

**Courses Available to Students in the MS in Medical Sciences (9/2019)**

**-Fall Semester Listing-**

**Behavioral Sciences:**

BSC 790 Research in Medical Behavioral Sciences

**Biochemistry:**

BCH 401G Fundamentals of Biochemistry

BCH 611 Advanced Nucleic Acids

BCH 612 Structure and Function of Proteins/Enzyme

BCH 625 Scientific Communications

BCH 640 Research in Biochemistry

**Integrated Biomedical Sciences**

IBS 601 Biomolecules & Metabolism

IBS 602 Molecular Biology and Genetics

IBS 611 Practical Statistics

**Microbiology:**

MI 494G Immunobiology (cross-listed with BIO 494G)

MI 582 Virology

MI 720 Microbial Structure & Function (cross-listed with BIO 720)

MI 772 Seminar in Microbiology

MI 798 Research in Microbiology

**Neuroscience:**

ANA 512 Microscopy and Ultrastructure

ANA 600 Seminar in Anatomy

ANA 605 Neurobiology of CNS Injury and Repair

ANA 612 Biology of Aging

ANA 636 Advanced Neuroscience (5 credit hours)

ANA 638 Developmental Neurobiology (cross-listed with PGY)

ANA 780 Special Topics in Neurobiology (Neurobiology of Brain Disorders – 3 credit hours)

ANA 790 Research in Anatomy

**Nutritional Sciences:**

NS 550 Drug and Nutrient Interactions (2 credit hours; cross-listed with PHA 550)

NS 601 Integrated Nutritional Sciences I

NS 603 Integrated Nutritional Sciences III

NS 605 Wellness and Sports Nutrition

NS 606 - Molecular Biology Applications in Nutrition (2 credit hours)

NS 609 - Ethics in Clinical Research

NS 771 - Graduate Seminar in Nutritional Sciences

**Pharmacology:**

PHA 421G Pharmacology: Principles of Drug Action

PHA 422G Pharmacology of Treating Human Disease

PHA 424G Pharmacology of Human Endocrinology and Reproduction

PHA 550 Drug and Nutrient Interactions (2 credit hours; cross-listed with NS 550)

PHA 621 Principles of Drug Action

PHA 750 Research in Pharmacology

PHA 770 Seminar in Pharmacology

**Physiology:**

PGY 401G Human Reproduction, Technology and Society

PGY 412G Principles of Human Physiology

PGY 413G Critical Thinking

PGY 502 Systems, Cellular & Molecular Physiology

PGY 612 Biology of Aging

PGY 615 Teaching of Medical Science

PGY 630 Advanced Topics in Physiology

PGY 638 Developmental Neurobiology (cross-listed with ANA)

PGY 774 Seminar in Physiology

PGY 791 Research in Physiology

**Toxicology:**

TOX 509 Environmental & Regulatory Toxicology

TOX 663 Drug Metabolism and Disposition

TOX 770 Toxicology Seminar (Students should sign up for 1 credit hour each for section 001 and section 002)

TOX 780 Special Problems in Toxicology

TOX 790 Research in Toxicology

**-Spring Semester Listing-**

**Behavioral Sciences:**

BSC 750 History of Medicine Among Blacks in the U.S.: Implications for Health Disparities

BSC 773 Psychosocial Oncology

BSC 790 Research in Medical Behavioral Sciences

**Biochemistry:**

BCH 401G Fundamentals of Biochemistry

BCH 419G Molecular Basis of Human Disease  
BCH 604 Structural Biology  
BCH 610 Structure and Function of Biomembranes  
BCH 615 Molecular Biology (cross-listed with BIO 615, MI 615)  
BCH 640 Research in Biochemistry

**Integrated Biomedical Sciences:**

IBS 603 Cell Biology and Signaling  
IBS 606 Physiological Communication

**Microbiology:**

MI 494G Immunobiology (cross-listed with BIO 494G)  
MI 495G Bacterial Pathogenesis (cross-listed with BIO 495G)  
MI 598 Clinical Microbiology  
MI 615 Molecular Biology (cross-listed with BCH 615, BIO 615)  
MI 616 Biology & Therapy of Cancer  
MI 725 Mechanisms of Microbial Pathogenesis  
MI 772 Seminar in Microbiology  
MI 798 Research in Microbiology

**Neuroscience:**

ANA 417G Functional Human Neuroanatomy  
ANA 609 Educational Strategies in the Anatomical Sciences  
ANA 611 Regional Human Anatomy  
ANA 780 Special Topics in Neurobiology (Neurobiology of Brain Disorders – 3 credit hours)  
ANA 790 Research in Anatomy

**Nutritional Sciences:**

NS 550 Drug and Nutrient Interactions (2 credit hours; cross-listed with PHA 550)  
NS 602 Integrated Nutritional Sciences II  
NS 704 Current Topics in Nutrition  
NS 771 Graduate Seminar in Nutritional Sciences  
CNU 501 Nutraceuticals and Functional Foods  
CNU 502 Obesity: Cell to Community

**Pharmacology:**

PHA 550 Drug and Nutrient Interactions (2 credit hours; cross-listed with NS 550)  
PHA 622 Molecular Drug Targets and Therapeutics (4 sections)  
    Section 001-Cardiovascular Pharmacology  
    Section 002-Neuropharmacology

Section 003-Chemotherapeutic & Toxicologic Agents

Section 004-Immunopharmacology and Endocrine Pharmacology

PHA 750 Research in Pharmacology

PHA 770 Seminar in Pharmacology

**Physiology:**

PGY 401G Human Reproduction, Technology and Society

PGY 412G Principles of Human Physiology

PGY 413G Critical Thinking

PGY 512 Evolutionary Medicine

PGY 535 Comparative Neurobiology and Behavior

PGY 560 Pathophysiology

PGY 630 Advanced Topics in Physiology

PGY 774 Seminar in Physiology

PGY 791 Research in Physiology

**Toxicology:**

TOX 600 Ethics in Scientific Research

TOX 680 Molecular Mechanisms in Toxicology

**Last revised 9/2019**

**Please note:** requests to take EXP 650 must be approved by the MSMS DGS in writing and in advance of course registration. In addition, students may only receive one hour of academic credit for EXP 650.