL 5466	Augmentative & Alternative Communication	4
AHSL 5380	Graduate Clinical Practicum: SLP/Aud.	3
or		
AHSL 5385	Internship in Speech Pathology	3
AHSL 5310	Special Topics in Speech-Language Pathology	3
or		
AHSL 6000	Master's Thesis	3
		Total Hours = 14
Spring Semester	Course	Credit Hours
AHSL 5310	Special Topics in Speech-Language Pathology	3
AHSL 5362	Motor Speech Disorders	3
AHSL 5380/90	Graduate Clinical Practicum: SLP/Aud.	3
or		
AHSL 5385	Internship in Speech Pathology	3
AHSL 6000 (opt.)	Master's Thesis	3
		Total Hours = 9-12

### COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHSL 5100 Foundations (1:1:0) A forum for the discussion of professional issues in communication disorders. May be repeated for credit.

AHSL 5010 Independent Study. A variable credit course used for individualized leveling plans created by the program director.

AHSL 5310 Special Topics in Speech Pathology (3:3:0) Directed study for non-thesis candidates. May be repeated for credit.

AHSL 5320 Research Design (3:3:0) A summary of the basic concepts of science and research. Emphasis is placed on the nature of experimental designs and basic inferential statistical analyses, and the application of relevant research methodologies in clinical settings.

AHSL 5323 Language Development (3:3:0) A study of contemporary literature on first language acquisition. Includes examination of biological and cognitive substrates of language acquisition, relevant research methodologies, and atypical language development, with implications for language intervention.

AHSL 5325 Childhood Speech Disorders (3:3:0) Current approaches to assessment and management of pediatric speech disorders and developmental phonological disorders in special populations.

AHSL 5327 Clinical Neuroscience (3:3:0) Problem-solving, case study approach to the relationships between pathophysiology of the nervous system and clinical symptomatology as it relates to disorders of speech, language, cognition and swallowing.

AHSL 5328 Seminar in Voice Disorders (3:3:0) An advanced discussion of the etiology, diagnosis, and treatment of voice disorders.

AHSL 5329 Fluency Disorders (3:3:0) An extensive review of current information on fluency disorders in children and adults.

AHSL 5330 Dysphagia (3:3:0) A detailed study of the anatomy and physiology of normal and disordered swallowing patterns, with discussion of current diagnostic techniques and treatment alternatives.

AHSL 5339 Research in Speech and Language Science (3:3:0) This course is designed to prepare students for understanding and conducting research in speech and language science. Emphasis is placed on how to conduct a literature search and write a literature review. Students will learn how to present research findings at professional meetings, and how to apply research

AHSL 5424 Pediatric Language Assessment & Intervention (4:4:0) Comparison of typical and atypical language in children from infancy through adolescence. Assessment and management strategies for diverse populations, and varied service delivery models.

AHSL 5463 Adult Language Assessment & Intervention (4:3:1) Effects of normal aging on communication. Assessment and intervention models for acquired adult language disorders (e.g. aphasia, dementia, traumatic brain injury). Medical terminology and report writing will also be included.

AHSL 5466 Augmentative and Alt

### **Program in Audiology**

### **PROGRAM DESCRIPTION**

The program in Audiology at the Texas Tech University Health Sciences Center, which is accredited by the American Speech-Language-Hearing Association (ASHA), offers comprehensive academic, research and clinical experience in a wide variety of settings. A unique feature of the TTUHSC program is the diversity of the clinical and research experiences available. Students obtain clinical and/or research experience at: the TTUHSC Speech and Hearing Clinic, several community-based clinics, public school programs, local private practices, and other medical, rehabilitative, and educational facilities outside the Lubbock community. The Program also houses the Center for Functional Brain Mapping and Cortical Studies. The Center employs both electrophysiological and imaging methods to measure how the brain responds to sensory information. In these settings, students have the opportunity to explore state-of-the-art technology, instrumentation, and assessment/treatment procedures in Audiology and Communication Sciences.

The department also sponsors a chapter of the National Association of Future Doctors of Audiology (NAFDA). This national audiology student group sponsors several fund-raising events and a large regional conference that attracts professionals from throughout the Southwest. During these times, local and nationally recognized speakers spend individual time with the students discussing current clinical and research interests.

### ADMISSION TO THE DOCTOR OF AUDIOLOGY PROGRAM

Admission to the Doctor of Audiology (Au.D.) program is competitive and begins in March of each year for enrollment the following fall semester. Prospective students are urged to apply for admission as early as possible and to utilize the on-line application forms. Admission requirements include (1) filing of a formal application, (2) a cumulative GPA of 3.0 on a 4.0 scale, (3) a grade of "C" or better in all coursework in your undergraduate major, (4) submission of GRE test scores (including verbal, quantitative, analytical and writing sections) and (5) proof of appropriate immunizations against infectious diseases. Provisional admission may be offered to applicants with a GPA of less than 3.0. Such applications will be reviewed on an individual basis. Students are required to adhere to all policies as outlined by the Department of Speech, Language and Hearing Sciences, the School of Allied Health Sciences and the Texas Tech University Health Sciences Center. Students also have specific rights as outlined in the student handbook. Undergraduate majors in the sciences, particularly the life sciences, are recommended for entrance into the Au.D. program.

### FIRST YEAR

Fall Semester AHSL 7442 AHSL 7446 AHSL 7449	Course Psychoacoustics Advanced Clinical Audiology Auditory Neuroscience	Credit Hours 4 4 4 Total Hours = 12
Spring Semester AHSL 5320	Course Research Design	Credit Hours
AHSL 7321 AHSL 7450 AHSL 7544	Clinical Observation and Methods Pediatric Audiology Clinical Amplification	3 3 5 Total Hours = 14

Summer Semester AHSL 7364 AHSL 7390 SECOND YEAR	Course Electrophysiology I Clinical Practicum	Credit Hours 4 3 Total Hours = 7
Fall Semester AHSL 7348 AHSL 7365 AHSL 7390 AHSL 7445	Course Educational Audiology Electrophysiology II Clinical Practicum Advanced Clinical Amplification	Credit Hours 3 4 3 4 Total Hours = 14
Spring Semester AHSL 7322 AHSL 7351 AHSL 7352 AHSL 7390	Course Management Principles of Healthcare Clinics Counseling in Audiology Medical Aspects of Audiology Clinical Practicum	Credit Hours 3 3 3 3 Total Hours = 12
Summer Semester AHSL 7370 AHSL 7376 AHSL 7385 THIRD YEAR	Course Cochlear Implants Clinical Research Symposium Clinical Externship	Credit Hours 3 3 3 Total Hours = 9
Fall Semester AHSL 7347 AHSL 7373 AHSL 7375 AHSL 7385	Course Aural Rehabilitation Neuroaudiology Professional Issues in Audiology Clinical Externship	Credit Hours 3 3 3 3 Total Hours = 12
Spring Semester	Course	Credit Hours

Spring Semester AHSL 7000 AHSL 7385

Course Doctoral Research Seminar Clinical Externship Credit Hours 3 9 Total Hours = 12

COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHSL 5320 Research Design (3:3:0)

AHSL 7365 Electrophysiology II: Vestibular System (3:3:1) The second of a two-part sequence covering advanced measures of auditory and vestibular systems. Includes laboratory.

AHSL 7370 Cochlear Implants (3:3:0) Electrophysiology of implantable devices. Also includes processor strategies, and speech/language learning in prelingually deafened listeners.

AHSL 7373 Neuroaudiology (3:3:0) Focus on neuroanatomical and neurophsyiological principles underlying stimulus processing by the auditory system. Assessment and treatment strategies for neuroaudiological disorders, including adaptations of procedures for culturally diverse populations will be discussed.

AHSL 7375 Professional Issues in Audiology (3:3:0) Overview of the social, political, and economic climate in hearing health care delivery. Basic and advanced strategies for practice management and development. Interprofessional relationships and responsibilities. Supervision of other professionals.

AHSL 7376 Research Symposium (3:3:0) Seminar discussion on applied research techniques in the field of audiology. Emphasis is placed on analyzing research applied to patients across the lifespan.

AHSL 7379 Audiology Grand Rounds (3:3:0) Clinical analysis, diagnosis, and treatment of different cases. The focus of this course is to integrate clinical decision-making, diagnostic reasoning and treatment justification abilities to a variety of clinical presentations.

AHSL 7385 Externship in Audiology (3:3:0) Intensive supervised case management within an on-going clinic on or off the campus. May be repeated for credit.

AHSL 7390 Clinical Practicum (3:3:0) Supervised clinical practicum in audiology. May be repeated for credit.

AHSL 7442 Psychoacoustics (4:3:1) This course will present the physiological bases of auditory perception and the corresponding behavioral manifestations including higher-level cognitive and developmental aspects of speech perception. Includes laboratory.

AHSL 7445 Advanced Clinical Amplification (4:3:1) Advanced topics in clinical amplification including programmable instruments, digital processing and digital amplification, multimicrophone technology and other noise reduction systems will be presented.

AHSL 7446 Advanced Clinical Audiology (4:3:1) This course will present advanced diagnostic techniques for children and adults including those from diverse populations or with special needs.

AHSL 7449 Anatomy & Physiology of the Auditory System (4:3:1) Intensive and advanced study of recent developments in auditory-vestibular anatomy and physiology. Includes gross aspects of the temporal bone and cytoartchetectonics of the labyrinth. Laboratory exercises reinforce didactic material.

AHSL 7450 Pediatric Audiology (4:3:1) A study of behavioral and objective audiological evaluation, as well as the habilitation and rehabilitation, of infants and children. Also includes information on the fundamental basis of oto-acoustic emissions and its usage for testing infants and children.

AHSL 7544 Clinical Amplification (5:0:0) A comprehensive introduction of amplification devices, methods, and techniques. Consideration of special populations and their diverse needs will also be included.

## DEPARTMENT OF LABORATORY SCIENCE AND PRIMARY CARE

### **Program in Clinical Laboratory Science**

### PROGRAM DESCRIPTION

The clinical laboratory plays a major role in diagnostic medicine. Graduates of the Program in Clinical Laboratory Science (medical technology) analyze patient specimens for indications of disease. Results of these tests are used by the physician in confirming the patient diagnosis and in prescribing therapy. Academic preparation for a career in clinical laboratory science is a four-year baccalaureate degree, including a clinical preceptorship. Two years of prerequisite courses in chemistry, mathematics, biology, microbiology, and liberal arts precede a two-year professional component dealing specifically with clinical laboratory science. The professional program combines didactic instruction with student laboratory experience, followed by clinical practice in affiliated laboratories.

A student admitted into the Clinical Laboratory Science program must meet basic and essential requirements that are necessary to be able to obtain employment in the field of clinical laboratory medicine. The essential functions identified are the following:

- 1. Must be able to communicate effectively, in English, in the written and verbal form with colleagues, instructors, patients, and other members of the health care team.
- Must have the physical and motor function ability to observe, learn and implement various technical skills associated with the practice of clinical laboratory medicine such as: hand-eye coordination to operate specialized automated and technical equipment including a microscope, and manual dexterity associated with specimen collection, including venipuncture.
- Must have the intellectual and integrative abilities to measure, calculate, reason, analyze, evaluate and synthesize. This includes problem solving skills and interpretation of laboratory data.
- 4. Must have the maturity to readily accept the clinical preceptorships assigned by the clinical coordinator.
- 5. Must have basic computer and typing skills needed to complete assignments.

The TTUHSC Clinical Laboratory Science program culminates in the Bachelor of Science degree in Clinical Laboratory Science. Graduates of the program are eligible to sit for national certification examinations.

TTU Honors College students accepted into the CLS program may complete honors college credit in the School of Allied Health Sciences and graduate with the honors designation.

### SPECIAL FEATURES

Having completed the didactic study on campus, students rotate through the departments of the clinical laboratories affiliated with the program. This student preceptorship will be directed by education coordinators and supervised by teaching technologists. With careful supervision, students perform patient sample assays. Students also learn professionalism in

Sciences. Students accepted into the early admission program in the School of Allied Health Sciences are not automatically accepted into Texas Tech University, nor are students admitted to Texas Tech University automatically accepted into the School of Allied Health Sciences. Enrollment is concurrent. Students who are accepted into both Texas Tech University and TTUHSC are subject to all rules and regulations of both institutions.

Applicants should have a cumulative GPA of 3.0 overall in the required high school curriculum. Applicants should complete the written application form and supply official high school transcripts to the School of Allied Health Sciences Office of Admissions. Applications for admission may be submitted at any time before completing 15 semester hours of university or college credit.

Early-admit students must maintain regular contact with the program as specified by the director. All prerequisite coursework must be completed with an overall GPA of 2.5 on a 4.0 scale. Grades of C or better are necessary in each required preprofessional course. Early-admit students who do not meet these criteria are released from the early admissions candidacy and must reapply for the professional curriculum through the professional program.

### **Early Admission Requirements**

- 1. Graduation from an accredited high school or GED
- 2. High school credits in biology, chemistry, and advanced math, with a grade of A or B.
- 3. Acceptable scores on the SAT or ACT examinations.
- 4. Completed application package.

### PROFESSIONAL ADMISSION

Third year students (juniors) seeking admission must have the required number of semester hours of credit for admission. All courses must be completed prior to beginning the professional program. A personal interview is part of the admissions review.

### ADDITIONAL REQUIREMENTS

A minimum overall GPA of 2.5 on a 4.0 scale and a grade of C or better in each prerequisite course is required. GPA calculations are based on required courses. Provisional admission may be offered to applicants with a GPA of less than 2.5. Such applications will be reviewed on an individual basis.

### CLINICAL LABORATORY SCIENCE CURRICULUM

The courses listed below are the Texas Tech equivalent of the prerequisite courses required to apply for admission into the professional phase of the Clinical Laboratory Science program. Substitution of courses may be authorized by the Program Director.

### PREPROFESSIONAL CURRICULUM: STANDARD OPTION

### FIRST YEAR

Fall Sen	nester	Course	Credit Hours
CHEM	1307	Principles of Chemistry I	3
CHEM	1107	Principles of Chemistry Lab I	1
BIOL	1403	A&P or Biology I	4
MATH	1320	College Algebra	3
ENGL	1301	Essentials of College Rhetoric	3
		· ·	Total hours = 14

Spring Se CHEM CHEM ENGL BIOL *Elective SECOND	mester 1308 1108 1302 1404 YEAR	Course Principles of Chemistry II Principles of Chemistry II Lab Advanced College Rhetoric Biology II or A& P	Credit Hours 3 1 3 4 3 Total hours = 14
Fall Seme CHEM : CHEM : HIST : POLS * Elective * Elective	ester 2303 2103 2300 1301	Course Introduction to Organic Chemistry Introduction to Organic Chemistry Lab U.S. History to 1877 American Government Organization	Credit Hours 3 1 3 3 3 Total hours = 16
Spring Se MBIO HIST POLS Science El	emester 3401 2301 2302 lective	Course Principles of Microbiology U.S. History after 1877 American Public Policy	Credit Hours 4 3 3-4 Total hours 13 - 14

\* Electives must be one behavioral science, one humanities and one visual performing arts. Please see advisor.

### PRE-MED OPTION

The pre-med mentor program is designed to provide direction to students interested in attending medical school following the completion of a degree in clinical laboratory science. The primary
Spring Se	emester	Course	Credit Hours
CHEM	1308	Principles of Chemistry II	3
CHEM	1108	Principles of Chemistry II Lab	1
BIOL	1404	Biology II	4
ENGL	1302	Advanced College Rhetoric	3
* Elective		-	3
			Total hours = 14

Spring Semester	Course	Credit Hours
CHEM 1308	Principles of Chemistry II	3
CHEM 1108	Principles of Chemistry II Lab	1
ENGL 1302	Advanced College Rhetoric	3
BIOL 1404	Biology II	4
* Elective		3
* Elective		3
		Total hours = 17

#### SECOND YEAR

nester	Course	Credit Hours
2303	Organic Chemistry	3
2103	Organic Chemistry Lab	1
2300	U.S. History to 1877	3
1301	American Government Organization	3
2403	Anatomy & Physiology I	4
е		3
		Total hours = 17
Semester	Course	<b>Credit Hours</b>
2404	Anatomy & Physiology II	4
2302	American Public Policy	3
2301	U.S. History after 1877	3
3401	Principles of Microbiology	4
1325	Nutrition	3
		Total hours = 17
	Anester 2303 2103 2300 1301 2403 e Semester 2404 2302 2301 3401 1325	nesterCourse2303Organic Chemistry2103Organic Chemistry Lab2300U.S. History to 18771301American Government Organization2403Anatomy & Physiology IeSemester2404Anatomy & Physiology II2302American Public Policy2301U.S. History after 18773401Principles of Microbiology1325Nutrition

#### THRID YEAR

Summer Semester	Course	Credit Hours
* Elective		3
		Total hours = 3

Electives must be one behavioral science, one humanities and one visual performing arts. The other two electives should be behavioral sciences to fulfill the TTUHSC PA prerequisites. Please see advisor.

# PROFESSIONAL CURRICULUM: STANDARD, PRE-MED & PRE-PHYSICAN ASSISTANT OPTIONS

#### FIRST YEAR

Fall Sen	nester	Course	Credit Hours
AHMT	3110	Professional Issues in CLS	1
AHMT	3400	Clinical Chemistry I	4
AHMT	3405	Clinical Bacteriology I	4
AHMT	3455	Principles of Immunology	4
AHMT	3470	Hematology I	4
			Total hours = 17

Spring S	Semester	Course	Credit Hours
ÂĦMŤ	3450	Clinical Chemistry II	4
AHMT	3460	Clinical Bacteriology II	4
AHMT	3465	Immunohematology	4
AHMT	4480	Hematology II	4
			Total hours = 16
SECON	D YEAR		
Summer	r Semester	Course	Credit Hours
AHMT 4	4185	Clinical Correlations	1
AHMT 4	4305	Molecular Diagnostics	3
AHMT 4	4320	Laboratory Management	3
			Total hours = $7$
Fall Sen	nester *	Course	<b>Credit Hours</b>
AHMT 3	3310	Urinalysis/Body Fluids	3
AHMT 4	4300	Applied Statistics & Research	3
AHMT 4	1455	Parasitology/Mycology/Virology	4
AHMT 4	4640	Clinical Preceptorship I	6
* Classe	s for 13 weeks; Clin	ical preceptorship follow and continue through Spr	ing
			Total hours = 16
Spring S	Semester	Course	Credit Hours
AHMT 4	4105	Senior Seminar	1
AHMT 4	4741	Clinical Preceptorship II	7
AHMT 4	4842	Clinical Preceptorship III	8
			Total hours = 16
Total H	ours Required (Sta	ndard Option)	
Prerequi	sites		57-58
Profession	onal Curriculum		<u>72</u>
			129-130
Total H	ours Required (Pre	-Med Option)	
Prerequi	sites		70
Profession	onal Curriculum		<u>72</u>
			142
Total H	ours Required (Pre	-PA Option)	
Prerequi	sites		71
Profession	onal Curriculum		<u>72</u>
			143

During professional studies, students are required to adhere to all program policies and academic and behavioral guidelines as outlined in the Student Handbook and Clinical Preceptorship Manual.

#### COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHMT 3015 Special Problems in Clinical Laboratory Science (1-3) A study of a specific problem in clinical laboratory science under faculty direction.

AHMT 3110 Introduction to Clinical Laboratory Science (1:1:0) An overview and introduction to the profession.

AHMT 3310 Urinalysis and Body Fluids I (3:2:3) Analysis of the physical, chemical, and microscopic parameters of urine and body fluids. Special emphasis is placed on understanding kidney function and pathology.

AHMT 3400 Clinical Chemistry I (4:3:6) An introduction to the basic principles and methodologies of clinical chemistry.

AHMT 3405 Clinical Bacteriology I (4:3:6) Study of the isolation, cultivation, identification, and susceptibility testing of pathogenic bacteria. The taxonomy, physiology, and pathogenesis of medically important bacteria are covered.

AHMT 3450 Clinical Chemistry II (4:3:6) The qualitative and quantitative chemical analysis of

AHMT 4741 Clinical Preceptorship II An intermediate supervised clinical practicum in an affiliated clinical laboratory.

AHMT 4842 Clinical Preceptorship III An advanced supervised clinical practicum in an affiliated clinical laboratory.

**Program in Molecular Pathology** 

3.0. Such applications will be reviewed on an individual basis. Applications may be submitted at any time; however, applications must be received by March 1<sup>st</sup> to be considered for summer enrollment of that year. Coursework begins in the summer semester. All qualified candidates selected by the MSMP admissions committee will be invited for an on-campus interview.

#### PREREQUISITE REQUIREMENTS

• Graduate of a NAACLS accredited Clinical Laboratory Science Program (cumulative 3.0 GPA) or

•Graduate of a NAACLS accredited Clinical Laboratory Technician Program with a Bachelor's degree (cumulative 3.0 GPA) or

•Graduate of an accredited university with a Bachelor's degree in a science discipline which includes the following courses:

General Chemistry with lab		8 semester hours
Microbiology		4 semester hours
Biochemistry		3-4 semester hours
Cell Biology		4 semester hours
Anatomy & Physiology		4 semester hours
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College Algebr(c)colle4e(	degre-	6.5((c0)7(ysiolog)7(y)-6.4(

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AHMP 5101 Issues in Molecular Pathology II (1:1:0) Prerequisite: AHMP 5100. Basic business and management principles relative to laboratory management and administration will be presented.

AHMP 5102 Issues in Molecular Pathology III (1:1:0) Prerequisite: AHMP 5101. Graduate seminar. Presentation of graduate research projects.

AHMP 5300 Applied Statistics & Research (3:2:3) Introduction to descriptive, inferential, and non-parametric statistics related to basic and clinical science; introduction to the process of basic and clinical research and research design. Independent work on research project with application of statistical analyses to assigned project.

AHMP 5301 Survey of Laboratory Services (3:3:1) Survey of the clinical laboratory that includes common laboratory assays (Hematology, Clinical Chemistry, Microbiology, Transfusion Services, and Body Fluids) and addresses the purpose, function, and utilization of laboratory services. Sperocesatio discussed.

AHMP 5309 Diagnostic Molecular Pathology (3:3:0) Presentation of human genetic disease with a f(3)s on causative genetic alterati ons in neoplastic, immunologic, endocrine, viral, and infectious diseases. Prenatal diagnosis and carrier screening will be discussed. Independent case study presentabc1(tion r)7.6(e)-1.5(q)8(u)1.ad.red.

AHMP 5405 Applied Molecular Techniques I (4:3:6) Introduction to basic genetic testing

## **Program in Physician Assistant Studies**

Physician Assistants are skilled health care professionals who are academically and clinically prepared to practice medical skills with the supervision of a licensed physician. With physician

Prerequisite Course	Semester Hours
English	6
College Algebra	3
Biology	8
Microbiology	4
Anatomy and Physiology	8
General Chemistry	8
Social and Behavioral Sciences	9
Nutrition	3
Statistics	3
Electives	14
(Computer literacy, medical terminology, and communication	ion skills recommended)

#### PROFESSIONAL CURRICULUM

First Summer Semester	Course	<b>Credit Hours</b>
AHPA 5101	Introduction to PA Profession	1
AHPA 5202	Introduction to Pharmacology	2
AHPA 5301	Clinical Laboratory	3
AHPA 5406	Physiology	4
AHPA 5501	Anatomy	5
		Total Hours = 15
First Fall Semester	Course	Credit hours
AHPA 5302	Physical Examination I	3
AHPA 5305	Clinical Methods & Approach	3
AHPA 5310	Medical Interviewing	3
AHPA 5405	Pharmacotherapeutics	4
AHPA 5407	Pathology	4
	0.	Total Hours = 17
First Spring Semester	Course	<b>Credit Hours</b>
AHPA 5303	Physical Examination II	3
AHPA 5304	Medical Psychology	3
AHPA 5308	Neuroscience	3
AHPA 5403	Clinical Medicine I	4
AHPA 5404	Clinical Medicine II	4
		Total Hours = 17
Second Summer Semester	Course	<b>Credit Hours</b>
AHPA 6201	Medical Ethics & Jurisprudence	2
AHPA 6301	Preventive Medicine & Community Health	3
AHPA 6303	Introduction to Clerkship	3
AHPA 6402	Clinical Medicine III	4
AHPA 6403	Health Care Management	4
		Total Hours = 16

Second Fall, Second Spring, Third Summer Semsters - Clinical Study (6 week rotations)			
	Course	Credit Hours	
AHPA 6601	Family Medicine Clerkship	6	
AHPA 6602	Internal Medicine Clerkship	6	
AHPA 6603	Prenatal Care & Gynecology Clerkship	6	
AHPA 6604	Pediatric Clerkship	6	
AHPA 6605	Emergency Medicine Clerkship	6	
AHPA 6606	Geriatric Clerkship	6	
AHPA 6607	Psychiatry Clerkship	6	
AHPA 6608	Surgery Clerkship	6	
		Total Hours = 48	
<b>Third Summer Semester</b> AHPA 6404	Course Master Project Track	Credit Hours 4	
		10  ar Hours = 4	

#### COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHPA 5101 Introduction to the Physician Assistant Profession (1:1:0) This lecture series explores the role and socialization of the physician assistant as a health care professional. The course will discuss the history of the profession, the evolution of the physician – PA team, maintenance of professional credentials, practice issues and future trends.

AHPA 5202 Introduction to Pharmacology (2:2:0) This is a lecture series that introduces the actions of basic pharmacologic agents in the human. The mechanism of action, principal actions and adverse reactions of conventional classes of drugs is examined. This course will review fundamental pharmacology calculations, measurements and symbols

AHPA 5301 Clinical Laboratory (3:3:0) This lecture series describes the significance and interpretation of laboratory studies routinely referred to in the clinical setting. Concepts of microbiology and infectious disease will be examined. This is a distance-learning course taught by interactive teleconferencing from the TTUHSC campus in Lubbock.

AHPA 5302 Physical Examination I (3:2:2) This is a lecture-laboratory series in which the adult physical examination is demonstrated and practiced. Students will learn and apply the techniques of a comprehensive physical examination with the proper use of diagnostic instruments. The laboratory experience utilizes simulated patients.

AHPA 5303 Physical Examination II (3:2:2) This is a lecture-laboratory series that is an extension of AHPA 5302 – *Physical Examination I* The technique of the physical examination of the pediatric patient, geriatric patient and trauma patient is practiced. Integrating the medical history (learned in AHPA 5310 applyIca

AHPA 6201 Medical Ethics & Jurisprudence (2:2:0) This is a lecture series that examines prominent ethical issues in health care delivery. Students will be engaged in discussion of ethical dilemmas relevant to clinical practice and the unique relationship of the physician and physician assistant. The course will also examine practice statues and rules regulating physician assistant practice in Texas.

AHPA 6301 Preventive Medicine & Community Health (3:3:0) This is a lecture series that explores preventable disease and resources for health maintenance and risk factor reduction within the community. The course will consider communicable disease, acute disease, chronic disease, environmental health, occupational medicine and epidemiology.

AHPA 6303 Introduction to Clerkship (3:3:0) This is a lecture series that prepares the student for clinical clerkships. Discussions will address appropriate protocol, behavior and dress within the clinical setting. Weekly workshops will enable the student to learn and perform procedures that are essential to clinical practice.

AHPA 6402 Clinical Medicine III (4:4:0) This is a lecture series that explores specialized and

## DEPARTMENT OF REHABILITATION SCIENCES

## **Program in Clinical Support Services Management**

The objective of this program is to expand educational access to graduates of community college technical programs in allied health disciplines who frequently find themselves blocked from advancement educationally and professionally because of the technical emphasis in their Associate

Core Curriculum Requirements include:

English	6 hours
History	6 hours
Math	3 hours
Political Science	6 hours
Humanities	3 hours
Natural Science	6 hours
Social Science	3 hours
Visual & Performing Arts	3 hours
Core Curriculum Electives	6 hours

#### THE APPLICATION PROCESS

Applications may be submitted at any time. It is in the best interest of the applicant to apply as early as possible prior to the semester in which the applicant plans to begin.

All application materials should be sent to the Texas Tech University Health Sciences Center, Office of the Registrar, 3601 4<sup>th</sup> Street, Stop 8310, Lubbock, Texas 79430.

#### COURSEWORK

The program consists of 54 semester credit hours of upper-level undergraduate courses. Courses will rotate and students will register as they appear each semester. Students will select courses from their degree plan and register each semester to complete the 120 hour degree plan objective. The program requires the completion of all required core courses prior to enrollment in the advanced management courses and electives.

#### **Required Core Courses:**

AHCM 4301 Introduction to Healthcare Management AHCM 4302 Financial Management for Clinical Supervisors AHCM 4303 Principles of Personnel Management for Clinical Supervisors AHCM 4304 Management of Clinical Support Services in Healthcare Organizations AHCM 4306 Marketing Principles and Entrepreneurship

Required Advanced Management Courses: AHCM 4307 Material Management for Clinical Supervisors AHCM 4311 The U.S. Health Care System AHCM 4313 Community Health Issues AHCM 4314 Quality Assurance/Risk Management AHCM 4331 Leadership in Healthcare Organizations AHCM 4401 Healthcare Management Information Systems AHCM 4477 Case Study – Summer I AHCM 4478 Case Study – Summer II

Elective Courses: (Students must complete any four of the following) AHCM 4305 Capital Project Design AHCM 4312 Foundations of Managed Care AHCM 4315 Issues in Gerontology for Healthcare Managers AHCM 4316 Integrated Deliver Systems and Organizational Relationships AHCM 4352 Exercise Science and Sports Medicine Management AHCM 4354 Rehabilitation Counseling Policy and Practice AHCM 4360 Special Topics AHCM 4361 Special Topics Emergency Medial Services (EMS) track available as electives: AHEM 3300 EMS in Healthcare System AHEM 4310 EMS Operation Management AHEM 4320 Healthcare Communications and Systems Management AHEM 4330 Mass Casualty and Disaster Response in Healthcare

#### COURSE DESCRIPTIONS

AHCM 4301 Introduction to Healthcare Management (3:3:0) The course will review basic healthcare management principles and study the roles and functions of contemporary healthcare managers. Topics include healthcare organizational theory and behavior, motivation, leadership, budgeting processes, information systems, and management control systems.

AHCM 4302 Financial Management for Clinical Supervisors (3:3:0) Examines the basic principles of financial management related to clinical support activities. Topics will include healthcare accounting systems, revenue planning, cost accounting, departmental budgeting, resource management allocation, and reimbursement programs that are common to the clinical support service setting.

AHCM 4303 Principles of Personnel Management for Clinical Supervisors (3:3:0) Provides an overview of interpersonal dynamics, conflict resolution, and supervisor responsibilities. Topics include task analysis, developing position descriptions, recruiting, employee supervision, labor law, benefit programs, and personnel contracts. Includes a review of case studies that demonstrate the impact of the human resource functions in healthcare organizations.

AHCM 4304 Management of Clinical Support Services in Healthcare Organizations (3:3:0) Provides an overview of operations management and practical decision-making by analyzing the day-to-day operations in clinical support service activities. Identification of problem solving approaches to problems in personnel staffing, personnel training and directing, performance measurement, patient flow, facility configuration, financial and inventory control.

AHCM 4305 Capital Project Design (3:3:0) Methods for management of capital projects. Topics include financial considerations, procurement, site preparation, contracting, scheduling, and acceptance for operational readiness.

AHCM 4306 Marketing Principles and Entrepreneurship for Healthcare Professionals (3:3:0) The course covers the principles of marketing and their application in healthcare delivery systems. Topics include the concepts and tools to conduct a community needs assessment, market research, and creation of a business plan for the delivery of healthcare services.

AHCM 4307 Materiel Management for Clinical Supervisors (3:3:0) An overview of identifying materiel requirements for a clinical support service activity, commercial sources, procurement, tendering contracts, and inventory management controls. Topics include the establishment of policies and procedures, internal controls, property book inventory, repair and replacement of capital equipment and negotiation and development of contracts including a legal review.

AHCM 4311 The U.S. Healthcare System (3:3:0) A review of the healthcare system, both public and private sector. Examines the system's organizational structures and the legislative, legal, and market impacts upon the current integrated delivery system. The course will review all levels such as healthcare systems (For–Profit and Not-For–Profit), inpatient facilities, hospital based services, outpatient services, home health agencies, sub-acute care facilities, and I

AHCM 4360, 4361 Special Topics (3:3:0) Guided independent research projects with focus upon a management problem in the clinical support service setting. Examples are assistive technology, early childhood intervention, grant writing, independent living centers, or rehabilitation services.

AHCM 4401 Healthcare Management Information Systems (4:4:0) A course in the basic concepts and the tools for collecting and analyzing data used by healthcare organizations. Topics include an overview of current desktop comput

### **Program in Athletic Training**

An Athletic Trainer is "an educated and skilled professional specializing in the prevention, treatment, and rehabilitation of injuries common to participation in sport activities" as described by the National Athletic Trainers' Association (NATA). Athletic Trainers are integral members of the health care team, working in cooperation with physicians and other allied health personnel in settings such as secondary schools, colleges and universities, sports medicine clinics, professional sports programs, industrial settings and other healthcare environments.

The American Medical Association recognized athletic training as an allied health profession in 1990. As it has evolved into its present position as a recognized allied health profession, Athletic Training has undergone major educational reform.

After graduating from an accredited professional education program, athletic trainers must pass the National Athletic Trainers' Association Board of Certification (NATABOC) certification exam to practice athletic training in all states except Texas. In order to legally practice athletic training in Texas individuals must pass the Te

All application materials should be sent to the School of Allied Health Sciences, Office of Admissions and Student A

#### FIRST YEAR

Summer Semester	Course	Credit Hours
AHAT 5122	Introduction to Clinical Education	1
AHAT 5200	Research Methods in Athletic Training	2
AHAT 5204	Principles of Kinesiology	2
AHAT 5500	Human Anatomy	5
	-	Total Hours = 10
Fall Semester	Course	<b>Credit Hours</b>
AHAT 5201	Clinical Rotation I	2
AHAT 5202	Management & Prevention of Injuries	2
AHAT 5205	Research Methods II	2
AHAT 5305	Clinical Kinesiology	3
AHAT 5505	Patient Evaluation & Management I	5
	-	Total Hours = 14
Spring Semester	Course	<b>Credit Hours</b>
AHAT 5206	Clinical Rotation II	2
AHAT 5208	Management of Acute Injuries	2
AHAT 5304	Special Topics in Athletic Training	3
AHAT 5506	Patient Evaluation & Management II	5
	-	Total Hours = 12

#### SECOND YEAR

Summer Semester

AHAT 5120

AHAT 5220 AHAT 5099

Course	Credit Hours
Research Directed Study I	1
Musculoskeletal Evaluation & Management I	2
Independent Study (Optional)	2
· · · · · ·	Total Hours = 3-5

# AHAT 5220

During professional studies, students are required to adhere to all university, school, department, and program policies including academic and behavioral guidelines as stated in this catalog and the Department of Rehabilitation Sciences Student Handbook. Expenses incurred on clinical rotations are the responsibility of the student.

COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHAT 5098 Practicum in Athletic Training.

AHAT 5206 Clinical Rotation II (2:0:6) A supervised educational experience in athletic training under the supervision of a certified athletic trainer. The objective is to obtain hands-on experiences in a variety of athletic training settings including intercollegiate, high school, and clinical/industrial.

AHAT 5208 Management of Acute Injuries (2:1:3) An advanced athletic training course covering pathomechanics of athletic injuries. Comprehensive analysis of liability risk factors and practical considerations in development of sports emergency care plans, implementation of emergency procedures, and initial injury management. Laboratory practice in selected emergency care techniques.

AHAT 5220 Musculoskeletal Evaluation and Management I (2:1:3) Theory, principles, clinical applications and literature review associated with athletic training evaluation, assessment, and management of musculoskeletal conditions within the upper extremity.

AHAT 5223 Special Populations and Concerns for the Athletic Trainer (2:2:0) Examination and discussion of issues related to sports nutrition and the physiological demands of exercise. Survey of injury and illness risk factors associated with sports participation by the preadolescent/adolescent, geriatric, disabled, male, and female athlete.

AHAT 5224 Management/Identification of General Medical Conditions (2:2:0) Study of the etiology, pathology, and clinical manifestations of common illnesses, infectious diseases, and dermatological conditions in athletic populations.

AHAT 5225 Clinical Rotation III (2:0:6) A supervised educational experience in athletic training under the supervision of a certified athletic trainer. The objective is to obtain hands-on experiences in a variety of athletic training settings including intercollegiate, high school, and clinical/industrial.

AHAT 5227 Current Medical Diagnosis and Treatment I (2:2:0) Physician presentation of the medical approach to the management of musculoskeletal disorders and afflictions. Course content includes etilogy, differential diagnosis, prognosis, medical and surgical management, and prophylactic measures for each condition relevant to athletic training.

AHAT 5228 Clinical Rotation IV (2:0:6) A supervised educational experience in athletic training under the supervision of a certified athletic trainer. The objective is to obtain hands-on experiences in a variety of athletic training settings including intercollegiate, high school, and clinical/industrial.

AHAT 5304 Special Topics in Athletic Training (3:3:0) This course will cover topics such as cell biology, psychosocial concerns, and pharmacology as they relate to the athletic training profession.

AHAT 5305 Clinical Kinesiology (3:2:3) Problem-solving approach to the study of human movement with integration of biomechanics fundamental to understanding exercise concepts and musculoskeletal evaluation. The course included the study of length-tension curves, active and passive insufficiencies, application of lever systems and moments of force to the human body, biomechanical properties of human tissue and joints ergonomics, postural and gait assessment.

AHAT 5422 Administration of Athletic Training Programs & Professional Development (4:3:3) This course discusses planning, coordinating, and supervising all administrative components of an Athletic Training program. Coverage includes theories and concepts in the management of sports health care delivery systems, facilities, equipment, and financial resources.

AHAT 5500 Anatomy (5:3:6) Integrated study of gross human anatomy embodying gross morphology and coordinating with development and histological aspects of the body. Included is regional dissection with emphasis on integumentary, musculoskeletal, nervous, circulatory and respiratory systems.

AHAT 5505 Patient Evaluation and Management 1 (5:3:6) Development of clinical skills fundamental to patient management. Introduction to record keeping, clinical evaluation procedures; including skill assessment, posture, joint mobility, muscle strength, and sensory function and clinical decision-making. Introduction to concepts and application of therapeutic exercises.

AHAT 5506 Patient Evaluation and Management II (5:3:6) Theory, principles, literature review, and clinical applications associated with Athletic Training evaluation, assessment and management. This course emphasizes the use of physical agents, biofeedback, early balance differential assessment and the care of burns and wound management. This course will also include an introduction to orthopedic assessment.

AHAT 5529 Musculoskeletal Evaluation and Management II (5:3:6) Theory, principles, literature review and clinical applications associated with athletic training evaluation, assessment and management of musculoskeletal conditions within the lower extremity and spine.

#### ADMISSION TO THE PROGRAM

The professional phase of physical therapy education begins in late May each year. A minimum of 90 semester hours of credit, including the courses listed below, is required prior to enrollment and may be completed in any regionally accredited college or University.

Prerequisite Courses	Semester Hours
Psychology/Sociology	6
Math	3
Statistics	3
General Biology (for majors, lab required)	8
A&PI and II (one course must be upper level)	6-8
General Chemistry (for majors, lab required)	8
General Physics (for majors, lab required)	8
*Electives	46-48
Total Hours	90
* Decommonded courses: English technical writing	anonch davalanmental and

\* Recommended courses: English, technical writing, speech, developmental and general psychology.

#### **GPA REQUIREMENTS**

Competitive cumulative and prerequisite science GPA's are required for consideration for admission. Individuals already holding baccalaureate and graduate degrees are eligible for admission with the same comtetitive GPA and prerequisite requirements.

#### EXPERIENCE

Applicants are expected to have some knowledge of the profession. This can be acquired in several ways including volunteer work, paid employee, and/or observations in clinical settings. Applicants must have completed at least 50 clock hours of experience in a physical therapy setting prior to May 1 of the year of matriculation. Applicants are encouraged to get as much experience as possible. Higher experience levels will strengthen an application.

#### THE APPLICATION PROCESS

Applications may be submitted at anytime, however, applications are considered twice a year for acceptance into the professional program. Applicants should submit an application by October 15<sup>th</sup> to be considered for early acceptance to the class that begins in May of the following year. Applicants not seeking early acceptance should submit an application no later than February 1<sup>st</sup> to w(0eH()][20.566 -1.1533 TD0.0011 )][.

In addition to the prerequisites listed above, at least 46-48 hours of elective coursework must be earned by the applicant. Although the selection of these elective hours is the student's option, recommended electives include technical writing, speech and developmental and general psychology.

#### PROFESSIONAL CURRICULUM

The following courses are offered once each year during the semester listed and must be taken in sequence.

#### FIRST YEAR

Summer Sen	nester*	Course		<b>Credit Hours</b>
AHPT 5200		Introduction to	Patient Management	2
AHPT 5202		Principles of .v.	esilog1(y)	
AHPT	53746.7(5250	)-60(	PHuman53746.7(5A natom)	)293.83

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AHPT 5420	Neuroscience 2	4 Tatal Haura 12
THIRD YEAR		
Summer Semester AHPT 5444 AHPT 5142 AHPT 5146 AHPT 5240 AHPT 5150 AHPT 5152 AHPT 5208 AHPT 5156 AHPT 5158	Course Adult Neurorehabilitation Current Medical Diagnosis and Treatment 2 Research Process 4 Personnel Management Women's Physical Therapy (elective) Seminar 1 (elective) Management of Acute Injuries (elective) Seminar 2 (elective) Seminar 3 (elective)	Credit Hours 4 1 2 1 1 1 1 1
	(2hours of electives are required)	Total Hours = 10
Fall Semester   AHPT 5341   AHPT 5343   AHPT 5345   AHPT 5147   AHPT 5243   AHPT 5245   AHPT 5149	Course Developmental Evaluation and Management Cardiopulmonary Evaluation and Management Health Care Business Administration Research Process 5 Current Medical Diagnosis and Treatment 3 Orthotic Devices Clinical Reasoning 3	Credit Hours 3 3 1 2 2 1 Total Hours = 15
Spring Semester AHPT 5446 AHPT 5448 AHPT 5140	Course Clinical Experience 3 Clinical Experience 4 Graduate Seminar	Credit Hours 4 1 Total Hours = 9

During professional studies, students are required to adhere to all program policies and academic and behavioral guidelines as stated in the Physical Therapy Student Policy Manual. Expenses incurred on clinical rotations are the responsibility of the student.

#### COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHPT 5099 Independent Study in Physical Therapy (1-6 hours) Prerequisite: Instructor approval. A structured review of previously presented classroom and/or laboratory experiences, literature review and discussion, clinical observation and/or hands-on clinical experience. Each independent study is designed to meet the professional student's particular needs. Prerequisite: Instructor approval.

AHPT 5104 Clinical Education (1:1:0) This course emphasizes the different forms of communication necessary for the PT to succeed as a professional, including written, verbal and nonverbal. Documentation of patient care, interpersonal relationships with patients and professionals, patient education principles and techniques, and documentation of the student's upcoming clinical education experience are included topics.

AHPT 5108 Clinical Reasoning 1 (1:1:0) A structured, interactive review of previously presented classroom material is presented in a facilitation-based learning format. Positioning of the course at the completion of the first year allows a comprehensive learning framework and review. Class

learning method-interactive discussion and presentation.

AHPT 5122 Residual Limb Care and Prosthetics (1:1:0)

AHPT 5200 Introduction to Patient Management (2:1:3) Introduction to basic clinical skills in the field of physical therapy, medical terminology and basic documentation. Includes transfer techniques, gait training, massage, vital signs, emergency procedures and use of special equipment.

AHPT 5202 Principles of Kinesiology (2:1:3) Course will provide an in-depth study of applied

and other professional duties, and may practice in an inpatient or outpatient setting. All prior coursework prepares the student, and additional information and skills are gained in the clinic.

AHPT 5341 Developmental Evaluation and Management (3:2:3) Prerequisites: AHPT 5529, 5444. Introduction to the modification of physical therapy examination, evaluation and management for the special developmental needs of children with orthopedic or neuromuscular conditions. Includes consideration of the requirements for physical therapy practice in specialized settings such as neonatal intensive care, Birth to Three programs, and public schools. Treatment approaches are integrated from various sources including motor control theory, neurodevelopmental treatment, sensory integration and applied research.

AHPT 5343 Cardiopulmonary Evaluation and Management (3:2:3) Prerequisite: AHPT 5304. Scientific basis, rationale and application of assessment, prevention and treatment principles and techniques for patients with acute and chronic cardiopulmonary disorders. Comprehensive and indepth physical therapy evaluation and management of patients with multi-system disorders will be discussed.

AHPT 5345 Health Care Business Administration (3:3:0) Prerequisite: AHPT 5240. The process involved with organizing, directing, developing, and measuring the management and entrepreneurial components of a physical therapy practice. Skilled techniques associated with business and professional growth are the hallmarks of this course.

AHPT 5405 Pathophysiology of Body Systems (4:4:0) This course will focus on general physiological principles of diseases and disorders that affect organ systems of the body, with an emphasis on integrating the interrelationship between different organ systems in the context of clinical correlations relevant to physical therapists. Neuromusculoskeletal, cardiopulmonary, endocrinology, body fluids and electrolytes, immune system, neoplasia and genetic disorders will be discussed from molecular and systems perspectives.

AHPT 5420 Neuroscience 2 (4:3:3) Prerequisite: AHPT 5205. This course consists of an examination of the human nervous system, with an emphasis on the functional relationships of neuroanatomical structures. Topics to be covered include the organization of the nervous system in terms of development, mechanisms of processing of sensory and motor information (including receptors and reflexes), and pathological conditions of the nervous system.

AHPT 5444 Adult Neurological Assessment and Rehabilitation (4:3:3) Prerequisite: AHPT 5420, 5320. This course examines physical therapy examination, evaluation, prognosis, intervention, ani(includ)6.8(i)4.6(ng)-6.6()][J-19625 Tw[],8[tsti
MENTORED INTERNSHIP: Master's graduates attend 1, BSPT graduates attend all

	Course	<b>Credit Hours</b>
AHPT 6213	Clinical Internship I (120 total contact hours)	2
AHPT 6214	Clinical Internship II (120 total contact hours)	2
AHPT 6215	Research Internship I (120 total contact hours)	2
AHPT 6216	Research Internship II (120 total contact hours)	2

CORE COURSES: Master's graduates and BSPT graduates attend all

	Course	<b>Credit Hours</b>
AHPT 6301	Issues in Orthopaedic Physical Therapy &	
	Manual Therapy I	3
AHPT 6302	Issues in Orthopaedic Physical Therapy &	
	Manual Therapy II	3
AHPT 6304	Orthopaedic Physical Therapy Screening	3

LEADERSHIP COURSES: Master's graduates attend 1, BSPT graduates attend all

	Course	Credit Hours
AHPT 6315	Advanced Health Care Administration	3
AHPT 6316	Marketing in Outpatient Physical Therapy	3

ELECTIVES: Master's graduates attend 3, BSPT graduates attend 5

	Course	<b>Credit Hours</b>
AHPT 6303	Basic & Applied Science in Orthopaedics	3
AHPT 6305	Updates in Orthopaedic Surgical Management	3
AHPT 6311	Clinical Studies in Anatomy; a Lab Course	3
AHPT 6312	Neuroscience in Orthopaedic Physical Therapy	3
AHPT 6313	Biomechanics in Orthopaedic Physical Therapy	3
AHPT 6314	Motor Control in Orthopaedic Physical Therapy	3

TEACHING TRACK: This track emphasizes the theories, skills, and tools required for effective teaching in Physical Therapy. Students' clinical projects will emphasize the development, implementation and evaluation of a course or course component with other health professionals, patients, or the general public.

EDUCATION COURSES: Master's graduates attend 1, BSPT graduates attend all

	Courses	Credit Hours
AHPT 7303	Instructional Technology in Allied Health	3
AHPT 7304	Educational Evaluation in Allied Health	3

CLINICAL PROJECT: Master's graduates and BSPT graduates attend all

	Courses Cred	it Hours
AHPT 7000	Clinical Research/ Education Project	2
AHPT 7104	Clinical Research/ Education Project Presentation1	
AHPT 7305	Curriculum Design and Teaching in Allied Health	3

**RESEARCH TRACK:** This track emphasizes the theories, skills, and tools required for effective research in Physical Therapy. Students' clinical projects will emphasize the development, implementation, analysis and discussion of a clinical research project in a practice setting.

STATISTICS COURSES: Master's graduates attend 1, BSPT graduates attend all

	Courses	<b>Credit Hours</b>
AHPT 7302	Non-Parametric Statistics for Clinical Research	3
AHPT 7306	Parametric Statistics for Clinical Research	3

CLINICAL PROJECT: Master's graduates and BSPT graduates attend all

	Course	Credit Hours
AHPT 7000	Clinical Research/ Education Project	2
AHPT 7104	Clinical Research/ Education Project Presentation	1
AHPT 7301	Seminar in Clinical Research Design	3

During post-professional studies, students are required to adhere to all program policies and academic and behavioral guidelines as stated in the Physical Therapy Doctoral Student Policy

pathology, and treatment approaches. Clinical laboratory sessions include surface anatomy, basic functional examination and special tests, soft tissue treatments, and joint-specific treatment measures. Management approaches to 1° disc afflictions, 2° disc afflictions, instability, arthrosis / arthritis, and soft tissue afflictions. case studies will be discussed and mock clinic sessions will be conducted.

AHPT 6211 Advanced Clinical Practice for SacroIliac and Lumbar Primary Disc Afflictions (2 credits) Examination and treatment of lumbar 1° disc related disorders, as well as dysfunction at the sacroIliac joint. Lecture components include advancements in patho-anatomy, biomechanics, interpretation of functional examination, pathology, and treatment approaches. Clinical laboratory sessions include surface anatomy, basic functional examination and special tests, soft tissue treatments, treatment to 1° disc afflictions, and joint-specific treatment measures to the sacroIliac joint. Management approaches to 1° disc afflictions, as well as sacroIliac joint hypomobilities and hypermobilities. Case studies will be discussed and mock clinic sessions will be conducted.

AHPT 6212 Advanced Clinical Practice for Lumbar Secondary Disc Afflictions (2 credits) Examination and treatment of 2° Disc related disorders in the Lumbar Spine. Lecture components include advancements in patho-anatomy, biomechanics, interpretation of functional examination, pathology, and treatment approaches. Clinical laboratory sessions include surface anatomy, basic functional examination and special tests, soft tissue treatments, and joint-specific treatment measures. This course includes management approaches to instability, stenosis / spondylosis, arthritis / arthrosis, chondropathy / chondromalacia, and soft tissue afflictions. Case studies will be discussed and mock clinic sessions will be conducted.

AHPT 6213 Clinical Internship (2 credits) Clinical internship for the Sc.D.,PT student. During this 3-week rotation, the Sc.D.,PT student will be given the opportunity to develop and enhance advanced clinical skills associated with evaluation and treatment of the extremities. The student will be guided by a clinical mentor and will be provided the opportunity to utilize skills in problem solving, diagnosis, treatment selection and management implementation for orthopaedic dysfunction in the spine and or extremities. Prerequisite

AHPT 6301 Issues in Orthopaedic Physical Therapy and Manual Therapy 1 (3 credits) Survey of the professional issues surrounding the advanced practice of orthopaedic Physical Therapy and manual therapy. Topics include history of orthopaedic manual therapy, legal and ethical aspects of manual therapy, risk management, and communication and patient education in clinical management.

AHPT 6302 Issues in Orthopaedic Physical Therapy and Manual Therapy 2 (3 credits) Survey of selected topics in Basic and Applied Science as they relate to orthopaedic Physical Therapy and manual therapy. The discussions will highlight topic areas that include neurophysiology, histology, exercise physiology, and applied medical science.

AHPT 6303 Basic and Applied Science in Orthopaedics (3 credits) Prerequisite: AHPT 7302 or consent of the instructor. Addresses select basic science processes associated within the musculoskeletal system. Topics include histology and physiology of bone, cartilage, tendons, and ligaments. Muscle physiology will be discussed as it relates to orthopaedic dysfunction.

AHPT 6304 Orthopaedic Physical Therapy Screening (3 credits) Enhances knowledge and clinical skills designed to assist in the screening of patients for orthopaedic conditions which require examination by a physician. Experiences should strengthen professional communication between physical therapists and physicians. Radiology and laboratory screening are presented as special topics to further the therapist's understanding of pathology and the clinical implications of patient presentation.

AHPT 6305 Updates in Orthopaedic Surgical Management (3 credits) Evaluation of recent developments from the literature in orthopaedic surgical management, in terms of indications, methodology, and rehabilitation. Emphasis will be placed on the implications of each procedure for rehabilitation. Specific rehabilitation measures will be discussed and related to techniques taught in other Sc.D.,PT courses.

AHPT 6311 Clinical Studies in Anatomy; a Lab Course (3 credits) Evaluation of prosected human cadaveric specimens with emphasis on musculoskeletal structures. Each ½ day session will include a short lecture at the beginning for review of anatomical structures to be observed, as well as the relevance of each of those structures to examination and treatment of orthopaedic afflictions.

AHPT 6312 Neuroscience in Orthopaedic Physical Therapy (3 credits) Prerequisite: AHPT 6302 or consent of the instructor. Addresses select neuroscience processes associated within the musculoskeletal system. These include the neuroscience of motor planning, initiation and control; sensory function and integration; and dysfunction of the nervous system as it relates to orthopaedic afflictions, including pain production and control.

AHPT 6313 Biomechanics in Orthopaedic Physical Therapy (3 credits) Theory and application of biomechanical principles to orthopaedic Physical Therapy practice. This course will emphasize the biomechanics of musculoskeletal structures, including bone, cartilage, ligament, tendon, and muscle tissue. Emphasis on joint and tissue mechanics will be related to musculoskeletal injury and orthopaedic affliction.

AHPT 6314 Motor Control in Orthopaedic Physical Therapy (3 credits) Relates theory and application of motor control and learning principles to orthopaedic Physical Therapy practice. Emphasis on motor control strategies associated with musculoskeletal function, and motor control dysfunction associated with orthopaedic pathologies. Integration of concepts from exercise science and experimental psychology for the explanation of relevant issues concerning motor learning and control for the orthopaedic patient. Patient management strategies derived from these principles will be discussed.

# Master of Athletic Training/ Master of Physical Therapy Two-Degree Option

Texas Tech University Health Sciences Center offers a two-degree option in Athletic Training and Physical Therapy. This innovative approach is unique in Texas and the United States. The Master of Athletic Training (MAT) and Master of Phys

## SECOND YEAR

Summer Semester	Course	Credit Hours
AHAT 5220	Musculoskeletal Evaluation & Management I	2
AHPT 5126	Research Process I	2
AHPT 5122	Residual Limb Care and Prosthetics	1
AHAT 5099	Independent Study	2
		Total Hours = 7
Fall Semester	Course	Credit Hours
AHAT 5529	Musculoskeletal Evaluation & Management II	5
AHAT 5223	Special Populations & Concerns	2
AHAT 5227	Current Medical Diagnosis & Treatment I	2
AHAT 5225	Clinical Rotation III	2
AHPT 5229	Research Process 2	2
		Total Hours = 13
Spring Semester	Course	<b>Credit Hours</b>
AHAT 5422	Administration of Athletic Training Programs &	
	Professional Development	4
AHAT 5224	Management/Identification of General Medical	
	Conditions	2
AHAT 5228	Clinical Rotation IV	2
AHPT 5128	Research Process 3	1
AHPT 5310	Clinical Applied Physiology	3
AHPT 5104	Clinical Education	1
		Total Hours = 13

Graduate with Master in Athletic Training in May of  $2^{nd}$  year with caveat that diploma will be issued in December after completion of Research Processes 4 & 5

## THRID YEAR

Summer Semester	Course	Credit Hours
AHPT 5336	Clinical Experience I	3
AHPT 5204	Health Care Issues & Ethics (online course)	2
AHPT 5146	Research Process 4	1
		Total Hours = 6
Fall Semester	Course	Credit Hours
AHPT 5405	Pathophysiology of Body Systems	4
AHPT 5205	Neuroscience I	2
AHPT 5321	Adult Development & Aging	3
AHPT 5129	Clinical Reasoning 2	1
AHPT 5147	Research Process 5	1
		Total Hours = 11
Spring Semester	Course	Credit Hours
AHPT 5338	Clinical Experience 2	3
AHPT 5320	Early Growth & Development	3
AHPT 5228	Motor Control & Learning	2
AHPT 5420	Neuroscience 2	4
		Total Hours = 12

Spring Semester	Course	Credit Hours
AHPT 5446	Clinical Experience 3	4
AHPT 5448	Clinical Experience 4	4
AHPT 5140	Clinical Seminar	1
		Total Hours = 9

Graduate with Master in Physical Therapy in May of 3<sup>rd</sup> year.

## Fourth Year

Course Clinical Rotation 2	Credit Hours 2
	Total Hours = 2
Course	<b>Credit Hours</b>
Management & Prevention of Athletic Injuries	2
Special Populations & Concerns	2
Clinical Rotation 3	2
	Total Hours = 6
Course	<b>Credit Hours</b>
Special Topics in Athletic Training	3
Administration of Athletic Training Programs &	
Professional Development	4
Management/Identification of General Medical	
Conditions	2
Clinical Rotation 4	2
	Total Hours = 11
	Course Clinical Rotation 2 Course Management & Prevention of Athletic Injuries Special Populations & Concerns Clinical Rotation 3 Course Special Topics in Athletic Training Administration of Athletic Training Programs & Professional Development Management/Identification of General Medical Conditions Clinical Rotation 4

## **Total Two-Degree Option Program hours = 126**

Graduate with Master in Athletic Training in May of 4<sup>th</sup> year.

## AT courses waived because material is included in MPT Program:

Course	Credit Hours
Research Component	4
Introduction to Clinical Education	1
	Total Hours Waived = 5

# **Program in Occupational Therapy**

Occupational therapy is a challenging profession that calls on the therapist to use creative abilities in imaginative ways to meet individual clients' unique needs. Occupational therapists work collaboratively with individuals whose life patterns have been changed due to cognitive or developmental problems, injury or illness, social or emotional deficits, or the aging process. Our focus is on helping individuals to achieve a health education coursework with an emphasis on the physical and social sciences and humanities. These courses may be completed at any regionally accredited college or university.

The professional phase of the program begins in late May. Students will be involved in clinical experiences during the second and third year in the program. Following completion of all academic coursed, students undertake 6 months of full-time clinical fieldwork.

This program prepares the student to enter the field of occupational therapy with a background in basic sciences, research, theory, application, and clinical education. The curriculum covers life span from birth to aging, reflecting a broad perspective on physical, emotional, social and biological issues affecting the quality of daily living for persons with unique abilities. Additionally, the courses are sequenced from normal to abnormal, function to dysfunction, and professional foundation to professional leadership. Lectures, case studies, laboratory experiences and clinical education provide opportunities to integrate prior knowledge with new learning and develop competent professional behaviors. As this is a program to not only educate but to foster professional behaviors and commitment, occupational therapy students will exceed usual classroom hours in order to engage in clinical education, complete community assignments, and participate in professional development and leadership experiences, both assigned and voluntary.

Successful completion of the professional curriculum leads to a Master of Occupational Therapy degree. During professional studies, students are required to adhere to all program, departmental, School of Allied Health Sciences and Texas Tech University Health Sciences Center policies and academic and behavioral guidelines as outlined in the student handbook, fieldwork manual, and course outlines.

Class sizes are restricted to insure optimal student/instructor ratios and to enable each student to receive comprehensive instructional and clinical experience.

Faculty and students on the campuses communicate with each other in person, via interactive TV and through the internet, as well as by phone and fax. Students entering the program should have ready access to a computer, and be familiar with basic internet skills, including the use of e-mail, searching the World Wide Web, and using a basic word processing package. Students without computers are encouraged to purchase one and become familiar with it prior to beginning the program. You may be able to include this purchase in your financial aid package.

#### CLINICAL EDUCATION

Clinical education is an integral aspect of the program. Level I fieldwork experiences are scheduled throughout the professional program and allow students to reinforce and test the knowledge and attitudes presented in the classroom. Upon completion of the academic portion of the curriculum, the student is required to participate in a minimum of six months fieldwork in situations assigned by the academic fieldwork coordinator. These fieldwork situations are full time and will often require the student to relocate outside the immediate geographic area. Available assignments are determined by contractual arrangements between the department and facility. Students pay regular tuition and fees for enrollment in fieldwork. Optional fieldwork rotations in many specialty areas such as pediatrics, administration, hand therapy, and work hardening are also available.

#### ADMISSION TO THE PROFESSIONAL PROGRAM

To be considered for admission, the applicant must submit a current application and complete the application procedure, which includes a personal interview. A minimum cumulative GPA of 2.7 on a 4.0 scale is required. A grade of C or better is necessary in each required preprofessional course. At the time of application, all science coursework should be completed within the last seven years. Applicants whose science coursework is more than seven years old should contact the academic advisor in the Office of Admissions and Student Affairs for decisions concerning course acceptability. Individuals already holding a baccalaureate or graduate degree in other fields are

eligible for admission. They must have a 2.7 GPA in the last 90 semester hours and meet the same

#### PROFESSIONAL CURRICULUM

The following courses are offered once each year and must be taken in sequence. All prerequisites and corequisite requirements must be met. Any deviation from this sequence requires prior department chair approval.

The curriculum includes the following main components:

Human Sciences (20 credits)
Human Anatomy
Principles of Kinesiology
Clinical Kinesiology
Pathonhysiology
Human Neurosciences
Current Medical Diagnosis and Treatment
Professional Concents and Skills (16 credits)
OT Professional Concents
Professional Skills Land II
A dantations and Technology
Clinical Assessment and Reasoning
Advanced Clinical Researing
Occupational Eulection/Ducturetion (40 credite)
Neurodevelopment Sequences
Reconstruction A constant of Illness and Disability
Psychosocial Aspects of Inness and Disability Occupational Eurotion/Dycfunction: Children and Adolescents I. II and III
Occupational Function/Dystunction: OnlineFally Addressents, 1, 11 and 11
Occupational Function/Dystunction: Adults I, IT and IT
Inquiry Skills (4 credits)
Introduction to Research
Research Methods: Quantitative and Quantitative
Practice Organization and Administration (5 credits)
Health Organization Management
Entrepreneurship for Health Professionals
Fieldwork (21 credits)
Fieldwork I: 1 and 2
Fieldwork II: 1, II: 2
Elective Courses (variable credits)
Fieldwork II Optional Specialization
Special Topics in Occupational Therapy
Individual Project

#### **FIELDWORK (AHOT 5931, 5932)**

Students must be approved for fieldwork placement by the program director. Considerations in this recommendation include student's academic performance, completion of program requirements, demonstration of adequate professionalism and behaviors indicating ability to be effective and productive during clinical training, including problem solving ability and critical thinking. Students on fieldwork assignments should be able to follow safety procedures of the institution, plus any other requirements deemed important for fieldwork. Behaviors observed during the professional curriculum are evidence of a student's readiness for this level of fieldwork.

Level II fieldwork must be completed within 24 months following the completion of academic preparation.

#### CERTIFICATION

Graduates of the program will be able to sit for the national certification examination for the occupational therapist administered by the National Board for Certification in Occupational Therapy (NBCOT). After successful completion of this exam, the individual will be an Occupational Therapist, Registered (OTR). Most states require licensure in order to practice; however, state licenses are usually based on the results of the NBCOT Certification Examination.

## FIRST YEAR

Summer Semester AHOT 5104 AHOT 5202 AHOT 5500	Course OT Professional Skills I Principles of Kinesiology Human Anatomy	Credit Hours 1 2 5 Total Hours = 8
Fall Semester AHOT 5236 AHOT 5401 AHOT 5303 AHOT 5312 AHOT 5433	Course OT Professional Skills II Human Physiology Clinical Kinesiology Professional Concepts Current Medical Diagnoses and Treatment	Credit Hours 2 4 3 3 3 Total Hours = 15
Spring Semester   AHOT 5205   AHOT 5302   AHOT 5304   AHOT 5306   AHOT 5308   SECOND YEAR	Course Neurodevelopmental Sequences Human Neurosciences Clinical Assessment & Reasoning Adaptations & Technology Pschosocial Aspects of Illness & Disability	Credit Hours 2 3 3 3 3 Total Hours = 14
Summer Semester AHOT 5221	Course Introduction to Research	Credit Hours 2 Total Hours = 2
Fall Semester   AHOT 5326   AHOT 5421   AHOT 5423   AHOT 5425   AHOT 5224	Course Health Organization Management Occupational Function/Dys: Children & Adolescents I Occupational Function/Dys: Adults I Occupational Function/Dys: Older Adults I Research Methods: Quantitative and Qualitative	Credit Hours 3 4 4 4 2 Total Hours = 17

Spring Semester	Course	<b>Credit Hours</b>
AHOT 5106	Fieldwork I: 1	1
AHOT 5235	Entrepreneurship	2
AHOT 5232	Advanced Clinical Reasoning	2
AHOT 5422	Occupational Function/Dys:	
	Children & Adolescents II	4
AHOT 5424	Occupational Function/Dys: Adults II	4
AHOT 5323	Community Health	2
		Total Hours = 15
THIRD YEAR		
Summer Semester	Course	<b>Credit Hours</b>
AHOT 5200	Fieldwork I:2	2
AHOT 5432	Occupational Function/Dys:	
	Children & Adolescents III	4
AHOT 5434	Occupational Function/Dys: Adults III	4
AHOT 5436	Occupational Function/Dys: Older Adults II	4
		Total Hours = 14
Fall Semester	Course	<b>Credit Hours</b>
AHOT 5931	Fieldwork II: 1	9
		Total Hours = 9
Spring Semester	Course	<b>Credit Hours</b>
AHOT 5932	Fieldwork II: 2	9
		Total Hours = 9

#### COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHOT 5071 Fieldwork II: Specialization (3-6:0:3-6) Prerequisite: AHOT 5631, 5632. Optional additional full-time, supervised clinical experience in an area/facility of the student's choice.

AHOT 5072 Special Topics in Occupational Therapy (1-3:1-3:0) Selected topics of interest to occupational therapy. Please note that this course is not offered every year.

AHOT 5073 Individual Projects (1-3:1-3:0) Prerequisite: approval of instructor and Program Director. Provides an opportunity for students to undertake a special project in an area of interest.

AHOT 5104 Occupational Therapy Professional Skills I (1:0:3) Introduction to key practice skills in occupational therapy.

AHOT 5106 Fieldwork I: 1 (1:0:3) Prerequisite: AHOT 5104, 5312, 5203. Part-time, supervised, opportunity to observe clinical practice and to participate, within limits, in the occupational therapy process with individuals and groups.

AHOT 5202 Principles of Kinesiology (2:1:3) Corequisite: AHOT 5500. Study of human motion with emphasis on biomechanics fundamental to understanding the clinical application of musculoskeletal evaluation, posture and gait assessment, and exercise.

AHOT 5205 Neurodevelopmental Sequences (2:2:2)

AHOT 5221 Introduction to Research (2:2:0) Introduction to the research process with an overview of research design, measurement, ethics, proposal development, and support resources specific to research in occupational therapy.

AHOT 5200 Fieldwork I: 2 (2:0:3) Prerequisite: AHOT 5106, 5421, 5423, 5425. Part-time, supervised, opportunity to observe clinical practice and to participate, within limits, in the occupational therapy process with individuals and groups. As possible, this will allow students to explore occupational therapy contributions in "non traditional" or "role emerging" settings. Students will conduct a needs assessment in their assigned setting.

AHOT 5224 Research Methods: Quantitative and Qualitative Approaches (2:2:0) Prerequisite: AHOT 5221. Exploration of research methods, with an emphasis on quantitative and qualitative approaches. Evaluation and use of professional literature relevant to clinical practice.

AHOT 5232 Advanced Clinical Reasoning (2:2:0) Prerequisite: AHOT 5304, 5312. Capstone course using case studies presented by faculty and students to illustrate occupational therapy process, clinical reasoning skills used by novice and experienced therapists, development of a continuing professional education plan, and preparation for the certification exam.

AHOT 5235 Entrepreneurship for Health Professionals (2:2:0) Integration of content from previous courses to enhance potential for successfully managing the delivery of health services in a future of constant change. Knowledge and skills related to program/service needs identification,

#### Fieldwork

Students are responsible for all costs associated with fieldwork including transportation, housing, meals, uniforms, and other incidental expenses.

Clinical education consists of four experiences designed to prepare and expose the student to a variety of applied settings in physical therapy:

- 1) Fieldwork I:1 In the spring of the second year, the student actively participates in occupational therapy as it is practiced in various settings for one week following completion of classes.
- 2) Fieldwork I:2 In the summer of the second year, the student actively participates in occupational therapy as it is practiced in various settings for two weeks following completion of cabless(rp)18(4s.3665erv/atDub) Trady Tbe(2t))Tig/TiT 14cal Tetu/8635300, WDt(h)Tig/TiTTSsidn,Tfn.1666ere(at3)20.94.00,025(80-9.3698)eT add(t)86(f x137...

## **Program in Rehabilitation Sciences**

The mission for the MS in Rehabilitation Sciences is to provide master's-level education to licensed rehabilitation clinicians within the greater Texas and Southwest region. An overwhelming majority of practicing OT's and PT's in this region are educated at a baccalaureate level and would benefit from a contemporary education. The MS in Rehabilitation Sciences provides practicing clinicians the opportunity to continue their education while maintaining their current work and home environment.

The MS in Rehabilitation Sciences is not a rehash of undergraduate work, but a discussion based investigation of topics such as validated treatment methods, professional growth, practice issues, research, coding and billing, and changing rehabilitation laws. The increasing complexity of theoretical and applied knowledge required for practice, and the growing demand for innovative problem solvers has necessitated the development of a cost-effective graduate program geared toward the practicing clinician.

The degree is entirely distance-based, designed specifically to increase the availability to as many working practitioners as possible. The use of WebCT in association with the Internet will provide a top-quality educational program requiring no coursework requirements on a traditional campus. The program is focused toward the practicing clinicians and their specific needs in today's changing environment, utilizing a mechanism that is student friendly and effective.

#### PROGRAM DESCRIPTION

The MS in Rehabilitation Sciences program offers practicing professionals expanded knowledge, skills, and abilities that meet contemporary practice standards. The curriculum involves the learner as an active participant in the essential knowledge, skills, and attitudes necessary for competent practice in the workforce. Faculty will be dr

#### THE APPLICATION PROCESS

Applications may be submitted at anytime, however, applications are considered approximately 1 month prior to the beginning of each term. It is in the best interest of the applicant to apply as early as possible. Two reference letters are required; one from professional colleagues and one from a previous or present employer.

All application materials should be sent to the Texas Tech University Health Sciences Center, School of Allied Health Sciences, Office of the Registrar, 3601 4th Street, Stop 8310, Lubbock, Texas 79430. The admissions committee will require a personal, on-campus interview of selected applicants. Applicants should understand that fulfillment of the basic requirements does not guarantee admission.

## POST-PROFESSIONAL CURRICULUM

Course	Credit Hours
Health Care Finance and Resource Management	3
Market Assessment and Strategic Management in	n
Rehabilitation-Capstone Course	3
	Total Hours = $6$
IVE) GERUNIULGY IRACK	
Course	<b>Credit Hours</b>
Theory of Gerontology	3
Physiological Aspects of Aging	3
	Total Hours = 6
Course	Credit Hours
Dynamics of Aging	3
Independent Study - Aging	3
5 5	Total Hours = 6
Course	Credit Hours
Louise	
Aging Internship or Research (Capstone Course)	3
Aging michalip of Nesearch (Capsione Course)	Total Hours = 6
	Course Health Care Finance and Resource Management Market Assessment and Strategic Management ir Rehabilitation-Capstone Course IVE) GERONTOLGY TRACK Course Theory of Gerontology Physiological Aspects of Aging Course Dynamics of Aging Independent Study - Aging Course Issues in Aging Aging Internship or Research (Capstone Course)

#### **COURSE DESCRIPTIONS**

AHRS 5301 Foundations of Rehabilitation-Principles and Practice (3 credits) Foundations in Rehabilitation is designed to expose the learner to the history and underlying evolution of rehabilitation. Issues associated with the evolving position that rehabilitative providers face are addressed in this course. Rehabilitative Theory and Practice consists of current practice patterns, paradigms, and theoretical treatment models. Additionally, the driving forces that make up our clinical models are discussed and evaluated for effectiveness.

AHRS 5302 Consumer Dimensions of Rehabilitation (3 credits) This course is designed to give the student an understanding of the influence of the consumer on the rehabilitation profession. The course provides an in-depth assessment of alternative products, consumer fraud, and rehabilitation practices that lack scientific merit.

AHRS 5303 Quantitative Research Methods (3 credits) This course is designed to provide the learner understanding in the basic statistical and methodological principles underlying clinical and theoretical research, and techniques and methods of conducting appropriate literature reviews.

AHRS 5304 Qualitative Research Methods (3 credits) Assists the learner in creating a clinical, outcome, or practice-based research proposal or literature review.

AHRS 5305 Medical Aspects of Rehabilitation (3 credits) This course presents current medical issues that influence the treatment decision-making model in practice. Topics such as Neurological, Cardiopulmonary, and Orthopedic Issues, discussed by physicians or medical experts are included in the coursework. The course is designed to encompass the realm of medicative side effects and condition altering situations.

AHRS 5306 The Health Care Delivery System (3 credits) This course provides the student with the basic understanding of the local and international origins, evolution, and trends in institutional and non-traditional health care delivery. Other professions are discussed in detail, as are the inner-workings of the hospital and institutional healthcare environment.

AHRS BS 5307 Health Care Management (3 credits) The course includes personnel management and the process that is involved with organizing, directing, de

AHRS GE 5317 Issues in Aging (3 credits) This course focuses on public policy, legislative processes, insurance and financial planning, retirement income, protective services, and legal issues that affect older individuals. The course investigates current events related to the aging adult, using both educational and consumer based literature.

AHRS GE 5318 Aging Internship or Research (3 credits) Students are offered the choice of doing an independent comprehensive literature review, research, or practice-based work related to gerontology. Students design their study plan with faculty assistance.

## **Program in Rehabilitation Counseling**

Work and working are highly valued in our society. Rehabilitation Counselors provide and coordinate services for individuals with a range of physical, psychiatric, or developmental disabilities. These professionals work to assist clients in gaining the skills and resources necessary to obtain meaningful work and lead full and self-satisfying lives. This is done through a range of activities, including: counseling, provision of adaptive equipment, vocational training, job placement, modifying the work environment, and assisting client's to cope effectively with their environment and function as independently as possible.

This Rehabilitation Counselor education curriculum is designed to involve the learner as an active participant in the essential knowledge, skills and attitudes necessary for competent practice in the field; and conforms closely to the stated requirements for the graduate education of rehabilitation counseling professionals as set forth by accrediting and certification bodies. It is the intent of the program to graduate students who are:

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- To develop commitment within students to empower individuals with disabilities to identify and maximize their resources to meet their developmental, vocational, independent living, and educational needs.
- To instill within students a commitment to develop a life long commitment to learning professionalism continuing education throughout their career.

## ACCREDITATION

for advanced credit for certain courses. Persons with disabilities are strongly encouraged to apply.

#### THE APPLICATION PROCESS

Applications must be received by the School of Allied Health Sciences Admissions and Student Affairs Office by August 1 for Fall semester, December 1 for Spring semester and May 1 for Summer semester.

Students will submit a completed application form, transcripts, a letter from the applicant outlining their rationale for applying to the program, 3 letters of reference, and a resume. Qualified candidates will be contacted for an interview. It is the applicant's responsibility to assure that all supporting documentation is received by the deadline. Application materials and detailed information on application procedures and admission criteria can be accessed via the Texas Tech University Health Sciences Center, School of Allied Health Sciences website at www.ttuhsc.edu/pages/sah. Applications for non-degree seeking students wishing to participate in selected MRC courses are accepted up to three weeks prior to the start of the semester.

## PROFESSIONAL CURRICULUM

#### CORE COURSEWORK

Course	Credit Hours
Foundations of Rehabilitation Counseling	3
Counseling Theories	3
Medical Aspects of Disability	3
	Course Foundations of Rehabilitation Counseling Counseling Theories Medical Aspects of Disability

## COURSE DESCRIPTIONS: PROFESSIONAL CURRICULUM

AHRC 5301 Foundations of Rehabilitation Counseling (3 credits) Introduction to the history and philosophy of rehabilitation, and the legislative and policy background underpinning the modern delivery of rehabilitation counseling services. Exploration of the organizational structure of current rehabilitation counseling AHRC 5321 Vocational Assessment (3 credits) Exploration of the approaches, techniques, instruments, and interpretation of vocational assessment, with a strong emphasis on the identification and integration of assessment information from a multi-disciplinary perspective. The strengths and weaknesses of assessment information in the rehabilitation counseling process are discussed within the context of the overall role of assessment in assisting the individual.

AHRC 5322 Employment Development and Placement (3 credits) The roles and techniques involved in the development of employment options and placement of persons with disabilities in employment are explored in-depth. Topic areas to be explored include job analysis, job development, work site modification, ergonomics, role of assistive technology, job placement, employer contacts, supported employment, post placement support, job coaching, and building natural supports. Attention will also be paid to the impact of legislative initiatives (e.g. the Americans with Disabilities Act) on employment development and placement.

AHRC 5342 Rehabilitation Substance Abuse (3 credits) The objective of this course is to increase the student's knowledge of the different types of drugs/substances, addictions and effects of the drugs and substances. Provide and overview of the counseling treatments and modalities used to serve persons with addictions, especially those with other disabilities. The student will gain knowledge about the effects on the family and increase awareness of various forms of prevention.

AHRC 5346 Psychiatric Rehabilitation (3 credits) Addresses the issues and methods of working with persons that experience psychiatric disabilities. The course will cover areas of psychopathology, assessment issues, treatment and service options, and vocational and integration issues.

AHRC 5348 Life Care Planning (3 credits) This course will provide an introduction to the process of life care planning. Students will be instructed on the LCP process, ethical considerations, forensic testimony, and service delivery issues.

AHRC 5416 Clinical Internship I (4 credits) Supervised rehabilitation counseling internship located in a rehabilitation counseling services setting. Internship activities will include an orientation to program components, policies and procedures; an introduction to staff and their role and function; review of confidentiality and ethical standards; observation of all aspects of rehabilitation counseling services; work assignments encompassing the tasks of regularly employed rehabilitation counselors from intake to placement and/or discharge; reporting/charting and all documentation requirements as set forth by the organization, evaluation of student performance (including self-evaluation, field site supervisor evaluation, and faculty supervisor evaluation). Note: contributes towards the mandatory 600-hour clinical internship requirements as outlined for CORE accreditation and CRCC certification. (AHRC 5416 is 4 graduate credit hours; AHRC 5517 is 5 graduate hours) Courses may be repeated if the 600 hour requirement is not met, and may be taken simultaneously.

AHRC 5517 Clinical Internship II (5 credits) Supervised rehabilitation counseling internship located in a rehabilitation counseling services setting. Internship activities will include an orientation to program components, policies and procedures; an introduction to staff and their role and function; review of confidentiality and ethical standards; observation of all aspects of rehabilitation counseling services; work assignments encompassing the tasks of regularly employed rehabilitation counselors from intake to placement and/or discharge; reporting/charting and all documentation requirements as set forth by the organization, evaluation of student performance (including self-evaluation, field site supervisor evaluation, and faculty supervisor evaluation). Note: contributes towards the mandatory 600-hour clinical internship requirements as outlined for CORE accreditation and CRCC certification. (AHRC 5416 is 4 graduate credit hours; AHRC 5517 is 5 graduate hours) Courses may be repeated if the 600 hour requirement is not met, and may be taken simultaneously.

AHRC 5611 Practicum (6 credits) Supervised rehabilitation counseling practicum fostering personal growth, skills development, and insights into the rehabilitation counseling process and issues that affect service delivery. Includes both on-campus and classroom experiences (audio/videotape and individual/group interactions) and off-campus experiences in settings that facilitate the development of basic rehabilitation counseling and practice skills. This course may be repeated if the 100 hour requirement is not met. Completion of this course is a prerequisite for the internship phase of the program (AHRC 5416 and AHRC 5517).

# SCHOOL OF ALLIED HEALTH SCIENCES FACULTY

AMLANI, Amyn, Assistant Professor of Speech, Language and Hearing Sciences, 2002; B.A. University of the Pacific, 1993; M.S. Purdue University, 1995; Ph.D., Michigan State University, 2003.

AOYAMA, Katsura, Assistant Professor of Speech, Language and Hearing Sciences, 2002; B.A., Kansai University, Japan, 1995; M.A., University of Hawaii, 1997; Ph.D., University of Hawaii, 2000.

BOGSCHUTZ, Renee, Assistant Professor of Speech, Language and Hearing Sciences, 2001; B.A., Eastern New Mexico University, 1993; M.S., Eastern New Mexico University, 1995; Ph.D., University of Iowa, 2000.

BORDER, Barbara G., Professor and Program Director of Molecular Pathology, 1993; B.A., Stephen F. Austin State University, 1974; B.S., University of Texas Southwestern Medical Center, 1977; MT (ASCP), 1977; Ph.D., University of Texas Southwestern Medical Center, 1988; CLSp (Molecular Biology), 2001.

BOSS, Jeffrey L., Assistant Professor of Occupational Therapy, 1998; B.S., Medical College of Georgia, 1985; M.S., Bowie State University, 1995.

BRISMEE, Jean-Michel, Assistant Professor of Physical Therapy, 1997; B.S., Catholic University of Louvain, Belgium, 1982; M.S., Texas Tech University, 1996.

BROOKE, Paul P., Dean, 1998; B.A., St. Joseph's Seminary & College, 1964; M.H.A., Baylor University, 1976; M.M.A.S., U.S. Army Command & Staff College, 1979; Ph.D., University of Iowa, 1986.

BROOKS, David J., Assistant Professor and Program Director of Rehabilitation Counseling, 2001; B.A., Northeastern Oklahoma State, 1969; M.S., Oklahoma State University, 1975.

CHESTNUTT, Jacqueline, Faculty Associate and Lab Manager in Clinical Laboratory Science, 2002; B.S., Texas Tech University Health Sciences Center, 1997.

CLOPTON, Nancy Ann, Associate Professor of Physical TherapiB;ex Tc0.003 2ES;6/MS,J15.44 0 Th00 Tc0 .S. ArmMfd0.2768N 1had175 Tweffrey Listant Pra-0.00.7(ciat)5n, Associat7bire7uthwesterMedi ELLIOTT, Loree, Assistant Professor of Clinical Support Services Management, 2003; B.B.A., West Texas A&M University, 1990; M.B.A., Wayland Baptist University, 1995.

EVERHARDT, Nancy, Assistant Professor and Program Director of Occupational Therapy, 1999; B.S., Texas Tech University, 1968; M.Ed., Texas Tech University, 1972; M.S., Texas Women's University, 1995.

FLORES-RIVAS, Lisa, Instructor in Speech, Language and Hearing Sciences, 1999; B.S., Texas Tech University, 1993; M.S., Texas Tech University Health Sciences Center, 1996; Au.D., Texas Tech University Health Sciences Center, 2002.

GILBERT, Kerry, Assistant Professor of Physical
LARSEN, Hal S., Associate Dean, Chair, Depa

SCHULTZ, Jared C., Assistant Professor of Rehabilitation Counseling, 2000; B.S., Brigham Young University, 1993; M.A., George Fox University, 1996; Ph.D., University of Northern Colorado, 2000.

SCHMITT, Mary Beth, Clinical Instructor in Speech, Language and Hearing Sciences, 2000; B.S., Texas Tech University Health Sciences Center, 1996; M.S., Texas Tech University Health Sciences Center, 1998.

SIMS, Frankie, Clinical Instructor in Speech, Language and Hearing Sciences, 1998; B.S., Texas Tech University Health Sciences Center, 1976; M.S., Texas Tech University, 1978.

SIZER, Phillip S., Program Director of Doctor of Science, Physical Therapy program, 2001; Associate Professor of Physical Therapy, 1990; B.S., University of Texas Medical Branch, 1985; M.S., Texas Tech University, 1994, Ph.D., Texas Tech University, 2002.

SMITH, L. DeAn, Instructor of Occupational Therapy, 1999; B.S., Texas Women's University, 1994; M.S., West Texas A&M University, 2002.

SMITH, Michael, Assistant Professor of Athletic Training, 2000; B.S., State University of New York-Plattsburgh, 1994; M.S., Arizona School of Health Sciences, 1997.

SPANNAGEL, Elaine, Assistant Professor of Physician Assistant Studies and Clinical Coordinator,

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