

Exercise Science

ASSOC OF SCIENCE

Major code: 1002

Department: Physical Education

Chair: Tara Dominick

PROGRAM OVERVIEW

The Associate of Science in Exercise Science program offers students a comprehensive foundation in the principles and practices of exercise science. This program is designed to prepare students for entry-level positions in fitness centers, rehabilitation facilities, corporate wellness programs, and other related fields, as well as provide a solid academic pathway for those intending to pursue further education in exercise science or related disciplines.

PROGRAM/DISCIPLINE OUTCOMES

Students who complete this area of study will be prepared to:

- Demonstrate an understanding of human anatomy and physiology relevant to exercise, including structure and function of major organ systems, muscles and joints.
- Interpret specific research related to exercise physiology, bio-mechanics and demonstrating comprehension of the key concepts related to exercise science.
- Apply exercise principles to design safe and effective exercise programs for diverse populations, considering factors such as age, fitness level, and health status.
- Crucially evaluate exercise techniques and interventions, analyzing their effectiveness in improving cardiovascular fitness, muscular strength, flexibility, and overall health.
- Assess the impact of exercise on physical health, utilizing outcome measures such as fitness assessments, performance metrics and subjective well-being surveys to evaluate program effectiveness.

DISTRIBUTION REQUIREMENTS (9 CREDITS)

Arts & Letters (6)

Social Science (3)

REQUIRED COURSES (77 CREDITS)

Courses are listed in suggested sequence.

YEAR 1

<u>COURSE #</u>	<u>COURSE TITLE</u>	<u>CREDITS</u>
- BIOL 101	GENERAL BIOLOGY.....	4
- CHEM 104 Z	INTRODUCTION TO CHEMISTRY.....	4
- CHEM 124 Z	INTRODUCTION TO CHEMISTRY LAB....	1
- HDEV 112	FRESHMAN SEMINAR.....	1
- HPE 120	FIRST AID & CPR.....	2
- HPE 201	PERSONAL TRAINING.....	3
- HPE 259	INTRO TO ATHLETIC TRAINING I.....	3
- HPE 261 J	TAPING & BRACING.....	2
- HPE 288	SCIENCE OF COACHING YOUTH SPORTS..	3
- HPE 295	HEALTH & FITNESS FOR LIFE.....	3
- MATH 111 Z	PRECALCULUS I: FUNCTIONS.....	4
- SOC 205 Z	SOCIAL CHANGE AND INSTITUTIONS.....	4
- WR 121 Z	COMPOSITION I.....	4
- WR 122 Z	COMPOSITION II.....	4

YEAR 2

<u>COURSE #</u>	<u>COURSE TITLE</u>	<u>CREDITS</u>
- COM 111Z-PUBLIC SPEAKING (4 credits) or SP 219- SMALL GROUP DISCUSSION (3 credits).....		3
- CHEM 221Z General Chemistry.....		5
- BIOL 231 Z	HUMAN ANATOMY & PHYSIOLOGY I.....	4
- BIOL 232 Z	HUMAN ANATOMY & PHYSIOLOGY II.....	4
- BIOL 233 Z	HUMAN ANATOMY & PHYSIOLOGY III.....	4
- EXSI 220	INTRO TO ATHLETIC INJURIES.....	3
- EXSI 270	APPLIED ANATOMY.....	3
- EXSI 280	INTERNSHIP: EXERCISE SCIENCE.....	2
- HPE 131	INTRO TO P.E. & HEALTH.....	3
- PSYC 201 Z	INTRODUCTION TO PSYCHOLOGY I.....	4

Total number of credits..... 86