THE REGISTERED APPRENTICESHIP OCCUPATIONS AND STANDARDS CENTER OF EXCELLENCE (AOSC)

Physical Therapist Assistant National Occupational Framework

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Introduction to Using This Document

Under the Registered Apprenticeship Technical Assistance Centers of Excellence award, the Urban Institute leads the Occupations and Standards work. One of the main objectives of Urban's project is to create high-quality, well-researched, consensus-based work process schedules that are nonproprietary and widely available. This document is a product of that work and contains three sections: the occupational overview, the work process schedule, and the related technical instruction.

The **occupational overview** is a general introduction, including alternative job titles, any prerequisites, and, if applicable, the total number of hours needed to complete a time-based or hybrid program.

The **work process schedule** outlines the major job functions, competencies, and/or hours an apprentice completes in a registered apprenticeship program. It outlines what apprentices are expected to learn on the job with the support of a mentor or journeyworker (a worker mastering the competencies of an occupation in a particular industry), including both core competencies and those deemed optional by experts in the field. The work process schedule is the foundational document guiding a program.

Urban works with numerous experts to ensure the content is thoroughly researched and vetted to reflect the expectations of industry, educators, unions, and others for this occupation. Sponsors and others can use the work process schedule as their program standards with assurances it has been approved by experts in the field.

The **related technical instruction** presents considerations for the coursework that apprentices will undertake to supplement on-the-job learning. It is intended to serve as a reference to sponsors exploring their options for the accompanying classroom, virtual, or hybrid training.

How to Use the Work Process Schedule

Sponsors can adapt the work process schedule to accommodate their needs for competency- or time-based or hybrid programs. In a **competency-based** apprenticeship, sponsors assess apprentices' progress across core and optional competencies listed in the work process schedule. In a **time-based** apprenticeship, apprentices complete a predetermined number of hours across major job functions and the program overall. In a **hybrid** apprenticeship, sponsors monitor apprentices' hours spent on major job functions and assess their proficiency across competencies.

Each program type has a different method of assessment:

- **For a competency-based program**, apprentices engage in activities and make progress toward proficiency in the identified competencies. Sponsors overseeing apprentices' work assess their mastery of the outlined competencies using the following rating scale:

  4—Competent/proficient (able to perform all elements of the task successfully and independently)

  3—Satisfactory performance (able to perform elements of the task with minimal assistance)

  2—Completed the task with significant assistance

  1—Unsuccessfully attempted the task

  0—No exposure (note the reason—absence, skill isn't covered, etc.)

  The competencies may be completed in any order. Apprentices must perform at a level 4 or 3 in all competencies listed as "core" to complete the apprenticeship program successfully.

- **For a time-based program,** sponsors monitor apprentices' completion of hours in training across major job functions. The total number of hours recommended for this occupation is listed in the occupational overview and is based on guidance from the US Department of Labor. Generally, apprentices must have at least 2,000 hours overall for on-the-job learning, but occupations of greater complexity may require more hours. Sponsors will provide apprentices with supervised work experience and allocate the total number of hours across the major job functions to adequately train their apprentices.

- **The hybrid approach** blends both competency- and time-based strategies. Sponsors measure apprentices' skills acquisition through a combination of completing the minimum number of hours of on-the-job learning and successfully demonstrating identified competencies. Sponsors will assess apprentices' proficiencies as described for competency-based programs with a rating scale of 0–4 for every core competency. Generally, apprentices have at least 2,000 hours overall for on-the-job learning, but occupations of greater complexity may require more hours. Sponsors will document apprentices' completion within a minimum and a maximum range of hours assigned for each major job function.

Physical Therapist Assistant Occupational Overview

Occupational Purpose and Context

Physical therapist assistants (PTAs) generally provide therapy to patients following a care plan specified by and under the direction and supervision of a physical therapist. PTAs treat patients using thermal, electrical, and other modalities and provide various therapeutic interventions, including balance and gait training, stretching, therapeutic massages, and other physical treatments. They guide patients in the use of numerous assistive devices and equipment and lead patients through therapeutic exercises. They also educate patients and caregivers in self-administered treatments and therapeutic activities. PTAs report patients' treatments and measure patients' treatments and therapy outcomes, reporting information to the supervising physical therapist.

Potential Job Titles

Physical therapist assistant (PTA). Although the following are not official job titles, some PTAs are occasionally referred to as certified physical therapist assistants, licensed physical therapist assistants, or physical therapy assistants.

Apprenticeship Prerequisites

PTAs typically enter the occupation after completing a PTA associate's degree from a college program accredited by the Commission on Accreditation in Physical Therapy Education (CAPTE). To obtain licensure or certification before starting work, PTAs must also pass a national examination administered by the Federation of State Boards of Physical Therapy (FSBPT) and frequently other examinations such as a state legal exam.

Recommended Length of Apprenticeship (Time/Hybrid Programs Only)

The recommended length of time for on-the-job learning in a Physical Therapy Assistant apprenticeship is 2,000 (intermediate-level) to 3,000 hours (advanced-level).

Work Process Schedule

Physical Therapist Assistant

ONET Code: 31-2021.00
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Instructions for Use:

Competency-based programs: In the "performance level achieved" column of the work process schedule (see examples starting on the next page), assess apprentices' performances on each competency with the scale below. No monitoring of hours is required for this approach. See "Guidelines for Competency-Based, Hybrid and Time-Based Apprenticeship Training Approaches," US Department of Labor, Employment and Training Administration, Office of Apprenticeship, October 20, 2015, https://www.apprenticeship.gov/sites/default/files/bulletins/Cir2016-01.pdf.

4—Competent/proficient (able to perform all elements of the task successfully and independently)
3—Satisfactory performance (able to perform elements of the task with minimal assistance)
2—Completed the task with significant assistance
1—Unsuccessfully attempted the task
0—No exposure (note the reason—absence, skill isn't covered, etc.)

Time-based programs: In the "hours" row, specify the number of hours apprentices will fulfill for each job function. No assessment of competencies is required for this approach.

Hybrid programs: In the "performance level achieved" column, assess apprentices' performances on each competency using the 0–4 scale above. In the "hours" row, identify a range of hours apprentices should spend working on each major job function.

Job Function 1: Implementing the treatment plan (under supervision of a physical therapist)		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Implements the care plan developed by the supervising physical therapist (according to the physical therapist's evaluation, diagnosis, and prognosis)	Core	
B. Determines if there is a need to confer with the supervising physical therapist regarding changes in the patient's condition or in recognition of the patient's developmental, psychosocial, cultural, or economic factors	Core	
C. Follows instructions from the supervising physical therapist for treatments to be performed only by the supervising physical therapist	Core	
D. Complies with the supervising physical therapist's guidance on the conclusion of an episode of care	Core	

Job Function 2: Administering treatments and medications by thermal, electrical, and other modalities		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Conducts electrical stimulation therapy and uses electrotherapeutic modalities	Core	
B. Administers continuous and pulsed ultrasound	Core	
C. Conducts thermal therapy	Core	
D. Administers diathermy treatment	Core	
E. Applies one or more cryotherapy treatments	Core	
F. Provides hydrotherapy	Core	
G. Administers mechanical traction	Core	
H. Administers pneumatic compression pumping	Core	
I. Applies iontophoresis	Core	

J. Applies phonophoresis	Core	
K. Conducts light therapy, including low-level laser and infrared	Core	

Job Function 3: Performing physical therapy procedures		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Provides draping to maximize dignity and minimize exposure when applying physical therapy procedures	Core	
B. Provides therapeutic wound and burn care	Core	
C. Conducts passive and active joint mobility	Core	
D. Provides active, active-assisted, and passive range-of-motion therapies	Core	
E. Treats pulmonary conditions using postural drainage, percussions, or vibrations	Core	
F. Applies and adjusts orthotic and prosthetic devices	Core	
G. Fits patients for assistive devices such as crutches, walkers, canes, and wheelchairs	Core	
H. Applies taping procedures and techniques	Core	
I. Assists patients in putting on, adjusting, and removing assistive devices such as braces, splints, or slings	Core	
J. Assists the supervising physical therapist with specialized physical therapy treatments, such as for cardiac, obstetric, pediatric, or burn patients	Core	
K. Provides neuromuscular rehabilitation	Core	
L. Provides allowed treatments for balance and vestibular disorders	Core	
M. Applies integumentary repair and protection techniques	Core	
N. Employs soft tissue mobilization techniques	Core	
O. Administers therapeutic massages	Core	
P. Employs surface electromyogram biofeedback	Optional	

Q. Appropriately moves and repositions patients using lift-assist and transfer-assist devices	Core	

Job Function 4: Guiding the patient through therapeutic activities and exercises		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Implements isometric, isotonic, and isokinetic exercise regimens in a treatment program for selected musculoskeletal disorders	Core	
B. Guides patients through open- and closed-chain kinetic exercises	Core	
C. Directs patients through balance and stabilization exercises	Core	
D. Guides patients through exercises to enhance flexibility and muscle performance	Core	
E. Provides pre-gait, transfer, and gait training	Core	
F. Delivers training in use of prosthetics	Core	
G. Provides therapeutic exercise for proprioceptive neuromuscular facilitation	Core	
H. Guides patients through aquatic therapy, including aquatic exercise programs	Core	
I. Facilitates neurodevelopmental training for patients with neurological deficits	Core	
J. Provides positioning and therapeutic exercises for patients with amputations	Core	
K. Delivers activity-tolerance training for patients with cardiopulmonary disorders	Core	

Job Function 5: Instructing patients and caregivers in techniques for maximizing functional abilities		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Teaches home exercise programs emphasizing body mechanic training, postural awareness, and joint protection	Core	
B. Trains patients in the use of home exercise and gym equipment	Core	
C. Teaches breathing exercises to treat respiratory conditions	Core	
D. Provides instruction to patients with special needs (including cardiopulmonary patients, obstetric patients, patients with neurological dysfunction, and patients with amputations)	Core	
E. Trains patients in the use and care of orthoses, prostheses, and assistive devices	Core	
F. Teaches patients to use assistive devices such as walkers, crutches, and wheelchairs	Core	
G. Teaches patients to use appropriate medical equipment	Core	
H. Teaches modified activities of daily living as needed	Core	
I. Educates patients and caregivers in safe posture and body mechanics	Core	
J. Teaches nonpharmacological pain management	Core	
K. Teaches techniques and aids for stress management	Core	

Job Function 6: Performing continuous patient status measurements (as delegated by a supervising physical therapist)		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Assesses patient pain status through nonverbal cues and patient-directed questions	Core	
B. Assesses the patient's level of sensation	Core	
C. Measures respiratory indicators, including breathing patterns at rest or in activity, chest wall expansion and excursion, oxygen saturation, and cough and sputum characteristics	Core	
D. Measures vital signs and cardiac response to activity	Core	
E. Measures edema in extremities	Core	
F. Assesses skin condition, changes, and integrity	Core	
G. Measures status and progression of patient locomotion, gait, and balance	Core	
H. Measures functional range of motion	Core	
I. Measures muscle performance, tone, contractility, mass, and flexibility	Core	
J. Monitors posture and alignment of trunk and extremities	Core	
K. Measures skin, muscle, and sensation responses to electrotherapeutic modalities	Core	
L. Watches for and recognizes signs of abuse	Core	

Job Function 7: Communicating with patients, caregivers, supervising physical therapists, and other health care providers		
Hours (time-based and hybrid programs only)**: N/A**		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Exercises cultural sensitivity and humility in verbal and nonverbal communication	Core	
B. Communicates the care plan to the patient in a way that maximizes patient engagement with treatment	Core	
C. Clearly communicates the description and purpose of each modality, treatment, and exercise to the patient	Core	
D. Interviews patients, clients, caregivers, and family to learn prior and current functional levels and their response to treatment	Core	
E. Applies understanding of cultural, gender, aging, and family dynamics to discussions with patients and their families	Core	
F. Participates in planning sessions with the supervising physical therapist	Core	
G. Compiles and communicates the patient's effective data for review (by the supervising physical therapist) to determine changes in treatment plans and discharge planning	Core	
H. Coordinates treatment schedules with other health care providers	Core	
I. Communicates professionally and clearly with support staff	Core	
J. Adheres to HIPAA (Health Insurance Portability and Accountability Act) standards for patient privacy	Core	

Job Function 8: Providing patient care and progress (with the oversight of the supervising physical therapist)		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Documents services rendered to each patient or client clearly, accurately, and in adherence to standards of state practice acts, the practice setting, and other regulatory agencies	Core	
B. Records patient status, patient progress, and patient response to intervention	Core	
C. Documents patient and caregiver teaching activities	Core	
D. Logs equipment use, needs, and concerns	Core	
E. Participates in the documentation of discharge planning as directed by the supervising physical therapist	Core	
F. Uses the International Classification of Functioning, Disability, and Health to appropriately describe a patient's impairments, activity, and participation limits	Core	
G. Records billing information	Core	
H. Documents and reports signs and symptoms of abuse	Core	

Job Function 9: Assisting with administrative and nonpatient activities		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Prepares instruments and physical therapy equipment for use	Core	
B. Monitors physical therapy equipment to ensure proper functioning	Core	
C. Participates in data collection for quality assurance	Core	
D. Supports the training and clinical education of aides and physical therapy students	Core	
E. Maintains inventories of equipment and supplies	Optional	
F. Monitors cleanness of treatment areas	Core	
G. Prepares patient treatment areas for use	Optional	
H. Cleans work area and checks and stores equipment after treatment	Core	
I. Supports clinic billing and administrative functions as allowed by law and insurance regulations	Core	

Job Function 10: Following protocols for the safety of patients and care providers		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Maintains training in emergency techniques such as airway clearance, cardiopulmonary resuscitation, and use of automated external defibrillators	Core	
B. Practices infection control using handwashing and other transmission-based precautions, isolation techniques, and disinfecting agents	Core	
C. Employs universal precautions through appropriate use of masks, bonnets, gowns, gloves, and goggles	Core	
D. Appropriately handles needles and sharps	Core	

Job Function 11: Maintaining professional development, skill development, and lifelong learning		
Hours (time-based and hybrid programs only):		
Competencies	**Core or optional**	**Performance level achieved (0–4)** (competency-based and hybrid programs only)
A. Maintains licensure and safety certifications	Core	
B. Participates in continuing education, staff development, and lifelong learning opportunities	Core	
C. Participates in professional organizations	Optional	
D. Volunteers or supports community education or other activities benefiting the public	Core	
E. Demonstrates caregiver self-care, reducing vulnerability to clinical burnout	Core	
F. Applies knowledge of state and federal laws, professional values, standards of practice, and standards of ethical conduct to experiences in the clinical setting	Core	
G. Practices safe posture and body mechanics in any patient setting	Core	
H. Uses the correct tools to appropriately move and reposition patients	Core	
I. Follows appropriate precautions working around intravenous lines, tubes, catheters, and monitoring devices	Core	
J. Appropriately responds to dangerous or emergency situations involving therapy equipment and treatment modalities	Core	
K. Prepares and responds appropriately to facility and environmental emergencies	Core	
L. Adheres to OSHA (Occupational Safety and Health Administration) guidelines	Core	

Related Technical Instruction

Physical Therapist Assistant

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Instructions for Use:

Registered apprenticeships must include at least 144 hours of related technical instruction (RTI). Courses offered by accredited colleges and universities may be assigned a credit hour determination rather than a contact hour determination. In general, an academic credit unit is the equivalent of 15 clock hours of classroom instruction or 45 hours of laboratory instruction. PTAs are licensed professionals who must complete an associate's degree program, which significantly exceeds the 144-hour registered apprenticeship requirement. Some colleges and universities offer PTA programs at the baccalaureate level or as bridge programs for those who have completed degrees in other fields and need to complete only the technical training components of a PTA degree program or who are transitioning from military service.

PTA programs may require participants to have completed a certain portion of a degree program (such as all required coursework except clinical externships) before enrolling in the apprenticeship program. Apprenticeship programs in licensed allied health fields may cover just the clinical externship portion of a degree program or may be designed as a transition-to-practice program, in which case recent graduates are granted a temporary license to work in the field for a limited period while waiting to obtain their professional license.

Development and Use of This RTI Outline: PTA programs are offered exclusively by two- and four-year institutions of higher education and must be accredited by CAPTE. Though CAPTE reviews each program to ensure it is comprehensive and meets the quality standards articulated by the agency(meaning all programs provide the same basic content), institutions may organize that content differently, use different names for courses that cover similar content, and sequence courses differently. Therefore, this RTI outline lists the key topics and learning objectives included in PTA educational programs under generic course names. Note that an individual PTA degree program may use different course names or distribute content and learning objectives differently among its required courses. This RTI outline does not include general education courses that may be an important part of degree completion and are required by CAPTE but are considered nontechnical courses and not part of the PTA major.

Licensure or certification requirements: All states require PTAs to be licensed by the state physical therapy licensing board. To be eligible for licensure, an individual must complete an approved associate's or baccalaureate PTA degree program, pass the PTA National Physical Therapy Examination (PTA-NPTE) offered by the FSBPT and meet certain other requirements such as passing a background check, meeting mobility requirements, or completing state-required training in medical ethics.

Degree requirements for licensure or certification, if applicable: To qualify for licensure, PTAs must graduate from an associate's or baccalaureate PTA degree program accredited by CAPTE.

Accreditation requirements of instructional provider for licensure or certification, if applicable:

- Currently (in 2022), PTAs in every state must graduate from an associate's or baccalaureate PTA degree program accredited by CAPTE.
- For a brief period in recent years, Florida did not require PTAs to graduate from a CAPTE-accredited degree program as long as an institutionally accredited college or university provided the PTA program. However, individuals who did not graduate from a CAPTE-accredited PTA program are not eligible to take the NPTE administered by the FSBPT and may not be able to become licensed in other states. To qualify for the Florida exemption regarding PTA program accreditation, an individual must have enrolled in their degree program between July 1, 2014, and July 1, 2016, and must have completed the program by July 1, 2018.

Anticipated changes in licensure or certification requirements, if known: None

Examples of state licensure or certification requirements:

Each state requires new PTAs to graduate from a CAPTE-accredited PTA degree program and pass the PTA-NPTE administered by the FSBPT. In addition, many states require individuals to complete and pass a criminal background check. State laws differ in the scope of practice defined for PTAs and the level of supervision required for PTAs. For example, some states require only general supervision of PTAs, meaning that a licensed physical therapist must be accessible to a PTA via telecommunication. In contrast, other states require the direct supervision of PTAs (meaning a licensed physical therapist must be in the outpatient suite of offices when a PTA provides services). Still, other states require the personal supervision of PTAs (meaning a licensed physical therapist must be in the treatment room with the PTA when services are provided). The Centers for Medicare & Medicaid Services also establishes requirements for the supervision of PTAs in clinics, private practices, hospitals, and home care settings.

Prerequisite knowledge, skills, or experience typically required by RTI providers for this occupation

Most institutions require students to complete several prerequisite courses in mathematics, statistics, biology, chemistry, social science, and English before being admitted to a PTA degree program. In addition, many institutions require students to have a minimum cumulative grade point average (based on grades earned for prerequisite courses) to be eligible for admission to a PTA program. Students will also have completed a substantial number of volunteer hours in a physical therapy office or clinic before applying for admission to a PTA program. These programs are highly competitive and have enrollment caps imposed either by CAPTE or by limitations in the number of clinical placements an institution has secured via contracts or memoranda of understanding with hospitals or clinics.

Note that colleges and universities offer many PTA programs only as full-time day programs. This is partly to ensure students can complete the required clinical externships (generally 40-hour-per-week commitments) during the regular workday, when qualified faculty or staff members are available to oversee student work. As a result, these PTA programs may prohibit students from engaging in outside work once enrolled.

Differences in coursework: The PTA curriculum must be approved by CAPTE and, as such, must meet minimum curricular requirements established by the agency. However, CAPTE does permit institutions to distribute those requirements differently across the curriculum and to name the courses using an institution's unique nomenclature. In addition, institutions establish their general education requirements for degree completion and set their standards for prerequisites for specific classes, meaning general education requirements for degree completion may differ between institutions. This outline reflects the key topics that will be included in a PTA degree program. But in many cases, the learning objectives listed may be covered in two different courses rather than within a single course. For example, most institutions divide the eight required credits of anatomy and physiology instruction into two four-credit classes. The distribution of curricular content between those two classes may differ from one institution to the next.

Anatomy and Physiology I and II
Hours: 6 credit hours of classroom instruction plus 2 credit hours of laboratory instruction (or 90 classroom hours plus 90 hours of laboratory study), typically divided into two terms or semesters
Sample learning objectives ▪ Explain the importance of maintaining homeostasis in the body and describe the various mechanisms used by the body's systems to do so. ▪ Name, identify, and describe the function of the components of the body's systems (integumentary, cardiovascular, nervous, respiratory, endocrine, digestive, lymphatic, urinary, reproductive, circulatory, and pulmonary). ▪ Explain the chemistry of living systems, including the structure of atoms and molecules; the importance of maintaining the appropriate pH or acid-base balance; the structure and function of cells; intercellular and intracellular movement, including by osmosis and diffusion; the chemistry of water, carbon, and oxygen; the structure and function of deoxyribonucleic acid and ribonucleic acid and the processes of transcription and translation; and cellular systems for the production and consumption of energy. ▪ Identify the key components of cells, tissues, organs, and organ systems. ▪ Explain the components and processes involved in cellular metabolism. ▪ Describe the most common sources of anatomical or physiological pathology and the impact of pathology on each of the body's systems. ▪ Demonstrate the use of basic laboratory equipment, including microscopes, dissection tools, spirometers, sphygmomanometers, hydrometers, blood typing and analysis, and centrifuges.

Kinesiology
Hours: 3 credit hours of classroom instruction plus 1 credit of laboratory instruction (or 45 classroom hours plus 45 laboratory hours)
Sample learning objectives ▪ Explain the principles of human movement and how the body maintains proper posture, movement, and mobility. ▪ Discuss ways to improve or optimize human lung capacity, muscle function, endurance, flexibility, and mobility. ▪ Define neuroplasticity and provide examples of adaptive and maladaptive plasticity that may affect a person's ability to sit, stand, or move. ▪ Explain the importance of motor control and motor learning and identify the main types of pathophysiology that interfere with motor control and movement. ▪ Define the role of biomechanics in maintaining the body's integrity, structure, and mobility. ▪ Identify neuropsychological structures, processes, functions, and pathology that enable or interfere with the body's structure and mobility. ▪ Describe the types of cognitive and psychological disorders that can interfere with an individual's strength, posture, flexibility, motor control, and movement. ▪ Explain the principles of exercise physiology and the importance of exercise and conditioning in maintaining physical, psychological, and cardiovascular health. ▪ Demonstrate the ability to use tools and instruments to measure proper body position, lung capacity and function, heart rate, gait, etc.

Psychology

Hours: 3 credit hours or 45 classroom hours

Sample learning objectives

- Explain the principles that govern human behavior and differentiate between individual personality differences and abnormal psychology.
- Explain the psychological, biological, social, and cultural factors that influence mental processes and behavior.
- Explain how human experiences can influence or affect the way individuals see themselves, others, and the world around them.
- Differentiate between evidence-based and non-evidence-based psychology theories and give examples of each.
- Explain the stages of normal human psychological development.
- List the major sources of psychological disorder, including genetic causes, accidents, injuries, experiences, or brain pathology.

Physical Therapy Techniques

Hours: 9–12 credit hours plus 4 laboratory credit hours (or 135–180 classroom hours plus 180 laboratory hours)

Sample learning objectives

- Describe the main types of interventions or therapies used by physical therapists and PTAs to support a patient care plan.
- Discuss the methods and contraindications for using biophysical agents to restore or optimize function, based on a patient's care plan. These methods may include the use of electrotherapeutic agents, compression therapies, cryotherapy, hydrotherapy, thermal agents, traction, and light therapies.
- Demonstrate the techniques used to improve airway clearance and to mobilize secretions.
- Describe the various assistive or adaptive devices used in physical therapy practice, prosthetics, and orthotics.
- Explain and demonstrate the ability to use manual therapy techniques.
- Explain the role of muscles in normal and abnormal biomechanics and identify the muscles involved in performing various movements or actions.
- Explain the role of the nervous system, neural plasticity, psychology, and cognitive function in biomechanics and movement and demonstrate effective techniques for training or retraining the body to perform certain movements or actions.
- Explain the role of professional ethics in physical therapy practice and provide examples of appropriate and inappropriate behaviors on the part of clinicians.

- Discuss the importance of patient education and the ability to communicate verbally and in writing to patients based on their age, cognitive abilities, and understanding of their body's systems.

Clinical Practice in Inpatient and Outpatient Facilities

Hours: 520–720

Sample learning objectives

- Obtain certification in CPR, first aid, and the use of automated external defibrillators.
- Demonstrate the ability to understand and explain a patient's care plan and list the short- and long-term goals of various care plans.
- Demonstrate the ability to perform a complete patient assessment, including the review of health records, before initiating a care plan and throughout treatment.
- Demonstrate the ability to listen carefully and follow instructions.
- Identify signs of patient stress, pain, fatigue, exhaustion, or medical conditions such as strokes, heart attacks, convulsions, and syncope (including vasovagal syncope) and describe the appropriate course of action one should take in each case.
- Describe the use of mechanical therapy such as exercise machines, electrostimulation, computer-assisted devices, and ultrasound to promote or improve movement.
- Explain and demonstrate the proper use of common physical therapy tools, such as exercise balls, resistance bands, hand weights, rubber balls, foam rollers, stretching straps, total resistance exercise systems, grip trainers, weighted medicine balls, and therapy putty.
- Demonstrate the ability to properly handle, position, lift, and move patients.
- Demonstrate the ability to explain to patients the goals of rehabilitative therapy, the treatments that will be applied in the clinical setting, and the exercises patients should engage in independently to enhance the effectiveness of rehabilitative or movement therapy.
- Demonstrate the ability to instruct patients in the proper use of crutches, canes, wheelchairs, wheelie braces, bandages, prosthetics, braces, slings, and other protective, rehabilitative, or restorative devices.
- Demonstrate the ability to properly use assistive devices found in clinics, outpatient facilities, and inpatient hospitals or rehabilitation centers, such as parallel bars, harnesses, lifting frames, and trapeze bars, to assist patients in sitting, standing, or walking.
- Demonstrate the ability to apply specialized PTA techniques and services for infants, children, the elderly, the infirmed, and individuals with developmental disorders.
- Demonstrate the ability to follow instructions, prioritize, and multitask in the clinical setting.
- Explain the scope-of-practice rules that determine the limitations and requirements of care provided by physical therapists and PTAs.

- Demonstrate the ability to interact with and clearly communicate to patients, exhibiting active listening skills and empathy.
- Demonstrate the ability to accurately record key elements of patient interviews and properly "chart" or record the physical therapy treatments performed in the clinical setting.
- Demonstrate the ability to identify and select the appropriate billing codes for various physical therapy treatments and devices provided to patients by inpatient and outpatient clinics.
- Explain the rules for payment or reimbursement for physical therapy services and demonstrate the ability to provide accurate information for the purposes of billing and third-party payment (private medical insurance, Medicare, Medicaid, private pay, etc.).
- Demonstrate the ability to work effectively in the clinical setting by arriving on time, dressing appropriately, following instructions and chain-of-command procedures, interacting properly and honestly with others, and following professional ethics.

Relevant military experience

Physical therapy specialists (US Army -MOS 68F), physical medicine apprentice (US Air Force – MOS 4J031), physical therapy technician (US Navy - 8404). Note that some US colleges and universities provide military bridge programs that recognize the knowledge and skills developed during military training and performance of duties and assist military veterans in transitioning to civilian careers in PTA.

Diversity, equity, and inclusion

Many college and university PTA programs include admission requirements (such as volunteer hours in a physical therapy clinical setting). They can be offered at locations or on schedules (such as full-time day schedules) that can be particularly challenging for nontraditional students, such as students with low incomes, older students, and students who are working parents. The American Physical Therapy Association's Committee on Diversity, Equity, and Inclusion provides information and resources designed to improve diversity, equity, and inclusion (DEI) in the field of physical therapy. However, CAPTE imposes requirements on academic programs that may conflict with the stated DEI goals of a parent professional organization. This has resulted in a lack of opportunity for and participation by underrepresented minorities in the PTA profession. According to Zippia.com, 78,136 PTAs are currently employed in the US in 2022, of whom 66.3 percent are women (34 percent are men and 7 percent are LGBTQ) and 72 percent are white (12.9 percent are Hispanic or Latino, 7.2 percent are Asian, and 6 percent are Black or African American). These results may indicate disparities in higher education. The industry should examine admissions practices and program offerings to identify and eliminate underlying practices that result in disparate impacts on underrepresented groups and prevent achieving DEI goals in this field.

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