

**College of St. Scholastica – Physical Therapy – Biology Transfer Pathway – A.S. Degree**  
 Campus: Itasca

**First Year**

<b>FALL SEMESTER 2025 – 17 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
BIOL 1561 – Gen Biol of Cells (MnTC Goal 3)	4	(3/1)
MATH 1215 – Statistics (MnTC Goal 4)*	4	(3)
ENGL 1231 – College Comp 1 (MnTC Goal 1)	4	(4)
PSYC 1220 – Lifespan Dev (MnTC Goal 5 & 7)*	3	(3)
ALHE 1610 – Medical Terminology*	1	(1)
ALHE 1xxx – Seminar 1*	1	(1)

<b>SPRING SEMESTER 2026 – 15 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
BIOL 1562 – Gen Biol of Organisms (MnTC Goal 3 & 10)	4	(3/1)
CHEM 1521 – Gen Chem 1 (MnTC Goal 3)	4	(3/1)
MATH 1220 – College Algebra (MnTC Goal 4)	3	(3)
HUM 1245 – World Religions (MnTC Goal 6 & 8)*	3	(3)
GENS 1xxx – Seminar 2	1	(1)

**First Year - Summer**

<b>SUMMER SEMESTER 2026 – 6 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
ENGL 1231 – College Comp 2 (MnTC Goal 1)	3	(3)
GOAL 6 – Creative Process/Interpretive Performance	3	(3)

**Second Year**

<b>FALL SEMESTER 2026 – 16 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
COMM 1210 – Introduction to Communication (MnTC Goal 1) OR COMM 1215 – Public Speaking (MnTC Goal 1) OR COMM 1220 – Interpersonal Communication (MnTC Goal 1)	3	(3)
BIOL 2371 – A & P 1 (MnTC Goal 3)*	4	(3/1)
BIOL 2320 – Microbiology (MnTC Goal 3)	4	(3/1)
CHEM 1522 – Gen Chem 2 (MnTC Goal 3)	4	(3/1)
ALHE 2xxx – Seminar 3	1	(1)

<b>SPRING SEMESTER 2027 – 15 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
BIOL 2372 – A & P 2 (MnTC Goal 3)*	4	(3/1)
BIOL 2330 – Genetics (MnTC Goal 3)	4	(3/1)
ECON 1200 – Intro to Econ (MnTC Goal 5 & 8)	3	(3)
PHIL 1230 – Ethics (MnTC Goal 6 & 9)	3	(3)
ALHE 2xxx – Seminar 4	1	(1)

**Second Year - Summer**

<b>SUMMER SEMESTER 2026 – 6 credits</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
PYSC 2261 – Abnormal Psyc (MnTC Goal 5 & 7)*	3	(3)

**\*Additional courses required for the College of St. Scholastica Physical Therapy Graduate Program, but not A.S.**

**Required Courses for College of St. Scholastica Physical Therapy Graduate Program**

<b>COURSES (all four courses are required)</b>	<b>Credits</b>	<b>Hr Lc/Lb</b>
BIOL 1561 – Gen Biol of Cells (MnTC Goal 3)	4	(3/1)
BIOL 1562 – Gen Biol of Organisms (MnTC Goal 3 & 10)	4	(3/1)
BIOL 2371 – A & P 1 (MnTC Goal 3)	4	(3/1)
BIOL 2372 – A & P 2 (MnTC Goal 3)	4	(3/1)
CHEM 1521 – Gen Chem 1 (MnTC Goal 3)	4	(3/1)
CHEM 1522 – Gen Chem 2 (MnTC Goal 4)	4	(3/1)
PHYS 1211 – College Phys 1 (MnTC Goal 3)	4	(3/1)
PHYS 1212 – College Phys 2 (MnTC Goal 3)	4	(3/1)
ALHE 1610 – Medical Terminology	1	(1)
MATH 1215 – Statistics (MnTC Goal 4)	4	(3)
PHYC 1220 – Lifespan Dev (MnTC Goal 5 & 7)	3	(3)

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PYSC 2261 – Abnormal Psyc (MnTC Goal 5 & 7)	3	(3)
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Note:

### Program Description

The Biology Transfer Pathway AS offers students a powerful option: the opportunity to complete an Associate of Science degree with course credits that directly transfer to designated Biology bachelor's degree programs at College of St. Scholastica, University of Minnesota – Duluth, and Minnesota State universities. The curriculum has been specifically designed so that students completing this pathway degree are on track for completing a bachelor's degree in biology and entering the physical therapy graduate program at the College of St. Scholastica. Most courses in the transfer pathway associate degree will transfer and apply to the designated bachelor's degree programs in a related field.

### Occupational Description

A physical therapist (PT) is a healthcare professional who specializes in diagnosing and treating individuals who have physical impairments or disabilities due to injury, illness, or aging. Physical therapists help patients restore mobility, improve physical function, reduce pain, and prevent further injury or disability. Their work is essential in aiding recovery and enhancing the quality of life for individuals with physical challenges. Key responsibilities of a physical therapist include:

1. **Assessment and Diagnosis:** Physical therapists assess patients' physical condition through various diagnostic techniques, including physical examinations, medical history reviews, and imaging studies. They identify the root causes of movement dysfunctions, pain, or disabilities.
2. **Treatment Planning:** Based on the assessment, PTs develop individualized treatment plans tailored to each patient's needs, goals, and abilities. These plans often include exercises, manual therapy, and other interventions designed to improve mobility, strength, flexibility, and function.
3. **Therapeutic Exercises:** PTs guide patients through exercises and activities designed to restore or enhance physical function. This may include exercises to improve strength, balance, coordination, endurance, and range of motion.
4. **Manual Therapy:** Physical therapists use hands-on techniques, such as massage, joint mobilization, and manipulation, to relieve pain, reduce swelling, and promote healing.
5. **Pain Management:** They employ various methods to manage and alleviate pain, including heat and cold therapy, electrical stimulation, ultrasound, and other modalities.
6. **Education and Prevention:** PTs educate patients about their condition, treatment plan, and how to perform exercises correctly at home. They also provide advice on injury prevention, ergonomics, and healthy lifestyle choices to prevent future injuries or disabilities.
7. **Rehabilitation:** Physical therapists are heavily involved in rehabilitation after surgeries or injuries, such as knee or hip replacements, fractures, or sports injuries. They work to restore function, help patients regain independence, and improve their overall quality of life.
8. **Monitoring Progress:** PTs continuously monitor and document patients' progress throughout the treatment process. They adjust treatment plans as needed to ensure that patients achieve their rehabilitation goals.
9. **Collaboration:** Physical therapists often work closely with other healthcare professionals, such as physicians, occupational therapists, and nurses, to provide comprehensive care. They may also collaborate with families and caregivers to ensure the best outcomes for patients.

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10. Specialization: Some physical therapists specialize in areas such as sports medicine, orthopedics, pediatrics, geriatrics, neurology, or cardiovascular and pulmonary rehabilitation.

Physical therapists typically hold a Doctor of Physical Therapy (DPT) degree and must pass national and state licensing exams to practice. They work in various settings, including hospitals, outpatient clinics, rehabilitation centers, nursing homes, schools, and private practices. PTs play a critical role in helping individuals recover from physical limitations, regain independence, and improve their overall quality of life.

### **Program Learning Outcomes**

Students of this program will:

1. **SCIENTIFIC METHOD:** Propose testable hypotheses and carry out experiments using standardized international measurement systems.
2. **MICROSCOPY:** Use the light microscope effectively.
3. **DATA INTERPRETATION & STATISTICAL ANALYSIS:** Analyze simple data sets using appropriate descriptive and inferential statistics.
4. **SCIENTIFIC COMMUNICATION:** Communicate data and analysis in oral and written format.
5. **COLLABORATION:** Communicate and work productively with others in designing, conducting, and evaluating projects and experiments.
6. **SCIENTIFIC LITERATURE:** Use public literature databases to find appropriate published material and read, understand, and evaluate the validity and importance of the scientific literature.
7. **SCIENCE & SOCIETY:** Analyze scientific studies considering their ecological, social, economic, ethical, and cultural implications.
8. **INTERDISCIPLINARY NATURE OF SCIENCE:** Students utilize other disciplines as sources of context and skills to inform their learning and work.

### **Transfer and Articulation Agreements**

The program maintains articulation agreements with the College of St. Scholastica, the University of Minnesota, Duluth, and Minnesota State University, Mankato. These agreements facilitate the transfer of credits and allow ample time to complete an additional minor.

### **Program Faculty Contact**

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