Exercise Science and Nutrition (MS) Student Learning Outcomes:

- 1) Exhibit mastery of foundational and supporting areas of exercise science and nutrition, resulting in safe and effective exercise programming.
- 2) Demonstrate proficiency in clinical-based testing (clinical track) or advanced athletic performance-based testing (performance track).
- 3) Develop ability to access, evaluate, and disseminate scientific evidence.
- 4) Provide active and meaningful participation in affiliated clinical or performance-based settings while adhering to the Code of Ethics as defined by the ACSM (clinical track) or NSCA (performance track) professional organizations.

Table 1 outlines the goals we expect each exercise science student will achieve as well as how each of the objectives will be assessed throughout the Exercise Science and Nutrition Master's program.

Table 1. Exercise Science and Nutrition Goals and Assessment Methods

Goal	Track	Objective	Course	Assessment Method
1) Exhibit mastery of foundational and supporting areas of exercise science and	Both tracks	Students will demonstrate mastery in the governing laws of thermogenics as well as processes that govern macronutrient	401	Quizzes, Exams, Research Briefs
nutrition, resulting in safe and effective		metabolism.	523-C	Exams, Research Essays
exercise programming			524-C	Quizzes, Examinations
			531-P	Exams
			533-P	Exams
			562/563	Comprehensive Exams
			564/565	Comprehensive Exams
		Students will outline the anatomical features of the cardiovascular system, as well as describe homeostatic and limiting mechanisms	401	Quizzes, Exams, Research Briefs and Essays
			412	Minimally Assessed
			524-C	Exams and Oral Presentation
				(3), Comprehensive Exam
			562/563	Comprehensive Exams
			564/565	Comprehensive Exams
		Students will outline the anatomical features of the pulmonary/ventilatory system, as well as describe homeostatic and	401	Quizzes, Exams, Research Briefs and Essays
		limiting mechanisms	412	Minimally Assessed
			524-C	Quizzes, Exams and Oral Presentation (2)
			562/563	Comprehensive Exams
			564/565	Comprehensive Exams
		Students can describe methodologies, validity, and reliability for a	401	Quizzes, Examinations
		variety of body composition methodologies, including skinfolds,	562/563	Comprehensive Exams
		bioelectrical impedance, and whole-body air displacement plethysmography	565/565	Comprehensive Exams

Students will outline the macro and microanatomical features of skeletal muscles, as well as describe theories regarding contraction	402	Quizzes, Exams, Research Briefs and Essays
and plasticity in response to physical training, disuse, or disease	412	LAB Assignment Exams , Exams and Oral Presentation (1)
	521-C	Quizzes, Examinations and Oral Presentation (1)
	533-P	Exams
	534-P	Exams, Oral Presentations
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students will describe the acute and chronic effects of exercise on the	402	Quizzes, Exams, Research Briefs and Essays
endocrine system, as well as endocrine-mediated adaptations to exercise	521-C	Quizzes, Exams and Oral Presentation (1)
	523-P	
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students can describe the acute effect and adaptive responses to	402	Quizzes, Exams, Research
environmental stressors such as heat, cold, altitude, and microgravity.	FC2/FC2	Briefs and Essays
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students will outline the anatomical features and functions of the	401	Quizzes, Exams, Research
gastrointestinal system, as well as describe homeostatic and control	44.2	Briefs and Essays
mechanisms related to hunger, satiation, and satiety	412	Not Assessed
	562/563	Comprehensive Exams
	564/565	Comprehensive Exams
Students can provide an overview of all primary nutrition related risk factors for cardiovascular disease	404	Graded Participation, Exams, Research Briefs
	523-C	Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students can provide an overview of all primary nutrition related risk factors for breast, prostate, and colon cancer	404	Graded Participation, Exams, Research Briefs
actors for breast, prostate, and colori cancer	523-C	Exams
	562/563	Comprehensive Exams
Students can provide an overview of all primary nutrition related risk	565/565 404	Graded Participation, Exams,
factors for osteoporosis		Research Briefs
	523-C	Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams

Students can provide an overview of all primary nutrition related risk factors for neurodegenerative diseases	404	Graded Participation, Exams, Research Briefs
	523-C	Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students can provide an overview of all primary nutrition related risk factors for type II diabetes/insulin resistance	404	Graded Participation, Exams, Research Briefs
	523-C	Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students can explain multiple prominent theories regarding the	404	Not assessed
current obesity epidemic, as well as treatment outcomes	523-C	Exams, Research Briefs
	562/563	Comprehensive Exams
Students will be able to outline common nutritional deficiencies and	523-C	Exams
toxicities seen in athletic or clinical settings	531-P	Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Students will have the ability to provide a variety of alternate food	404	Mock counseling assignments
choices for mock clientele seeking nutritional counseling (i.e., wide knowledge of food independent of nutrition)		– minimally assessed
Analyze and describe human movements in anatomical terms	412	Lab Assignment Exams, Exams
(motions, planes, axes, osteokinematics and arthrokinematics)		and Oral Presentation (1)
	534-P	Lab Assignment, Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Identify and locate key anatomical structures as they pertain to	412	Lab Assignment Exams, Exams
specific motions/movements and physical skills (bones, muscles,		and Oral Presentation
connective tissues, attachments, nerves)	534-P	Lab Assignment, Exams
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Describe the etiology and scope of selected pathologies and injuries	412	Exams and Oral Presentation
and their effects on specific body regions during select physical	562/563	Comprehensive Exams
activities and functions	565/565	Comprehensive Exams
Analyze results of and identify the anatomical structures assessed	412	Lab Assignment Exams, Exams
during select musculoskeletal tests		and Oral Presentation
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Select appropriate conditioning and re-conditioning exercises for	412	Examinations and Oral
improving strength, flexibility, stability and physical function	= co /= cc	Presentation (1)
	562/563	Comprehensive Exams
	565/565	Comprehensive Exams
Identify and develop professional skills associated with the exercise	411	Provision of Health Promotion

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	science profession including professionally oriented writing, oral presentations, and health and fitness promotion		Service/Activity
	Identify and develop professional networking skills within and outside	411	Attendance and written report
	of the university	411	of professional meeting
Clinical only	Students can discuss the rationale, efficacy, and side effects of	523-C	Exams
	popular herbal and non-herbal supplements	562/563	Comprehensive Exams
	Students can provide argument for the safety of genetically modified	523-C	Exams
	organisms	562/563	Comprehensive Exams
	Students can develop and administer exercise programs designed to	521-C	Exams and Oral Presentation
	enhance cardiorespiratory fitness, muscular strength and endurance,		and Comprehensive Exam
	balance, and range of motion for patients/clients challenged with	524-C	Exams and Oral Presentation
	cardiovascular, pulmonary, metabolic, orthopedic, musculoskeletal,		(3), and Comprehensive Exam
	neuromuscular, neoplastic, immunologic, or hematologic diseases and	562/563	Comprehensive Exams
	in apparently healthy individuals		
	Demonstrate effective listening and communication skills for helping	522-C	Exams
	people change behavior		
	Apply health behavior change models to physical activity promotion	522-C	Exams, Behavioral Theory
	and rehabilitation		Paper
	Understand barriers to, and enablers for, exercise among specific	522-C	Exams
	populations (e.g. women, children, patients in clinical settings, ethnic		
	and racial minorities)		
	Synthesize research findings from individual, interpersonal,	522-C	Exams, Behavioral theory
	community, environment, and policy levels as they apply to physical		Paper
	activity determinants and interventions		
	Develop the ability to understand and interpret key findings from	521-C	Exams and Comprehensive
	results of specific diagnostic tests, pre-activity screening evaluations		Exams
	and clinical and field-based physical performance tests	562/563	Comprehensive Exams
	Describe and demonstrate proper procedures for administering pre-	521-C	Exams
	activity screenings, risk-factor assessments and tests	562/563	Comprehensive Exams
	Describe and explain the effect(s) disease stage/category,	416	Quizzes, Tests
	progression, medical management and medications have on physical	521-C	Exams, Oral Presentation (1)
	activity tolerance and on physiologic responses to exercise	562/563	Comprehensive Exams
	Identify general and disease-specific indications, contraindications,	521-C	Exams and Oral Presentation
	"red flags" and termination criteria for administering clinical and field-		and Comprehensive Exams
	based functional tests	562/563	
	Determine specific exercise program goals and select appropriate	521-C	Exams and Oral Presentation
	outcomes measurement tools for clients with specific, co-morbid		(1)
	medical conditions (e.g., arthritis, osteoporosis, back pain, Parkinson's	562/563	Comprehensive Exams
	disease, and Multiple Sclerosis)		
	Identify appropriate modifications to exercise program development	521-C	Exams and Oral Presentation
	and pre-activity testing and screening procedures for persons with co-	562/563	Comprehensive Exams
	morbid conditions like low back pain, arthritis, osteoporosis,		

Parkinson's Disease, and Multiple Sclerosis)		
Explain/identify the role and scope of the clinical exercise physiologist	521-C	Exams
as a member of an interdisciplinary team of allied health professionals	562/563	Comprehensive Exams
Provide an overview of the pathophysiology of cardiovascular,	524-C	Exams and Oral Presentation
pulmonary, metabolic and some common co-morbid diseases and		(3)
disorders as they pertain to the exercise response and to physical	562/563	Comprehensive Exams
function		
Describe and employ specific methods and assessment tools to	524-C	Exams and Oral Presentation
determine and stage the severity of cardiovascular, pulmonary,		(3)
metabolic and related diseases	562/563	Comprehensive Exams
Describe common laboratory and field based exercise tests as they	524-C	Exams and Oral Presentation
pertain to persons with cardiovascular, pulmonary, metabolic, related		(3)
diseases and disorders	562/563	Comprehensive Exams
Discuss "disease management" and "exercise" information needs and	524-C	Exams and Oral Presentation
provide appropriate educational interventions for persons with		(3) and Comprehensive Exam
cardiovascular, pulmonary and metabolic diseases and disorders	562/563	Comprehensive Exams
Provide methods to facilitate the assessment and interpretation of 12	524-C	Exams and Oral Presentation
lead EKG rhythm strips, pulmonary function tests, pre-exercise		(3), Comprehensive Exam
physical examinations and disease specific symptom and disease	562/563	Comprehensive Exams
impact ratings		
Identify and describe appropriate goals, strategies and modifications	524-C	Exams and Oral Presentation
to facilitate the development of safe and effective exercise		(3), Comprehensive Exam
prescriptions for persons with cardiovascular, pulmonary, metabolic	562/563	Comprehensive Exams
and related diseases and disorders		
Describe and employ methods to enhance patient/client	524-C	Exams and Oral Presentation
supervision/observation, communication and effort/symptom		(3), Comprehensive Exam
monitoring during clinical testing and exercise sessions	562/563	Comprehensive Exams
Describe and determine appropriate exercise program outcomes and	524-C	Exams and Oral Presentation
methods to measure them in persons with cardiovascular, pulmonary,		(3)
metabolic and related diseases and disorders	562/563	Comprehensive Exams
Identify pathological processes associated with cardiovascular	524-C	Exams and Oral Presentation
diseases including coronary artery disease and congestive heart		(3), Comprehensive Exam
failure	562/563	Comprehensive Exams
Identify and distinguish between procedures and tests to diagnose	524-C	Exams and Oral Presentation
and add details to CVD related conditions		(3), Comprehensive Exam
	562/563	Comprehensive Exams
Identify and distinguish between commonly prescribed and related	416	Quizzes, Tests
medications within the context of exercise responses including	524-C	Exams and Oral Presentation
relevant side effects		(3), Comprehensive Exam
	562/563	Comprehensive Exams
Identify and distinguish between heart rate and rhythm responses to	524-C	Exams, Oral Presentation, and
exercise as well as infarction, ischemia, and paced rhythms via 3 and		Demonstration,
12 lead EKG interpretation		Comprehensive Exam

		562/563	Comprehensive Exams
	Distinguish between exercise prescription strategies for all phases of	524-C	Exams and Oral Presentation
	cardiac rehabilitation including congestive heart failure, ventricle		(3), Comprehensive Exam
	assist devices, and heart transplant patients	562/563	Comprehensive Exams
	Analyze approaches to cardiopulmonary training, resistance training,	524-C	Exams and Oral Presentation
	return to sport or vocation related training within a clinical exercise	5210	(3), Comprehensive Exam
	context	562/563	Comprehensive Exams
	Analyze exercise prescription and programming strategies associated	524-C	Exams and Oral Presentation
	with common comorbid conditions with special attention paid to	524 0	(3), Comprehensive Exam
	cancer and metabolic disease	562/563	Comprehensive Exams
	Analyze supporting health related services in cardiac rehabilitation	502/505 524-C	Exams and Oral Presentation
	and preventive settings including nutrition and stress	J24-C	(3)
		562/562	
	management/group support interventions	562/563	Comprehensive Exams
	Demonstrate proficiency in skills associated with exercise prescription	524-C	Exams and Oral Presentation
	and programming for cardiovascular and related diseases and	562/562	(3)
	conditions	562/563	Comprehensive Exams
	Address professional aspects associated with cardiac rehabilitation	524-C	Exams and Oral Presentation
	including a historical perspective, present challenges, and future		(3)
	trends within the broader context of allied health	562/563	Comprehensive Exams
Performance	Students can discuss the rationale, efficacy, and side effects of	531-P	Exams
only	popular dietary supplements marketed as ergogenic aids	564/565	Comprehensive Exams
	Students can outline acute and chronic exercise's effects on nutrient	531-P	Exams
	requirements and fluid needs	564/565	Comprehensive Exams
	Students can provide mechanisms explaining the Female Athlete Triad	531-P	Exams
		564/565	Comprehensive Exams
	Students will demonstrate an intimate knowledge of planar (2D) and	534-P	Exams
	three-dimensional kinematics as it applies to the analysis of human		
	movement.		
	Students will demonstrate an intimate knowledge of the kinetics of	534-P	Exams
	human movement. This includes the computation of forces and	554-1	Exams
	moments, both internal and external, that produce/prevent		
	movement.		
	movement.		
	Students will demonstrate an understanding of the importance and	534-P	Lab Assignment, Exams
	determination of body segment properties as it relates to		
	biomechanics (anthropometrics).		
	Students will demonstrate an appreciation of the mathematical	534-P	Lab Assignment, Exams
	principles enabling three-dimensional motion data collection.	554-P	Lab Assignment, Exams
	ירות איז		
	Student will be able to understand and appreciate the leading	532-P	Quiz
	theories in sport psychology as it pertains to the coaching field		
	Student will be able to understand and appreciate the application of	532-P	Quiz
	motivational theory	1	

		Student will be able to effectively coach skill development and structure practices	532-P	Quiz
		Student will be able to understand the fundamental principles of sports medicine as they pertain to the care and prevention of both acute and non-acute injuries	532-P	Assessed Mock Plan of Action
		Student will be able to appreciate differences in skill learning and motivational strategies for athletes of differing training backgrounds, age, gender and disability.	532-P	Quiz
		Student will be able to appreciate the philosophies and teaching styles of successful coaches in order to synthesize successful coaching strategies into the student's current philosophy	532-P	Observational Case Study (40 hours)
		Student will be able to effectively organize and plan micro, meso, and macrocycles in order to optimize athletic performance	533-P	Lab Assignment, Exams, Presentation
		Students can argue for or against the utility of various performance tests	533-P	Lab Assignment, In-Class Discussion/Debate, Presentation
		Students can defend multiple sides of well-documented controversies in the strength and conditioning field	533-P	Lab Assignment, In-Class Discussion/Debate
		Students will apply and defend the use of particular technologies for athlete feedback	533-P	Lab Assignment, In-Class Discussion/Debate, Exams
2) Demonstrate proficiency in clinical- based testing (clinical track) or advanced	Both tracks	Students will demonstrate the ability to set-up an exercise test using open circuit, indirect calorimetry	401	Laboratory Activity – not assessed
athletic performance-based testing (performance track)		Students will demonstrate the ability to use a variety of body composition methodologies, including skinfolds, bioelectrical	401	Laboratory Activity – not assessed
		impedance, and whole-body air displacement plethysmography	411	Provision of Health Promotion Service/Activity
		Students will be able to run a lactate threshold test, as well as interpret the results	401	Laboratory Activity – skill not assessed; interpretation assessed via laboratory assignment
		Students will be able to design and implement appropriate training regimes for elite endurance athletes and the underfit and/or overweight endurance athlete	414	Exam, Case Study
	Clinical only	Students will be able to conduct pre-participation health screening for patients and clients challenged with cardiovascular, pulmonary,	521-C	Exams and Oral Presentation and Comprehensive Exam
		metabolic, orthopedic, musculoskeletal, neuromuscular, neoplastic, immunologic, or hematologic diseases	524-C	Exams and Oral Presentation (3), Comprehensive Exam
		Students will be able to perform maximal and submaximal graded exercise tests for patients and clients challenged with cardiovascular,	521-C	Exams, Oral Presentation and Demonstration
	ρι	pulmonary, metabolic, orthopedic, musculoskeletal, neuromuscular, neoplastic, immunologic, or hematologic diseases	524-C	Exams, Oral Presentation (3), and Demonstration
		Students will be able to perform strength, flexibility and body composition tests for patients and clients challenged with	521-C	Exams, Oral Presentation and Demonstration

Program components, and clinical and illexity self-care for control of chronic disease and health conditions 524-C Exams and Oral Presentation (3) Students can outline procedures for proper exercise supervision for patients and clients challenged with cardiovascular, pulmonary, metabolic, orthegedic, musculoskeltal, neuromuscular, neoplastic, immunologic, or hematologic diseases 524-C Exams and Oral Presentation (3) Students can appropriately measure and evaluate exercise / physical activity assessment related outcome measures 524-C Exams and Oral Presentation (3) Demonstrate effective listening and communication skills for helping people change behavior. 522-C Exams, Comprehensive Exams Demonstrate proficiency in skills associated with EKG interpretation and monitoring 522-C Exams, Demonstration, Comprehensive Exams 3) Develop ability to access, evaluate, and disseminate scientific evidence Both tracks (access) Students can use Google Scholar and Pubmed to search for peer- reviewed articles related to their topic of interest. Students can also search websites from government and professional organizations for credible information 401 Research Briefs and Essays 402 Research Hariefs and Essays search websites from government and professional organizations for credible information 402 Research Hariefs and Essays search websites for government and professional organizations for credible information 401 Research Hariefs and Essays search Hariefs and Essays search			cardiovascular, pulmonary, metabolic, orthopedic, musculoskeletal, neuromuscular, neoplastic, immunologic, or hematologic diseases and in apparently healthy individuals and athletes	524-C	Exams, Oral Presentation and Demonstration
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3) Develop ability to access, evaluate, and disseminate scientific evidence Performance only Performance only <td></td> <td></td> <td>counseling/education to clients/patients about testing, exercise</td> <td>522-C</td> <td>Exams, Comprehensive exams</td>			counseling/education to clients/patients about testing, exercise	522-C	Exams, Comprehensive exams
patients and clients challenged with cardiovascular, pulmonary, metabolic, or hematologic, or hematologic diseases 524-C Exams and Oral Presentation (3) Students can appropriately measure and evaluate exercise/ physical activity assessment related outcome measures 521-C Exams, comprehensive Exams Students can appropriately measure and evaluate exercise/ physical activity assessment related outcome measures 522-C Exams, comprehensive Exams Demonstrate effective listening and communication skills for helping people change behavior. 524-C Exams, comprehensive Exams Demonstrate proficiency in skills associated with EKG interpretation and monitoring 522-C Exams, Demonstration, Comprehensive Exam 3) Develop ability to access, evaluate, and disseminate scientific evidence Perform the Functional Movement Screen and all tests of the NL combine. 533-R Iab Assignments and Exams 3) Develop ability to access, evaluate, and disseminate scientific evidence Both tracks (access) Students can use Google Scholar and Pubmed to search for peer- reviewed articles related to their topic of interest. Students can also search websites from government and professional organizations for credible information 401 Research Briefs and Essays 411 Proxision of Health Promotio Seavice/Activity Research Briefs and Essays 232-C Research Propodal, Exams 512-C Research Briefs				524-C	Exams and Oral Presentation (3)
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Demonstrate proficiency in skills associated with EKG interpretation and monitoring 524-C Exams, Demonstration, Comprehensive Exams Performance only Perform the Functional Movement Screen and all tests of the NFL combine. 533-P Lab Assignments and Exams 3) Develop ability to access, evaluate, and disseminate scientific evidence Both tracks (access) Students can use Google.Scholar and Pubmed to search for peer- reviewed articles related to their topic of interest. Students can also search websites from government and professional organizations for credible information 403 Literature Search Briefs and Essays 404 Research Briefs and Essays 404 Research Briefs and Essays 411 Protocal, Exams 404 Research Briefs and Essays 404 Research Briefs and Essays 404 Research Briefs and Essays 404 Research Briefs and Essays 411 Provision of Health Promotio Service/Activity 412 Oral Presentation 523-C Research Briefs and Essays 413 Health Advocacy Paper 523-C Research Briefs and Essays 523-C Research Briefs and Essays 523-C Research Briefs and Essays 523-P Lab Assignments, In-class 533-P Lab Assignment				522-C	Exams
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search websites from government and professional organizations for credible information 403 Literature Search Lab, Developing a Research Question assignment, Research Proposal, Exams 404 Research Briefs and Essays 411 Provision of Health Promotio Service/Activity 412 Oral Presentation 413 Health Advocacy Paper 521-C Assessed in Oral Presentation 522-C Behavioral Theory Paper 523-C Research Briefs and Essays 524-C Oral Presentation (3) 531-P Research Briefs and Essays 533-P Lab Assignments, In-class	3) Develop ability to access, evaluate,	Both tracks	Students can use Google.Scholar and Pubmed to search for peer-	401	Research Briefs and Essays
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AddResearch Proposal, Exams404Research Briefs and Essays411Provision of Health Promotio Service/Activity412Oral Presentation413Health Advocacy Paper521-CAssessed in Oral Presentation522-CBehavioral Theory Paper523-CResearch Briefs and Essays524-COral Presentation (3)531-PResearch Briefs and Essays533-PLab Assignments, In-class			credible information		Developing a Research
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524-COral Presentation (3)531-PResearch Briefs and Essays533-PLab Assignments, In-class				522-C	Behavioral Theory Paper
531-PResearch Briefs and Essays533-PLab Assignments, In-class				523-C	Research Briefs and Essays
533-P Lab Assignments, In-class				524-C	Oral Presentation (3)
				531-P	Research Briefs and Essays
UNUSSIOU/DEDATE				533-P	Lab Assignments, In-class Discussion/Debate,
Presentation					

		534-P	Case Report and Presentation
		560/561	Thesis Proposal and Defense
			Paper and Presentation
		562/563	Research Based Written Briefs
			(6)
		564/565	Weekly Assignments,
			Presentation
Both tracks	Students can distinguish between primary, secondary, and tertiary	401	Short Essays/ Research Briefs
(evaluate)	sources. Students can identify credible sources of health information.	402	Research Briefs and Essays
	Students can identify strengths and weaknesses of peer reviewed	403	Literature Search Lab,
	research articles		Minimum of 8 Article
			Critiques, Research Proposal,
			Exams, Comprehensive Exams
		404	Research Briefs and Essays
		411	Provision of Health Promotion
			Activity/Service
		414	Health advocacy Paper
		521-C	Minimally Assessed during
			Oral Presentation
		522-C	Article Discussions, Behavioral
			Theory paper
		523-C	Research Briefs and Essays
			Oral Presentation (3)
		531-P	Research Briefs and Essays
			Lab Assignments, In-class
			Discussion/Debate,
			Presentation
		534-P	Case Report and Presentation
			Thesis Proposal and Defense
		,	Paper and Presentation
		564/565	Weekly Assignments
	Students can provide argument for and against the various		Exams
			L'Addition of the second s
Both tracks		401	Research Briefs and Essays
			(written only)
(0.00001111000)		402	Research Briefs and Essays
		102	(written only)
1		403	Literature Search Lab,
		40.5	
		405	
		405	Literature Review Outline,
		405	
		(evaluate) sources. Students can identify credible sources of health information. Students can identify strengths and weaknesses of peer reviewed research articles search articles Students can provide argument for and against the various methodologies of dietary intake assessments used in nutrition research Both tracks Students can clearly present scientific findings through written and	Both tracks (evaluate) Students can distinguish between primary, secondary, and tertiary sources. Students can identify credible sources of health information. Students can identify strengths and weaknesses of peer reviewed research articles 401 404 411 414 521-C 522-C 523-C 524-C 531-P 533-P 560/561 Students can provide argument for and against the various methodologies of dietary intake assessments used in nutrition research 534-P Students can clearly present scientific findings through written and oral presentations 401

			404	Research Briefs and Essays (written only)													
			411	Provision of Health Promotion													
				Activity/Service													
			412	Oral Presentation													
			413	Health advocacy Paper													
			521-C	Oral Presentation													
			522-C	Behavioral Theory Paper													
			523-C	Research Briefs and Essays													
				(written only)													
			524-C	Oral Presentation (3)													
			531-P	Research Briefs and Essays (written only)													
			533-P	Lab Assignments, Presentation													
			534-P	Case Report and Presentation													
			560/561	Thesis Proposal and Defense													
				Paper and Presentation													
			564/565	Presentation													
4) Provide active and meaningful	Both tracks	Students will engage in at least 500 hours of active participation in	562/563	Site Monitoring verification													
participation in affiliated clinical or		clinical or sports performance settings	564/565	Site Monitoring verification													
performance-based settings while adhering to the Code of Ethics as defined		Students will refer to the Code of Ethics as outlined by the ACSM (clinical) or NSCA (performance).	564/565	Clinical Site Evaluations													
by the ACSM (clinical track) or NSCA (performance track) professional		Students will understand the knowledge, skills, and abilities associated within the scope of the discipline, understand what	411	Provision of Health Promotion Activity/Service													
organizations		information is confidential and preserve such confidentiality, respect	564/565	Weekly Assignments,													
		the rights, welfare, and dignity of all clients/patients, and know when	,	Internship End of Experience													
															to refer clients/patients to appropriate health care personnel		Evaluation, Clinical Site Evaluations
		Students will comply with all applicable state, local, and federal laws,	411	Provision of Health Promotion													
		as well as conduct themselves personally and professionally		Activity/Service													
			562/563	Research Based Written Briefs (6)													
			564/565	Weekly Assignments,													
			- ,	Internship End of Experience													
				Evaluation													
		Students will seek education outside of the academic classroom, most	n/a	Not assessed													
		notably at professional conferences															

When applicable: C = Courses taken by clinical track students only P = Courses taken by performance track students only