Wayne State University

Academic Programs

College of Education

1: BA/BS in Visual Arts Education
Providing Department: College of Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an understanding of specific visual art education theories and instructional strategies with regard to non-western cultures and multicultural pedagogy (Evidence: Grades for theoretical and qualitative research papers in AED 5890 and AED 6910)

Administration and Organizational Studies (AOS)

Bachelor of Arts in Education in Learning Design and Technology

1: Intro to IT - IT 2015
Providing Department: Bachelor of Arts in Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an ability to understand the career opportunities in IT.

IT 2015

2: Instructional Design Principles and Applications - IT 3115
Providing Department: Bachelor of Arts in Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Successfully analyze and implement basic design principles and best practices in IT.

IT 3115
3: Consumer and Program Evaluation for Practitioners - IT 3125  
Providing Department: Bachelor of Arts in Education in Learning Design and Technology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students create consumer-oriented evaluation and full-scope evaluation with emphasis on formative evaluation approaches.

IT 3125

4: Capstone Seminar in Instructional Technology - IT 4185  
Providing Department: Bachelor of Arts in Education in Learning Design and Technology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will explain the concepts of needs assessment and evaluation and create an e-portfolio.

IT 4185

Bachelor of Science in Education in Learning Design and Technology

1: Intro to IT - IT 2015  
Providing Department: Bachelor of Science in Education in Learning Design and Technology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Demonstrate an ability to understand the career opportunities in IT.

IT 2015

2: Instructional Design Principles and Applications - IT 3115  
Providing Department: Bachelor of Science in Education in Learning Design and Technology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Successfully analyze and implement basic design principles and best practices in IT.
3: Consumer and Program Evaluation for Practitioners - IT 3125
Providing Department: Bachelor of Science in Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students create consumer-oriented evaluation and full-scope evaluation with emphasis on formative evaluation approaches.

IT 3125

4: Capstone Seminar in Instructional Technology - IT 4185
Providing Department: Bachelor of Science in Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will explain the concepts of needs assessment and evaluation and create an e-portfolio.

IT 4185

Doctor of Education in Education Leadership and Policy Studies

1: Synthesize research methods & theory
Providing Department: Doctor of Education in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will synthesize the research methods and theory related to design, approaches, and methods of educational leadership and educational policy.

2: Critique leadership theories
Providing Department: Doctor of Education in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will critique several current leadership theories.

3: Demonstrate skills in policy analysis
Providing Department: Doctor of Education in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate written, oral, and analytical skills in evaluating the significance of educational policy making for educational leaders.

4: Critique research and theory of policy
Providing Department: Doctor of Education in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will critique the research and theory base for the key thematic variable which contribute to policy development, implementation, and effectiveness.

Doctor of Education in Learning Design and Technology

1: Background, Issues and Trends in Instructional Technology - IT 8100
Providing Department: Doctor of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
This course will analyze the history of instructional technology practice and intellectual foundations; implication for current issues.

IT 8100

2: Advanced Instructional Design Theory and Research - IT 8110
Providing Department: Doctor of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Successfully analyze the theoretical foundations of instructional design and their application in design practice. IT
3: Conducting Research in Instructional Technology - IT 9105
Providing Department: Doctor of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate the ability to design, execution and reporting of instructional technology research on selected topics. IT 9105

4: Advanced Research Seminar and Practicum - IT 9110
Providing Department: Doctor of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students draft a dissertation research proposal, application for human subjects review, and a timeline for degree completion. IT 9110

Doctor of Philosophy in Education Leadership and Policy Studies

1: Synthesize research methods & theory
Providing Department: Doctor of Philosophy in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will synthesize the research methods and theory related to design, approaches, and methods of educational leadership and educational policy.

2: Critique leadership theories
Providing Department: Doctor of Philosophy in Education Leadership and Policy Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will critique several current leadership theories.
3: Demonstrate skills in policy analysis

**Providing Department:** Doctor of Philosophy in Education Leadership and Policy Studies

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate written, oral, and analytical skills in evaluating the significance of educational policy making for educational leaders.

4: Critique research and theory

**Providing Department:** Doctor of Philosophy in Education Leadership and Policy Studies

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will critique the research and theory base for the key thematic variable which contribute to policy development, implementation, and effectiveness.

Doctor of Philosophy in Learning Design and Technology

1: Background, Issues and Trends in Instructional Technology - IT 8100

**Providing Department:** Doctor of Philosophy in Learning Design and Technology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
This course will analyze the history of instructional technology practice and intellectual foundations; implication for current issues.

IT 8100

2: Advanced Instructional Design Theory and Research - IT 8110

**Providing Department:** Doctor of Philosophy in Learning Design and Technology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Successfully analyze the theoretical foundations of instructional design and their application in design practice. IT 8110
3: Conducting Research in Instructional Technology - IT 9105  
**Providing Department:** Doctor of Philosophy in Learning Design and Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Design, execution and reporting of instructional technology research on selected topics.  
IT 9105

4: Advanced Research Seminar and Practicum - IT 9110  
**Providing Department:** Doctor of Philosophy in Learning Design and Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Students draft a dissertation research proposal, application for human subjects review, and a timeline for degree completion. IT 9110

Education Specialist Certificate in General Administration and Supervision

1: School Vision  
**Providing Department:** Education Specialist Certificate in General Administration and Supervision  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
The student will develop, articulate, implement, and oversee a vision of learning shared and supported by the school community.

2: School Instructional Program  
**Providing Department:** Education Specialist Certificate in General Administration and Supervision  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
The student will advocate, nurture and sustain a school instructional program including equity of educational opportunity for student growth and learning as an instructional leader
3: Professional Growth
Providing Department: Education Specialist Certificate in General Administration and Supervision
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will develop and sustain staff professional growth, including equity of educational opportunity for learning as an instructional leader.

4: Fiscal Management Skills
Providing Department: Education Specialist Certificate in General Administration and Supervision
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will engage in activities that demonstrate organizational management skills in fiscal operations.

5: School Community Relations
Providing Department: Education Specialist Certificate in General Administration and Supervision
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will facilitate activities that demonstrate the collaboration of staff and community member to respond to diverse community needs.

6: Ethics
Providing Department: Education Specialist Certificate in General Administration and Supervision
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will act with integrity, fairness, and in an ethical manner to promote student success.
7: Application of Theories & Principles
Providing Department: Education Specialist Certificate in General Administration and Supervision
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will apply the theories and principles from the administrative course work to her/his educational setting.

Education Specialist Certificate in Learning Design and Technology

1: Design Thinking and Knowledge - IT 6110
Providing Department: Education Specialist Certificate in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
This course will introduce design, design thinking and design knowledge and link it to instructional design.

IT 6110

2: Educational Product and Program Evaluation - IT 7150
Providing Department: Education Specialist Certificate in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Successfully analyze and implement existing design techniques and criteria for evaluation of commercial products; models of instructional evaluation; methods of large-scale curriculum evaluation; summative evaluation; formative evaluation for review of instructional design.

IT 7150

3: Background, Issues and Trends in Instructional Technology - IT 8100
Providing Department: Education Specialist Certificate in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
This course will analyze the history of instructional technology practice and intellectual foundations; implication for current issues.

IT 8100

4: Advanced Instructional Design Theory and Research - IT 8110
Providing Department: Education Specialist Certificate in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Successfully analyze the theoretical foundations of instructional design and their application in design practice. IT 8110

Graduate Certificate in College and University Teaching

1: Prepare Course Syllabus
Providing Department: Graduate Certificate in College and University Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Prepare a complete course syllabus

2: Create Learning Assessments
Providing Department: Graduate Certificate in College and University Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will create learning assessments
4: Use technology in teaching
Providing Department: Graduate Certificate in College and University Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will utilize appropriate technology to facilitate learning

5: Facilitate Learning
Providing Department: Graduate Certificate in College and University Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will facilitate an instructional unit

Graduate Certificate in Online Teaching

1: Foundations of distance education
Providing Department: Graduate Certificate in Online Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Foundations of distance education (theories, models, methods, best practice and research)

2: Create and renovate materials, resources, activities for online courses
Providing Department: Graduate Certificate in Online Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Create and renovate materials, resources, activities for online courses
3: Facilitate online learning
Providing Department: Graduate Certificate in Online Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Facilitate online learning

4: Integrate technology in online teaching
Providing Department: Graduate Certificate in Online Teaching
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Integrate technology in online teaching

Master of Education in Educational Leadership

1: Develop School Vision
Providing Department: Master of Education in Educational Leadership
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will develop, articulate, implement, and oversee a vision of learning shared and supported by the school community.

2: School Instructional Program
Providing Department: Master of Education in Educational Leadership
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will advocate, nurture and sustain a school instructional program including equity of educational opportunity for student growth and learning as an instructional leader.
3: Professional Growth  
Providing Department: Master of Education in Educational Leadership  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will develop and sustain staff professional growth, including equity of educational opportunity for learning as an instructional leader.

4: Fiscal Management Skills  
Providing Department: Master of Education in Educational Leadership  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will engage in activities that demonstrate organizational management skills in fiscal operations.

5: School Community Relations  
Providing Department: Master of Education in Educational Leadership  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will facilitate activities that demonstrate the collaboration of staff and community member to respond to diverse community needs.

6: Ethics  
Providing Department: Master of Education in Educational Leadership  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will act with integrity, fairness, and in an ethical manner to promote student success.

7: Application of Theories & Principles  
Providing Department: Master of Education in Educational Leadership  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will apply the theories and principles from the administrative course work to
Master of Education in Learning Design and Technology

1: Design Thinking and Knowledge - IT 6110

Providing Department: Master of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
This course will introduce design, design thinking and design knowledge and link it to instructional design.

IT 6110

1: Instructional Design

Providing Department: MEd in Learning Design and Technology
Start: 9/1/2008
End: 8/30/2019

Learning Outcome Description
Students will design learning interventions

2: Educational Product and Program Evaluation - IT 7150

Providing Department: Master of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Successfully analyze and implement existing design techniques and criteria for evaluation of commercial products; models of instructional evaluation; methods of large-scale curriculum evaluation; summative evaluation; formative evaluation for review of instructional design.

IT 7150

3: Needs Assessment and Program Validity - IT 8150

Providing Department: Master of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students undertake a needs assessment validation study to confirm the validity of the
4: Web-Based Courseware Development - IT 7140
Providing Department: Master of Education in Learning Design and Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students learn to design, development and implementation of Web-based courseware. IT 7140

Kinesiology, Health and Sports Studies (KHS)

Exercise and Sport Science

Bachelor of Science in Education in Kinesiology

1 - ESS: Program Learning Outcome - Exercise Physiology - KIN 6300
Providing Department: Bachelor of Science in Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KIN 6300

Students will be able to incorporate the core Exercise and Sport Science concepts in exercise physiology while integrating knowledge of the basic human functions at the biochemical, cellular, and broad anatomical levels.

At the conclusion of the course, the student will be able to

1. Describe the field of exercise physiology and its role in improving the quality of life.
2. Define cellular bioenergetics sources and pathways available at rest and during exercise.
3. Explain basic physiological responses and adaptations that occur with exercise.
4. Describe and interpret work, energy, and power.
5. Explain the cardiorespiratory response to exercise.
6. Explain the structure and function of skeletal muscle.
7. Explain the neuromuscular adaptations that occur with exercise.
8. Identify the general principles of physical training.
9. Explain the role of exercise and physical activity for fitness and health.
10. Correlate the interaction between exercise, nutrition, and weight control.
11. Differentiate between basic clinical and laboratory research techniques utilized to evaluate the components of human performance.
2 - ESS: Program Learning Outcome - Physical Activity and Exercise Psych - KHS 5523

Providing Department: Bachelor of Science in Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KHS 5523

Students will be able to qualify the psychological and sociological status of individuals and understand the relationships between physical activity and exercise and quality of life, self-alteration and self-awareness.

At the finish of the course the student will be able to;
1) Describe the emerging field of exercise psychology.
2) Illustrate the relationship between exercise and quality of life, self-esteem, mood, mood alteration and self-awareness.
3) Describe stress, the stress process, stress management and personality and exercise.
4) Discuss coping with injury.
7) Summarize exercise models and theories.
2

8) Discuss the motivational determinants of exercise.
9) Review the motivational strategies for exercise adherence.
10) Discover personal meaning in physical activity, understand peak moments in exercise research and be familiar with common exercise concerns.
11) Be cognizant of gender, children and youth, and older adult issues related to exercise.
12) Express the exercise guidelines for promoting optimal mood states.
Students will be able to provide precise analyses and understanding of human physical structure and function related to movements through applied kinematic and kinetic concepts to human motion analysis.

By the end of this course, learners will be able to:
1) Describe the terms biomechanics, statics, dynamics, kinematics, and kinetics and the scope of scientific inquiry addressed by biomechanics
2) Demonstrate an understanding of human physical structure and function related to movements
3) Employ kinematic and kinetic concepts to human motion analysis
4) Demonstrate an understanding of human bone growth and development biomechanics
5) Demonstrate an understanding of human skeletal muscles and joints
6) Describe the appropriate biomechanical principles and methods to analyze human movement

4 - ESS: Program Learning Outcome - Motor Learning and Control - KIN 3550
Providing Department: Bachelor of Science in Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KIN 3550

Students will be able to understand and analyze essential information on the study of motor skill acquisition and motor control with applications to physical activity that focus on the cognitive processes and neural mechanisms.

Over the course of the semester, you will be:
1. Demonstrate acquisition of human nervous system functions on motor behavior.
2. Demonstrate acquisition of human motor control theories and their applications.
3. Demonstrate acquisition of human memory theory and application on motor behavior.
4. Demonstrate comprehension of the variables optimizing motor skill acquisition, retention, and transfer.
5. Practice skills of measuring performance in motor behavior lab.
6. Develop skills of the computation and presentation of scientific data.
7. Develop problem solution and writing skills through critical reviewing of scientific literature.

Doctor of Philosophy in Kinesiology
1 - ESS: Program Learning Outcome - Doctoral Sem. in Kinesiology, Health, and Sport Studies - KHS 9600
Providing Department: Doctor of Philosophy in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

KHS 9600

Students will be able to compile and analyze essential research information to create further inquiries and explanations for the progression of the exercise and sport sciences.

2 - ESS: Program Learning Outcome - Exercise Physiology - KIN 6310
Providing Department: Doctor of Philosophy in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

KIN 6310

Students will be able to incorporate the core Exercise and Sport Science concepts in advanced exercise physiology while integrating knowledge of the basic human functions at the biochemical, cellular, and broad anatomical levels.

3 - ESS: Program Learning Outcome - Motor Learning and Control - KIN 8530
Providing Department: Doctor of Philosophy in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

KIN 8530

Students will be able to examine current research in motor control and learning and other physiological mechanisms to motor behavior which affect the acquisition of motor skill: perception, motivation, psychology of motor behavior.

4 - ESS: Program Learning Outcome - Research in Psycho-Social Dimensions of Physical Activity - KHS 8700
Providing Department: Doctor of Philosophy in Kinesiology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
KHS 8700

Students will be able to qualify, research, and publish the psychological and sociological status of individuals and environments and understand the relationships between physical activity and exercise and quality of life, self-esteem, mood, mood alteration and self-awareness.

Master of Education in Kinesiology

1 - ESS: Program Learning Outcome - Motor Learning and Control - KIN 8530
Providing Department: Master of Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KIN 8530

Students will be able to examine current research in motor control and learning and other physiological mechanisms to motor behavior which affect the acquisition of motor skill: perception, motivation, psychology of motor behavior.

2 - ESS: Program Learning Outcome - Biomechanical Analysis of Motor Activity - KIN 7580
Providing Department: Master of Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KIN 7580

Acquit advanced knowledge in human biomechanics, review and present relevant scientific literature, design research project focusing on biomechanical application to human movements, and complete a research proposal.

Over the course of the semester, you will be:
1. Demonstrate acquisition of Kinematic and Kinetic principles for the human movements.
2. Demonstrate acquisition of the neuromechanics of some fundamental movements.
3. Demonstrate acquisition of human motor system structures and functions.
4. Review and present current research literature in neuroscience and biomechanics.
5. Develop the skills to propose hypotheses and problem solution in the analysis of
human
movements.
6. Complete a research project with extensive literature review and experimental methods in the analysis of human movements.

3 - ESS: Program Learning Outcome - Internship Placement - KHS 8750
Providing Department: Master of Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KHS 8750

The students will complete a culminating learning experience that will allow them to apply, expand and refine the knowledge, dispositions, and skills they acquired during the pursuit of their master's degree.

4 - ESS: Program Learning Outcome - Exercise Physiology 2 - KIN 6310
Providing Department: Master of Education in Kinesiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
KIN 6310

Students will be able to incorporate the core Exercise and Sport Science concepts in advanced exercise physiology while integrating knowledge of the basic human functions at the biochemical, cellular, and broad anatomical levels.

Health Education

Bachelor of Science in Education in Health Education

1: Learning Outcome 1
Providing Department: Bachelor of Science in Education in Health Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the methods class, students will be able to demonstrate the ability to assess the health needs of a specific population using valid, reliable and bias free instruments.
2: Learning Outcome 2  
Providing Department: Bachelor of Science in Education in Health Education  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Upon completion of the methods class, students will be able to effectively plan health education programs and interventions

3: Learning Outcome 3  
Providing Department: Bachelor of Science in Education in Health Education  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Upon completion of student teaching or the internship, students will be able to assess the accuracy of information available to health consumers

4: Learning Outcome 4  
Providing Department: Bachelor of Science in Education in Health Education  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description

Master of Education in Health Education

1: Learning Outcome 1  
Providing Department: Master of Education in Health Education  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Upon completion of the program planning class, students will be able to demonstrate the ability to assess the health needs of a specific population using valid, reliable and bias free instruments.
2: Learning Outcome 2  
**Providing Department:** Master of Education in Health Education  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Upon completion of the program planning class, students will be able to design research-based programs to target health needs in specific populations.

3: Learning Outcome 3  
**Providing Department:** Master of Education in Health Education  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Upon completion of the evaluation class, students will be able to evaluate programs designed to increase the health of specific populations.

4: Learning Outcome 4  
**Providing Department:** Master of Education in Health Education  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Upon completion of the degree, students will be able to serve as a health education resource person.

---

Sport Administration

**Master of Arts in Sports Administration**

1: Learning Outcome #1: Administration Skill Mastery  
**Providing Department:** Master of Arts in Sports Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Students will employ basic management and financial competencies to effectively administer programs within amateur and professional sport settings.
2: Learning Outcome #2: Professional Ethics  
Providing Department: Master of Arts in Sports Administration  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will identify and address ethical and social justice issues in sport administration and make decisions accordingly.

3: Learning Outcome #3: Using Technology & Communication  
Providing Department: Master of Arts in Sports Administration  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will proficiently use technology to communicate, administer programs, and advance themselves professionally.

4: Learning Outcome #4: Professional Readiness  
Providing Department: Master of Arts in Sports Administration  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will demonstrate their professional readiness and the practical application of the sports administration skills they have acquired throughout the MA program by completing a practical field experience.

Teacher Education (TED)  

Bachelor of Arts in Education in Elementary Education  

LO1: Learner Development  
Providing Department: Bachelor of Arts in Education in Elementary Education  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.
LO2: Learner Differences
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

LO3: Content Knowledge
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

LO4: Application of Content
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

LO5: Instructional Practice
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.
LO6: Professional Dispositions
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

LO7: Professional Responsibility
Providing Department: Bachelor of Arts in Education in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Bachelor of Arts in Education in Secondary Education

LO1: Learner Development
Providing Department: Bachelor of Arts in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

LO2: Learning Differences
Providing Department: Bachelor of Arts in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will use knowledge of individual differences and diverse cultures and
communities to ensure inclusive learning environments that enable each learner to meet high standards.

---

**LO3: Content Knowledge**  
**Providing Department:** Bachelor of Arts in Education in Secondary Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

---

**LO4: Application of Content**  
**Providing Department:** Bachelor of Arts in Education in Secondary Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

---

**LO5: Instructional Practice**  
**Providing Department:** Bachelor of Arts in Education in Secondary Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

---

**LO6: Professional Dispositions**  
**Providing Department:** Bachelor of Arts in Education in Secondary Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills,
and higher-level thinking.

**LO7: Professional Responsibilities**  
*Providing Department: Bachelor of Arts in Education in Secondary Education*  
*Start: 9/1/2017*  
*End: 8/31/2018*

**Learning Outcome Description**  
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

---

**Bachelor of Science in Education in Elementary Education**

**LO1: Learner Development**  
*Providing Department: Bachelor of Science in Education in Elementary Education*  
*Start: 9/1/2017*  
*End: 8/31/2018*

**Learning Outcome Description**  
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

---

**LO2: Learning Differences**  
*Providing Department: Bachelor of Science in Education in Elementary Education*  
*Start: 9/1/2017*  
*End: 8/31/2018*

**Learning Outcome Description**  
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

---

**LO3: Content Knowledge**  
*Providing Department: Bachelor of Science in Education in Elementary Education*  
*Start: 9/1/2017*  
*End: 8/31/2018*
Learning Outcome Description
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

**LO4: Application of Content**
**Providing Department:** Bachelor of Science in Education in Elementary Education
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

**LO5: Instructional Practice**
**Providing Department:** Bachelor of Science in Education in Elementary Education
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

**LO6: Professional Dispositions**
**Providing Department:** Bachelor of Science in Education in Elementary Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

**LO7: Professional Responsibility**
**Providing Department:** Bachelor of Science in Education in Elementary Education
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
The student engages in ongoing professional learning and uses evidence to continually
evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Bachelor of Science in Education in Secondary Education

LO1: Learner Development

Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

LO2: Learning Differences

Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

LO3: Content Knowledge

Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.
LO4: Application of Content
Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

LO5: Instructional Practice
Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

LO6: Professional Dispositions
Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

LO7: Professional Responsibility
Providing Department: Bachelor of Science in Education in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.
LO1: Learning Outcome 1
Providing Department: Bridge Graduate Certificate in Bilingual Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1. Students will move through the teaching and learning cycle of instructional decision-making and assessment interpretation based on current research on learning and language development as it relates to bilingual education.

LO2: Learning Outcome 2
Providing Department: Bridge Graduate Certificate in Bilingual Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2. The student will utilize knowledge of second language acquisition theories in lesson planning.

LO3: Learning Outcome 3
Providing Department: Bridge Graduate Certificate in Bilingual Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO3. Students will analyze how culture and cultural identity affect language teaching and learning.

LO4: Learning Outcome 4
Providing Department: Bridge Graduate Certificate in Bilingual Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO4. Students will illustrate pedagogical implications for teachers of language learners based on major linguistic elements of the English language and a target second language.
LO5: Learning Outcome 5
Providing Department: Bridge Graduate Certificate in Bilingual Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO5. Students will apply their understanding of critical issues in American language education as they establish and advance their language learner advocacy roles.

Bridge Graduate Certificate in English as a Second Language

LO1: LO1
Providing Department: Bridge Graduate Certificate in English as a Second Language
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will move through the teaching and learning cycle of instructional decision-making and assessment interpretation based on current research on learning and language development.

LO2: LO2
Providing Department: Bridge Graduate Certificate in English as a Second Language
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will utilize knowledge of second language acquisition theories in lesson planning.

LO3: LO3
Providing Department: Bridge Graduate Certificate in English as a Second Language
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will analyze how culture and cultural identity affect language teaching and learning.
LO4: LO4
Providing Department: Bridge Graduate Certificate in English as a Second Language
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will illustrate pedagogical implications for teachers of language learners based on major linguistic elements of the English language.

LO5: LO5
Providing Department: Bridge Graduate Certificate in English as a Second Language
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will apply their understanding of critical issues in language education as they develop their language learner advocacy roles.

Doctor of Education in Curriculum and Instruction

LO1: Synthesis of Curriculum Theory
Providing Department: Doctor of Education in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to synthesize curriculum theory.

LO2: Research methodology
Providing Department: Doctor of Education in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate ability to critically evaluate research in education.

LO3: Learner and Learning
Providing Department: Doctor of Education in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will articulate on the relationship among the learner, the learning, and the learning environment and the consequences this approach has for educational theory, policy, and practice.

**LO4: Literature Review**

**Providing Department:** Doctor of Education in Curriculum and Instruction  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will identify the strengths and weaknesses of the existing literature related to their topic of study.

---

**Doctor of Education in Reading, Language and Literature**

**LO1: Understanding of theory, policy, and practice**

**Providing Department:** Doctor of Education in Reading, Language and Literature  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Demonstrate a comprehensive understanding of the theories, policies and practices relevant for their field of study (Evidence: Comprehensive Examination, Oral Dissertation Defense);

---

**LO2: Engage in scholarly writing and APA format**

**Providing Department:** Doctor of Education in Reading, Language and Literature  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students engage in scholarly writing and learn to use APA format.

---

**LO3: Analyze and Critique Research**

**Providing Department:** Doctor of Education in Reading, Language and Literature  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Demonstrate the ability to analyze and critique existing research in literacy (evidence: RLL
LO4: Design and Implement Research
Providing Department: Doctor of Education in Reading, Language and Literature
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Design and implement valid, reliable quantitative and/or qualitative research that expands understanding of literacy processes and/or improves literacy curriculum and instruction. (Evidence:Dissertation)

Doctor of Philosophy in Curriculum and Instruction

LO1: Analysis of Theory
Providing Department: Doctor of Philosophy in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate the ability to critique influential theory related to curriculum development and design.

LO2: Research Methodology
Providing Department: Doctor of Philosophy in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate the ability to design research in education.

LO3: Learner and Learning
Providing Department: Doctor of Philosophy in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will articulate on the relationship among the learner, the learning, and the learning environment and the consequences this approach has for educational theory, policy, and practice.
**LO4: Literature Review**

**Providing Department:** Doctor of Philosophy in Curriculum and Instruction  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will identify the strengths and weaknesses of the existing literature related to their topic of study.

---

**Education Specialist Certificate in Curriculum and Instruction**

**LO1: Issues in Urban Education**

**Providing Department:** Education Specialist Certificate in Curriculum and Instruction  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will evaluate the role of culture in student achievement.

---

**LO2: Critical Thinking Skills**

**Providing Department:** Education Specialist Certificate in Curriculum and Instruction  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will articulate on critical issues in education (especially specific to their topic of study) as they develop professionally.

---

**LO3: Learner and Learning**

**Providing Department:** Education Specialist Certificate in Curriculum and Instruction  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will articulate on the relationship among the learner, the learning, and the learning environment and the consequences this relationship has for educational theory, policy, and practice.
LO4: Literature Review
Providing Department: Education Specialist Certificate in Curriculum and Instruction
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will identify the strengths and weaknesses of the existing literature related to their topic of study.

Education Specialist Certificate in Reading

LO1: Critique Theories of Literacy
Providing Department: Education Specialist Certificate in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
There is no single set educational standards for this certificate. For those students whose goal is attainment of the K-12 Reading Specialist Endorsement, the Michigan Department of Education standards for the K-12 Reading Specialist Endorsement (BR) and the International Reading Association Standards for Reading Professionals apply. For those whose goal is to enter the Ed.D. in RLL program, the IRA Standards for Reading Professionals and the NCTE Standards for the English Language Arts are used. Therefore, outcomes for students in this program are not the same depending on their individual goals. However, all students take two courses at the doctoral level; so general outcomes for those courses are used here.

Outcome 1: Summarize, critique and compare/contrast various theories of literacy in formal written formats.

LO2: Critique Research in Literacy
Providing Department: Education Specialist Certificate in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Summarize, critique, and compare/contrast the research that supports various theories of
literacy in formal written formats.

LO3: Connect Theory to Practice
Providing Department: Education Specialist Certificate in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply various theories of literacy to practice (e.g., teaching, curriculum development, etc.) in written formats.

LO4: Consider theory and research in relation to career and/or career goals.
Providing Department: Education Specialist Certificate in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply and/or reflect on theory and research in literacy in relation to implications for current literacy career and/or career goals. For example, implications of theory and research in the role of literacy coach, reading specialist, or curriculum supervisor.

GC in Elementary Mathematics Specialist: Advanced

LO1: Curriculum Evaluation
Providing Department: GC in Elementary Mathematics Specialist: Advanced
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Elementary math specialists evaluate various mathematics curricula

LO2: PD Design
Providing Department: GC in Elementary Mathematics Specialist: Advanced
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Elementary math specialists design programs of teacher learning in schools
**LO3: PD Analysis**

*Providing Department:* GC in Elementary Mathematics Specialist: Advanced  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**
Elementary math specialists analyze programs of teacher learning in schools

**LO4: Leading PD**

*Providing Department:* GC in Elementary Mathematics Specialist: Advanced  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**
Elementary math specialists lead programs of teacher learning in schools

**GC in Elementary Mathematics Specialist: Intro**

**LO1: Curriculum Evaluation**

*Providing Department:* GC in Elementary Mathematics Specialist: Intro  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**
Elementary math specialists evaluate various mathematics curricula.

**LO2: PD Development**

*Providing Department:* GC in Elementary Mathematics Specialist: Intro  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**
Elementary math specialists develop programs of teacher learning in schools

**LO3: Analysis of PD**

*Providing Department:* GC in Elementary Mathematics Specialist: Intro  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**
Elementary math specialists analyze programs of teacher learning in schools
Master of Arts in Teaching in Elementary Education

LO 2: Learner Differences

Providing Department: Master of Arts in Teaching in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

LO 3: Content Knowledge

Providing Department: Master of Arts in Teaching in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

LO 4: Application of Content

Providing Department: Master of Arts in Teaching in Elementary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.
**LO1: Learner Development**
*Providing Department:* Master of Arts in Teaching in Elementary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

**LO5: Instructional Practice**
*Providing Department:* Master of Arts in Teaching in Elementary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

**LO6: Professional Dispositions**
*Providing Department:* Master of Arts in Teaching in Elementary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

**LO7: Professional Responsibility**
*Providing Department:* Master of Arts in Teaching in Elementary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.
Master of Arts in Teaching in Secondary Education

**LO1: Learner Development**
*Providing Department:* Master of Arts in Teaching in Secondary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

---

**LO2: Learner Differences**
*Providing Department:* Master of Arts in Teaching in Secondary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

---

**LO3: Content Knowledge**
*Providing Department:* Master of Arts in Teaching in Secondary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

---

**LO4: Application of Content**
*Providing Department:* Master of Arts in Teaching in Secondary Education  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.
LO5: Instructional Practitioner
Providing Department: Master of Arts in Teaching in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

LO6: Professional Dispositions
Providing Department: Master of Arts in Teaching in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

LO7: Professional Responsibility
Providing Department: Master of Arts in Teaching in Secondary Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Master of Education in Art Education

1.: VAE L.O. 1: Utilize in classroom
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome #1:

Demonstrate the ability to articulate how the student’s own creative work may be utilized in the K-12 classroom. (Evidence: Grades for application-based papers in AED 5020, or
2. : VAE L.O. 2: Demonstrate Knowledge
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome #2:
Provide a summary of specific visual art education theories and corresponding instructional strategies with regard to non-western cultures and multicultural pedagogy (Evidence: Grades for theoretical and qualitative research papers in AED 5890 and AED 6910)

3.: VAE L.O. 3: Demonstrate Ability to Analyze
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome #3:
Demonstrate the ability to systematically analyze theories and best practices for use their future in Art Education classrooms (Evidence: Points for research-based papers in AED 5160).

4.: VAE L.O. 4: Analyze educational research & relate to practice
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome #4:
Demonstrate the ability to critically analyze educational research in Visual Arts Education and relate it to their own qualitative research efforts, and future educational practice (Evidence: Grades in TED 7000).

LO 1: Art Therapy
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description

Art therapy students will apply the theories of the profession of Art Therapy, evidenced through course participation and assignments.

LO 2: Art Therapy
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate skills in art therapy assessment, session implementation and evaluation

LO 3: Art Therapy
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Continuously deepen self-understanding through personal growth experiences, reflective practice and personal art making

LO4: Art Therapy
Providing Department: Master of Education in Art Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Art therapy students will develop culturally appropriate collaborative and productive therapeutic relationships with clients and art therapy constituents.

Master of Education in Career and Technical Education

LO 1: (LO 1) Examine Educational Research
Providing Department: Master of Education in Career and Technical Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Critically examine educational research in Career and Technical education.
### LO 2: (LO 2) Create Programs of Study

**Providing Department:** Master of Education in Career and Technical Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Create Programs of Study for various Career and Technical Education Career Cluster pathways.

### LO 3: (LO 3) Develop Curricular Framework

**Providing Department:** Master of Education in Career and Technical Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Develop the curricular framework for a Career and Technical Education secondary program in accordance with the founding principles of CTE.

### LO 4: (LO 4) Analyze and implement Best Practices

**Providing Department:** Master of Education in Career and Technical Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Successfully analyze and implement existing instructional designs and best practices in Career and Technical Education.

### Master of Education in English Education

### LO1: Relation between theory and pedagogy

**Providing Department:** Master of Education in English Education  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Demonstrate an understanding of the relation between relevant theory in the field of English Education and effective classroom pedagogy in the teaching of English 7-12.
LO2: Recognize the Relationship Between Language, Culture and Identity

Providing Department: Master of Education in English Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will begin to recognize the relationship between language, culture and identity and its significance and application for teaching English language arts.

LO3: Create lesson plans and activities

Providing Department: Master of Education in English Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate the ability to create lessons and activities that promote engaged learning and understanding of content.

LO4: Write in APA format

Providing Department: Master of Education in English Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to write in a professional style in accordance with the regulations of the American Psychological Association.

Master of Education in Reading

LO1: Educ Theories and Instructional Practices

Providing Department: Master of Education in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an understanding of the Reading specific educational theories and instructional strategies (Evidenced in RLL 7100, 7200, 7300).
LO2: Examine Rdg Research
Providing Department: Master of Education in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate the ability to critically examine educational research in Reading and connect it to practice (Evidence: RLL 7500 and/or RLL 7200).

LO3: Conduct Research
Providing Department: Master of Education in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate the ability to systematically collect, reflect and act upon evidence to improve educational practices in Reading (Evidence in RLL 7400 or other evidence-based projects).

LO4: Reflective Practice
Providing Department: Master of Education in Reading
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Engage in reflective practice as they implement inquiry in teaching (RLL 7300).

Master of Education in Teaching and Learning

LO 1: Synthesis of the Literature
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Synthesize the literature related to your chosen focus of study following APA style

LO 2: Research Methodology
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Design an investigation, examining some aspect of your practice, using appropriate methodology

LO 3: Theoretical Foundations
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Identify the theoretical foundations of various approaches to teaching and reflect on them in relation to your personal approach to teaching

LO 4: Inclusive Education
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Identify barriers to inclusive education, curriculum, and pedagogy and describe strategies that can be used by teachers and schools to create inclusion

LO 5: Application of Theory
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply theoretical foundations specific to your concentration area in your professional development

LO 6: Develop Curriculum
Providing Department: Master of Education in Teaching and Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop curriculum specific to your concentration area
Post-Bachelor Teacher Certification Program

**LO1: Learner Development**
Providing Department: Post-Bachelor Teacher Certification Program  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
The student will develop instruction illustrating understanding of how patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas.

---

**LO2: Learner Development**
Providing Department: Post-Bachelor Teacher Certification Program  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
The student will use knowledge of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

---

**LO3: Content Knowledge**
Providing Department: Post-Bachelor Teacher Certification Program  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
The student will create learning experiences that make the discipline accessible and meaningful for learners based on his/her understanding of central concepts, tools of inquiry, and structures of the taught discipline.

---

**LO4: Application of Content**
Providing Department: Post-Bachelor Teacher Certification Program  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
The student will connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.
LO5: Instructional Practice
Providing Department: Post-Bachelor Teacher Certification Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will plan and execute instruction that supports learners in meeting rigorous learning goals.

LO6: Professional Dispositions
Providing Department: Post-Bachelor Teacher Certification Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will display identified dispositions of an effective educator: responsibility for learning, collaborative interpersonal skills, professionalism, strong communication skills, and higher-level thinking.

LO7: Professional Responsibility
Providing Department: Post-Bachelor Teacher Certification Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effect of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Theoretical and Behavioral Foundations (TBF)

Doctor of Education in Counseling

1: Learning Outcome 1: General Advanced Knowledge
Providing Department: Doctor of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate advanced knowledge of the theoretical,
2: Learning Outcome 2: Skills

Providing Department: Doctor of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to utilize varying methods (supervision, teaching, counseling and advocacy) to translate theories of counseling and evidenced based strategies into effective practices in a culturally diverse society.

- **Supervision:** demonstrate the ability to effectively implement theories of supervision as well as utilize and receive feedback.
- **Teaching:** demonstrate the ability to effectively train and prepare students in the necessary roles, responsibilities and activities related to becoming counselor educators.
- **Counseling:** demonstrate the ability to effectively utilize theories and techniques of counseling.
- **Advocacy:** demonstrate the ability to effectively demonstrate an understanding of multicultural issues as they relate to social change and advocacy.

3.: Learning Outcome 3: Research

Providing Department: Doctor of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding/implementation of methods of statistics and research design.

4: Learning Outcome 4: Professional Dispositions

Providing Department: Doctor of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to adhere to ethical standards, promote advocacy and social justice, challenge personal beliefs and biases in the best interest of others and gain self-awareness.
Doctor of Education in Educational Evaluation and Research

1: Learning Outcomes #1: Quantitative & Qualitative Statistical Software
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
EER majors are required to master statistics packages and programming platforms that are essential for the coursework specific to their Plan of Work. This include SPSS, Minitab, StatXact, and LogXact; NVivo in the qualitative track.

2: Learning Outcomes #2: Psychometrics: CTT
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

3: Learning Outcomes #3: Research Design
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
In the Qualitative Track: Students acquire competencies in (1) fundamentals of epistemological issues, educational research perspectives and research design. Introduction to major research designs, including case study, narrative, phenomenological, grounded theory and ethnographic research. Overview of methods for analyzing talk, text, images, video and interaction. Readings in qualitative research; (2) Collecting, analyzing, and writing findings from ethnographic data (participant-observation field notes, interviews and artifacts); grounded theory; issues of rigor in naturalistic research in education.

In the Quantitative Track: Students acquire competencies in the scientific approach to the social and behavioral sciences. Determine researchable problem, develop problem statement and research hypothesis. Determine dependent(s) and independent(s) variables and their level of measurement. Ethical considerations and CITI. Mathematical statistical treatment of random assignment and selection: Simple, stratified, Clustered. Overview of instrument reliability and validity of usage; and descriptive and inferential statistics. Statistical development of effect sizes. Missing values analysis. Applied statistical treatment of experimental, Sawilowsky-Braver-Braver meta-analysis of Solomon four-group, quasi-experimental, causal-comparative, ex post facto, correlational, documentary (higher & lower criticism), and survey designs. Content analysis, case(s) records review.
4: Learning Outcomes #4: Applied Statistics
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

5: Learning Outcome#5: Program Evaluation
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students acquire skills in the historical development, purposes, usages, and activities of quantitative and qualitative educational program evaluation. Ethical and professional standards. Objectives, management, expertise, participant, comparative, and alternative approaches. Negotiating the evaluator’s role and purpose of the evaluation. Planning, design, cost analysis, data source, sampling, analysis, and reporting. Technical soundness of RFP. Evaluation Consulting.

6: EER Program Evaluation
Providing Department: Doctor of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Quantitative and Qualitative Program Evaluation of the EER degree programs for University Program Review and Self-Study.
This includes the annual (Fall/Winter) grade distribution for all students taking EER coursework.

Doctor of Philosophy in Counseling

1: Learning Outcome 1: General Advanced Knowledge

Providing Department: Doctor of Philosophy in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Students will be able to demonstrate advanced knowledge of the theoretical, philosophical and evidenced based research assumptions of counseling processes and techniques.

2: Learning Outcome 2: Skills

Providing Department: Doctor of Philosophy in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to utilize varying methods (supervision, teaching, counseling and advocacy) to translate theories of counseling and evidenced based strategies into effective practices in a culturally diverse society.

- **Supervision**: demonstrate the ability to effectively implement theories of supervision as well as utilize and receive feedback.
- **Teaching**: demonstrate the ability to effectively train and prepare students in the necessary roles, responsibilities and activities related to becoming counselor educators.
- **Counseling**: demonstrate the ability to effectively utilize theories and techniques of counseling.
- **Advocacy**: demonstrate the ability to effectively demonstrate an understanding of multicultural issues as they relate to social change and advocacy.

3: Learning Outcome 3: Research

Providing Department: Doctor of Philosophy in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding/implementation of methods of
4: Learning outcome 4: Professional dispositions

Providing Department: Doctor of Philosophy in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to adhere to ethical standards, promote advocacy and social justice, challenge personal beliefs and biases in the best interest of others and gain self-awareness.

Doctor of Philosophy in Educational Evaluation and Research

1: Learning Outcomes: Statistical Software

Providing Department: Doctor of Philosophy in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
EER majors are required to master statistics packages and programming platforms that are essential for the coursework specific to their Plan of Work. Currently, this may include SPSS, Minitab, StatXact, LogXact, AMOS, LISREL, Excel, Fortran, and R in the quantitative track; NVivo in the qualitative track; and Iteman, ASCAL, Multilog, and AMOS in the Measurement track.

2: Learning Outcomes #2: Psychometrics (CTT & IRT)

Providing Department: Doctor of Philosophy in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3: Learning Outcomes #3: Research and Experimental Design

Providing Department: Doctor of Philosophy in Educational Evaluation and Research

Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

In the Qualitative Track: Students acquire competencies in (1) fundamentals of epistemological issues, educational research perspectives and research design. Introduction to major research designs, including case study, narrative, phenomenological, grounded theory and ethnographic research. Overview of methods for analyzing talk, text, images, video and interaction. Readings in qualitative research; (2) Collecting, analyzing, and writing findings from ethnographic data (participant-observation field notes, interviews and artifacts); grounded theory; issues of rigor in naturalistic research in education, (3) NVivo software. Documenting personal research lens. Role of activism and advocacy. Qualitative tradition and the topology of science. Written, performance, visual, oral records. Memoing. 14 sampling strategies. Within-case, between-case, matrix, and network displays. Sequential analyses. Transcription. 29 Coding methods (Unit of Analysis, Pre-coding, Cycles, Post-coding, Pattern coding). Node creation. Thematic analysis. Negative case analysis. Peer- & Member-checking. Technical soundness and RFP writing. Expert testimony.

In the Quantitative Track: Students acquire competencies in the scientific approach to the social and behavioral sciences. Determine researchable problem, develop problem statement and research hypothesis. Determine dependent(s) and independent(s) variables and their level of measurement. Ethical considerations and CITI. Mathematical statistical treatment of random assignment and selection: Simple, stratified, Clustered. Overview of instrument reliability and validity of usage; and descriptive and inferential statistics. Statistical development of effect sizes. Missing values analysis. Applied statistical treatment of experimental, Sawilowsky-Braver-Braver meta-analysis of Solomon four-group, quasi-experimental, causal-comparative, ex post facto, correlational, documentary (higher & lower criticism), and survey designs. Content analysis, case(s) records review; (4) Use of fieldwork to collect, analyze, and write findings from ethnographic data (interviews, observations, videos, photographs, online digital media), deepening the understandings about culturally-sensitive research, rigor, and the politics of representation; (5) adopts a major tradition, and (6) development of Qualitative dissertation Chapters 1 and 3 based on insertion and integration at research site.

In the quantitative track, students students acquire competencies in the scientific approach to the social and behavioral sciences. Determine researchable problem, develop problem statement and research hypothesis. Determine dependent(s) and independent(s) variables and their level of measurement. Ethical considerations and CITI. Mathematical statistical treatment of random assignment and selection: Simple, stratified, Clustered. Overview of instrument reliability and validity of usage; and descriptive and inferential statistics. Statistical development of effect sizes. Missing values analysis. Applied statistical treatment of experimental, Sawilowsky-Braver-Braver meta-analysis of Solomon four-group, quasi-experimental, causal-comparative, ex post facto, correlational, documentary (higher & lower criticism), and survey designs. Content analysis, case(s) records review.
4: Learning Outcome #4: Applied Statistics
Providing Department: Doctor of Philosophy in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

5: Learning Outcome #5: Program Evaluation
Providing Department: Doctor of Philosophy in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students acquire skills in the historical development, purposes, usages, and activities of quantitative and qualitative educational program evaluation. Ethical and professional standards. Objectives, management, expertise, participant, comparative, and alternative approaches. Negotiating the evaluator’s role and purpose of the evaluation. Planning, design, cost analysis, data source, sampling, analysis, and reporting. Technical soundness of RFP. Evaluation Consulting.
6: EER Program Evaluation

**Providing Department:** Doctor of Philosophy in Educational Evaluation and Research

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Quantitative and Qualitative Program Evaluation of the EER degree programs for University Program Review and Self-Study.

This includes the annual (Fall/Winter) grade distribution for all students taking EER coursework.

Doctor of Philosophy in Educational Psychology

1: EDP Doctoral Learning Outcome 1

**Providing Department:** Doctor of Philosophy in Educational Psychology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate understanding of theories and scientific literature in the areas of psychology, especially different aspects of human development, motivation, learning processes, therapeutic approaches, and human diversity.

2: EDP Doctoral Learning Outcome 2

**Providing Department:** Doctor of Philosophy in Educational Psychology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate knowledge and skills in the areas of research design, methodology, and statistical analyses.

3: EDP Doctoral Learning Outcome 3

**Providing Department:** Doctor of Philosophy in Educational Psychology

**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Student will apply their knowledge and skills into their practice and/or research

4: EDP Doctoral Learning Outcome 4
Providing Department: Doctor of Philosophy in Educational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Students will demonstrate the appropriate knowledge related to the ethical standards for conducting Human Research. This involves successfully completing the CITI program on the ethical standards for conducting human research.

Education Specialist Certificate in Counseling

1.: Learning Outcome 1 Supervision
Providing Department: Education Specialist Certificate in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Students will demonstrate supervision skills with counselor trainees in a laboratory settings. Student Supervisors will use at least three supervision techniques with each counselor trainee.

2.: Learning Outcome 2 Career Development
Providing Department: Education Specialist Certificate in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Students will become proficient in supervising counselor trainees in locating, evaluating and using career information systems. Counselor trainees will demonstrating mastery of at least two career information systems.

3: Learning outcome three :Identify ethical violations
Providing Department: Education Specialist Certificate in Counseling
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Pass test on ethical issues in counseling.

4: Learning Outcome 4 Plan substance abuse intervention
Providing Department: Education Specialist Certificate in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan a substance abuse intervention that can be used in a small group setting.

GC in Applied Behavioral Analysis

1: Learning Outcome 1: Knowledge of ABA Foundations
Providing Department: GC in Applied Behavioral Analysis
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient knowledge of ABA foundations.

2: Learning Outcome 2: Knowledge of Assessment Methods
Providing Department: GC in Applied Behavioral Analysis
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient knowledge of ABA methods of assessment.
3: Learning Outcome 3: Knowledge of Intervention Techniques  
Providing Department: GC in Applied Behavioral Analysis  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will display sufficient knowledge of ABA Foundations.

4: Learning Outcome 4: Application of Skills  
Providing Department: GC in Applied Behavioral Analysis  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will display sufficient professional skills necessary for successful Applied Behavior Analysis practice as outlined by our national association—the Behavior Analytic Certification Board (BACB).

Graduate Certificate in Advanced Graduate Studies in School Psychology

1: Learning Outcome 1: Knowledge  
Providing Department: Graduate Certificate in Advanced Graduate Studies in School Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will display sufficient knowledge of School Psychology practice within all ten domains as outlined by our national association--The National Association of School Psychologists.

2: Learning Outcome 2: Student performance on case studies  
Providing Department: Graduate Certificate in Advanced Graduate Studies in School Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will display sufficient integration of knowledge and apply them to academic and behavioral case studies.
3: Learning Outcome 3: Applied skills during internship
Providing Department: Graduate Certificate in Advanced Graduate Studies in School Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient applied skills in the field of School Psychology practice, including assessment, consultation, and intervention.

4: Learning outcome 4: Professional dispositions
Providing Department: Graduate Certificate in Advanced Graduate Studies in School Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient professional dispositions necessary for successful School Psychology practice as outlined by our national association--The National Association of School Psychologists.

Master of Arts in Counseling

1: Learning Outcome 1: Counseling Knowledge
Providing Department: Master of Arts in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate knowledge of the theoretical, philosophical and evidenced based research assumptions of counseling processes and techniques in clinical/community mental health counseling and school counseling.

2: Learning Outcome 2: Professional Dispositions
Providing Department: Master of Arts in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to adhere to ethical standards, promote advocacy and social justice, challenge personal beliefs and biases in the best interest of
others and gain self-awareness.

3: Learning Outcome 3: Ethics
Providing Department: Master of Arts in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will understand legal, ethical and professional issues that impact clinical mental health and school counseling practice.

4: Learning outcome 4: Counseling Skills
Providing Department: Master of Arts in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to translate theories and evidenced based strategies into effective practices in a culturally diverse society.

Master of Arts in Counseling Psychology

1.0: CP Learning Outcome 1: Content Knowledge
Providing Department: Master of Arts in Counseling Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Content knowledge is assessed on an ongoing basis by examining performance in courses, with formal evaluation conducted by program faculty on a semester by semester basis. (students are required to have no more than one grade less than B- to remain in the program

2.0: CP Outcome 2: Psychological Assessments
Providing Department: Master of Arts in Counseling Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be proficient in the administration and interpretation of psychological and cognitive assessments for the purposes of assessing cognitive functioning, vocational
development, diagnostic estimates, and psychological functioning for youth and adults.

### 3.0: CP Outcome 3: Theory and Skills in Psychotherapy
**Providing Department:** Master of Arts in Counseling Psychology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
1. Students will be able to work with youth and adults experiencing clinically distressing symptoms or adjustment issues using a psychotherapy approach.

### 4.0 : CP Outcome 4: Professional disposition, ethics, cultural sensitivity
**Providing Department:** Master of Arts in Counseling Psychology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will learn professional dispositions, applications of ethical practice, and cultural competency and sensitivity with diverse populations.

---

**Master of Arts in Rehabilitation Counseling and Community Inclusion**

### 1: Learning Outcome 1: Knowledge in Coursework
**Providing Department:** Master of Arts in Rehabilitation Counseling and Community Inclusion  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
RCI students will demonstrate rehabilitation counseling knowledge and skills within the domains as outlined by our national accrediting association, the Council on Rehabilitation Counseling Education.

### 2: Learning Outcome 2: Knowledge on National Exam
**Providing Department:** Master of Arts in Rehabilitation Counseling and Community Inclusion  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will demonstrate knowledge of rehabilitation counseling concepts delineated by our national...
organization (Council on Rehabilitation Education) and earn passing scores on the national exam, the Certified Rehabilitation Counselor exam.

3: Learning Outcome 3: Applied Skills
Providing Department: Master of Arts in Rehabilitation Counseling and Community Inclusion
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display knowledge of applied skills in the field of Rehabilitation Counseling practice, including adjustment and career counseling, case management, job development and job placement, assessment, and other intervention services so that they can apply these skills in a clinical setting.

4: Learning Outcome 4: Professional Development
Providing Department: Master of Arts in Rehabilitation Counseling and Community Inclusion
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient professional development necessary for successful Rehabilitation Counseling practice as outlined by the Commission on Rehabilitation Counselor Certification and membership in professional organizations such as the American Rehabilitation Counseling Association (ARCA), National Rehabilitation Counseling Association (NRCA) and the American Counseling Association (ACA).

Master of Arts in School and Community Psychology

1: SCP Learning Outcome 1: Knowledge in coursework
Providing Department: Master of Arts in School and Community Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will display sufficient knowledge of School Psychology practice within all ten domains as outlined by our national association--The National Association of School Psychologists.
**2: SCP Learning Outcome 2: Knowledge on national exam**

*Providing Department:* Master of Arts in School and Community Psychology  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
Students will demonstrate knowledge of all school psychology concepts delineated by our national organization (National Association of School Psychologists) and earn passing scores on the national ETS Praxis exam.

---

**3: SCP Learning Outcome 3: Applied Skills**

*Providing Department:* Master of Arts in School and Community Psychology  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
Students will display sufficient applied skills in the field of School Psychology practice, including assessment, consultation, and intervention.

---

**4: SCP Learning Outcome 4: Professional Dispositions**

*Providing Department:* Master of Arts in School and Community Psychology  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
Students will display sufficient professional dispositions necessary for successful School Psychology practice as outlined by our national association--The National Association of School Psychologists.

---

**Master of Education in Counseling**

**1: Learning outcome 1: Guidance activities**

*Providing Department:* Master of Education in Counseling  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**  
Students will be able to identify and describe guidance activities within the umbrellas of Counseling, Consulting and Coordination within Clinical Mental Health and school settings.
2: Learning outcome 2: Classroom management
Providing Department: Master of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to define and give examples of application of psychological and classroom management principles in working with clients in a clinical mental health and/or classroom setting.

3: Learning outcome 3: Career guidance
Providing Department: Master of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate competencies in career guidance techniques and counseling techniques when working with youth facing career choices.

4: Learning outcome 4: General counseling concepts
Providing Department: Master of Education in Counseling
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student will complete final project or paper in capstone class ED 7999.

Master of Education in Educational Evaluation and Research

1: Learning Outcome #1: Quantitative & Qualitative Statistical Software
Providing Department: Master of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
EER majors are required to master statistics packages and programming platforms that are essential for the coursework specific to their Plan of Work. Currently, this may include SPSS, Minitab for the quantitative track; and NVivo in the qualitative track.
2: Learning Outcome 2: Measurement & Testing
Providing Department: Master of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master competencies pertaining to Mastery level and Standardized testing, and Classical Measurement theory.

3: Learning Outcomes 3: Research Design
Providing Department: Master of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master concepts pertaining to quantitative writing skills, thesis chapters 1 - 3 (introduction, literature review, methodology), ethics in research, basic sampling plans, instrument reliability and validity, overview of applied statistics, and research designs.

Providing Department: Master of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master data structures, variables, summation notation, graphing, measures of central tendency, measures of variability, measures of bivariate analysis, normal distribution and Z scores, correlation, simple linear regression, sampling theory, hypothesis testing, two sample independent and dependent tests, nominal based analysis, and factorial layouts.

5: EER Program Evaluation
Providing Department: Master of Education in Educational Evaluation and Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Quantitative and Qualitative Program Evaluation of the EER degree programs for University Program Review and Self-Study.

This includes the annual (Fall/Winter) grade distribution for all students taking EER coursework.
Master of Education in Educational Psychology

1: Learning Outcome 1: Knowledge of human development
Providing Department: Master of Education in Educational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn about and be able to apply theories and research about human development. Topics included are ones on physical, cognitive, social, and emotional development. Additional topics include attachment theory, temperament, development of intelligence, and adolescent social behavior and risk taking.

2: Learning Outcome 2: Knowledge and application of behavior change models
Providing Department: Master of Education in Educational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning outcomes for this goal include knowledge and understanding of learning theories such as classical, operant, cognitive, cognitive-behavioral, and social learning theories to a variety of applied situations. Students will learn to understand the world around them and to implement behavior changes as appropriate to their work environments.

3: Learning Outcome 3: Knowledge of evaluation and measurement
Providing Department: Master of Education in Educational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate through course performance passing knowledge of statistical measurement and evaluation concepts.

4: Learning Outcome 4: Knowledge of Educational Psychology Foundations
Providing Department: Master of Education in Educational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning outcomes for this goal include knowledge and understanding of foundational
educational psychology concepts such as motivation, attribution theory, intelligence, information processing models of memory, classroom assessment and grading, and classroom instruction approaches.

UG Cert in Applied Behavior Analysis

1: Learning Outcome 1: Knowledge of ABA Foundations
   Providing Department: UG Cert in Applied Behavior Analysis
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will display sufficient knowledge of ABA foundations.

2: Learning Outcome 2: Knowledge of ABA Techniques
   Providing Department: UG Cert in Applied Behavior Analysis
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will display sufficient knowledge of ABA methods of assessment.

3: Learning Outcome 3: Demonstration of ABA Foundational Skills
   Providing Department: UG Cert in Applied Behavior Analysis
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will display sufficient knowledge of ABA methods of assessment and treatment planning.

4: Learning Outcome 4: Demonstration of ABA Techniques
   Providing Department: UG Cert in Applied Behavior Analysis
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will display sufficient professional skills necessary for successful Applied Behavior Analysis practice as outlined by our national association—the Behavior Analytic
College of Engineering

Alternative Energy Technology Program

Graduate Certificate in Alternative Energy Technology

1: Comprehend the engineering fundamentals of various types of fuel cell systems, hydrogen reforming and storage strategy, system design and integration issues, and system evaluation and economic analysis.

Providing Department: Graduate Certificate in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Comprehend the engineering fundamentals of various types of fuel cell systems, hydrogen reforming and storage strategy, system design and integration issues, and system evaluation and economic analysis.

2: Apply the energy system fundamentals and analyses to address the key issues in design and integration of various AET systems, in particular solar heating and photovoltaic, wind turbine, biomass conversion and fuel cells.

Providing Department: Graduate Certificate in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply the energy system fundamentals and analyses to address the key issues in design and integration of various AET systems, in particular solar heating and photovoltaic, wind turbine, biomass conversion and fuel cells.

3: Gain knowledge and skill to apply systematic and structured methodology to economically implement AE systems.

Providing Department: Graduate Certificate in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Gain knowledge and skill to apply systematic and structured methodology to economically implement AE systems.
4: Equipped with the knowledge and skills to provide engineering services in planning, designing and constructing hydrogen infrastructure components and systems.

Providing Department: Graduate Certificate in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Equipped with the knowledge and skills to provide engineering services in planning, designing and constructing hydrogen infrastructure components and systems.

---

Master of Science in Alternative Energy Technology

1: Comprehend the engineering fundamentals of various types of fuel cell systems, hydrogen reforming and storage strategy, system design and integration issues, and system evaluation and economic analysis.

Providing Department: Master of Science in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Comprehend the engineering fundamentals of various types of fuel cell systems, hydrogen reforming and storage strategy, system design and integration issues, and system evaluation and economic analysis.

---

2: Apply the energy system fundamentals and analyses to address the key issues in design and integration of various AET systems, in particular solar heating and photovoltaic, wind turbine, biomass conversion and fuel cells.

Providing Department: Master of Science in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply the energy system fundamentals and analyses to address the key issues in design and integration of various AET systems, in particular solar heating and photovoltaic, wind turbine, biomass conversion and fuel cells.

---

3: Gain knowledge and skill to apply systematic and structured methodology to economically implement AE systems.

Providing Department: Master of Science in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Gain knowledge and skill to apply systematic and structured methodology to
economically implement AE systems.

4: Equipped with the knowledge and skills to provide engineering services in planning, designing and constructing hydrogen infrastructure components and systems.

Providing Department: Master of Science in Alternative Energy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Equipped with the knowledge and skills to provide engineering services in planning, designing and constructing hydrogen infrastructure components and systems.

Biomedical Engineering

Bachelor of Science in Biomedical Engineering

BS-BME1: Apply life science, physical science, math (incl difeq and statistics), and engineering

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply life science, physical science, math (incl difeq and statistics), and engineering

BS-a: Apply knowledge of math, science, and engineering

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ABET A.) Students will demonstrate an ability to apply knowledge of mathematics, science, and engineering

BS-b: Ability to design and conduct experiments, analyze and interpret data

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
BS-c: Design a system, component, or process to meet desired needs within realistic constraints

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to design a system, component, or process to meet desired needs within realistic constraints.

BS-d: Function on multidisciplinary teams

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to function on multidisciplinary teams.

BS-e: Identify, formulate, and solve engineering problems

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify, formulate, and solve engineering problems.

BS-f: Understanding of professional ethical responsibility

Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
understanding of professional ethical responsibility

BS-g: Communicate effectively
Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate effectively.

BS-h: Understand the impact of engineering solutions in a global, economic, environmental, and societal context
Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will understand the impact of engineering solutions in a global, economic, environmental, and societal context.

BS-i: Recognize the need for and ability to engage in lifelong learning
Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will recognize the need for and have the ability to engage in lifelong learning.

BS-j: Demonstrate a knowledge of contemporary issues
Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of contemporary issues.

BS-k: Ability to use techniques, skills, and modern engineering tools necessary for engineering practice
Providing Department: Bachelor of Science in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate the ability to use techniques, skills, and modern engineering tools necessary for engineering practice.

Bridge Graduate Certificate in Injury Biomechanics

1: LO1: Students will be able to demonstrate an ability to apply knowledge of mathematics, science, and engineering to solve problems in injury biomechanics

Providing Department: Bridge Graduate Certificate in Injury Biomechanics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: Students will be able to demonstrate an ability to apply knowledge of mathematics, science, and engineering to solve problems in injury biomechanics

2: LO2: Students will be able to demonstrate an ability to design a biomedical engineering system, component, or process to to address injury biomechanics issues.

Providing Department: Bridge Graduate Certificate in Injury Biomechanics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design a biomedical engineering system, component, or process to to address injury biomechanics issues.

3: LO3: Students will be able to demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for injury biomechanics practice.

Providing Department: Bridge Graduate Certificate in Injury Biomechanics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for injury biomechanics practice.
4: LO4: Students will be able to demonstrate an ability to design and conduct injury biomechanics experiments, as well as to collect, analyze and interpret biomechanics data.

Providing Department: Bridge Graduate Certificate in Injury Biomechanics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design and conduct injury biomechanics experiments, as well as to collect, analyze and interpret biomechanics data.

Doctorate of Philosophy in Biomedical Engineering

PhD-1: Apply math, science and engineering concepts to identify, formulate and solve problems in biology and medicine, design and conduct scientific experiments and analyze and interpret the resulting data.

Providing Department: Doctorate of Philosophy in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply math, science and engineering concepts to identify, formulate and solve problems in biology and medicine, design and conduct scientific experiments and analyze and interpret the resulting data.

PhD-2: The graduates will be able to plan and conduct independent research which leads to the development of new knowledge, new approaches, solutions and/or instruments for biology and medicine.

Providing Department: Doctorate of Philosophy in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to plan and conduct independent research which leads to the development of new knowledge, new approaches, solutions and/or instruments for biology and medicine.

PhD-3: Effectively communicate scientific and engineering concepts to audiences with a broad range of technical knowledge.

Providing Department: Doctorate of Philosophy in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will be able to effectively communicate scientific and engineering concepts to audiences with a broad range of technical knowledge.

PhD-4: Obtain sufficient understanding of the mathematical, physical and biological sciences for comprehension of literature in these and related fields.
Providing Department: Doctorate of Philosophy in Biomedical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to obtain sufficient understanding of the mathematical, physical and biological sciences for comprehension of literature in these and related fields.

Dual Title in Biomedical Imaging

LO1: Good comprehension of theory and research in biological and medical imaging.
Providing Department: Dual Title in Biomedical Imaging
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate good comprehension of theory and research in biological and medical imaging, and their corresponding medical applications in anatomy and physiology in healthy and diseased states

LO2: Application of theory and research in biomedical imaging area
Providing Department: Dual Title in Biomedical Imaging
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate the ability to apply theory and research in the biological and medical imaging area, including research design, data analysis, and interpretation.

LO3: Ability to design and conduct scientific experiments
Providing Department: Dual Title in Biomedical Imaging
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate the ability to apply math, science and physics concepts to identify,
formulate and solve problems in biomedical imaging, design and conduct scientific experiments and analyze and interpret the resulting data.

**LO4: Ability to effectively communicate research-related results**

<table>
<thead>
<tr>
<th>Providing Department:</th>
<th>Dual Title in Biomedical Imaging</th>
</tr>
</thead>
<tbody>
<tr>
<td>Start:</td>
<td>9/1/2017</td>
</tr>
<tr>
<td>End:</td>
<td>8/31/2018</td>
</tr>
</tbody>
</table>

**Learning Outcome Description**

Students demonstrate the ability to effectively communicate the results of their research to audiences with a broad range of technical knowledge.

**Master of Science in Biomedical Engineering**

**MS-1: Apply math, science and engineering concepts to identify and solve problems in biology and medicine.**

<table>
<thead>
<tr>
<th>Providing Department:</th>
<th>Master of Science in Biomedical Engineering</th>
</tr>
</thead>
<tbody>
<tr>
<td>Start:</td>
<td>9/1/2017</td>
</tr>
<tr>
<td>End:</td>
<td>8/31/2018</td>
</tr>
</tbody>
</table>

**Learning Outcome Description**

Students will be able to apply math, science and engineering concepts to identify and solve problems in biology and medicine.

**MS-2: Obtain sufficient understanding of the mathematical, physical and biological sciences for comprehension of literature in these and related fields.**

<table>
<thead>
<tr>
<th>Providing Department:</th>
<th>Master of Science in Biomedical Engineering</th>
</tr>
</thead>
<tbody>
<tr>
<td>Start:</td>
<td>9/1/2017</td>
</tr>
<tr>
<td>End:</td>
<td>8/31/2018</td>
</tr>
</tbody>
</table>

**Learning Outcome Description**

Students will be able to obtain sufficient understanding of the mathematical, physical and biological sciences for comprehension of literature in these and related fields.

**MS-3: Use the techniques, skills, and modern science and engineering tools in biomedical engineering.**

<table>
<thead>
<tr>
<th>Providing Department:</th>
<th>Master of Science in Biomedical Engineering</th>
</tr>
</thead>
<tbody>
<tr>
<td>Start:</td>
<td>9/1/2017</td>
</tr>
<tr>
<td>End:</td>
<td>8/31/2018</td>
</tr>
</tbody>
</table>

**Learning Outcome Description**

Students will be able to use the techniques, skills and modern science and engineering tools in biomedical engineering.
tools in biomedical engineering.

MS-4: Engage in life-long learning on recent advances in the field of biomedical engineering

**Providing Department:** Master of Science in Biomedical Engineering  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to engage in life-long learning on recent advances in the field of biomedical engineering.

Chemical Engineering and Materials Science

Bachelor of Science in Chemical Engineering

a: an ability to apply knowledge of mathematics, science, and engineering

**Providing Department:** Bachelor of Science in Chemical Engineering  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to demonstrate an ability to apply knowledge of mathematics, science, and engineering.

b: an ability to design and conduct experiments, as well as to analyze and interpret data

**Providing Department:** Bachelor of Science in Chemical Engineering  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Student will demonstrate an ability to design and conduct experiments, as well as to analyze and interpret data.

c: an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

**Providing Department:** Bachelor of Science in Chemical Engineering  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Students will be able to demonstrate an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

d: an ability to function on multidisciplinary teams
Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to function on multidisciplinary teams

e: an ability to identify, formulate, and solve engineering problems
Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to identify, formulate, and solve engineering problems

f: an understanding of professional and ethical responsibility
Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of professional and ethical responsibility

g: an ability to communicate effectively
Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to communicate effectively
h: the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context

Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context.

i: a recognition of the need for, and an ability to engage in life-long learning

Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a recognition of the need for, and an ability to engage in life-long learning.

j: a knowledge of contemporary issues

Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of contemporary issues.

k: an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

Providing Department: Bachelor of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.
1: Learning Outcome 1
Providing Department: Doctor of Philosophy in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to produce and defend an original contribution to knowledge

2: Learning Outcome 2
Providing Department: Doctor of Philosophy in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate mastery of advanced subject material in Chemical Engineering

3: Learning Outcome 3
Providing Department: Doctor of Philosophy in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to conduct scholarly activities in an ethical manner

4: Learning outcome 4
Providing Department: Doctor of Philosophy in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Further develop career skills through life-long learning

5: Learning Outcome 5
Providing Department: Doctor of Philosophy in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate communication skills, both in writing and presentation.
Doctor of Philosophy in Materials Science and Engineering

1: Learning Outcome 1
Providing Department: Doctor of Philosophy in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to produce and defend an original contribution to Materials Science knowledge

2: Learning Outcome 2
Providing Department: Doctor of Philosophy in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate mastery of advanced subject material in Chemical Engineering

3: Learning Outcome 3
Providing Department: Doctor of Philosophy in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to conduct scholarly & professional activities in the field of Materials Science in an ethical manner.

4: Learning Outcome 4
Providing Department: Doctor of Philosophy in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Further develop career skills through life-long learning
5: Learning Outcome 5
Providing Department: Doctor of Philosophy in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate communication skills.

Graduate Certificate in Polymer Engineering

1: Demonstrate mastery of advanced subject material [GC PE]
Providing Department: Graduate Certificate in Polymer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate mastery of advanced subject material in Polymer Science and Engineering

2: An ability to identify, formulate, and solve problems in Polymer Science and Engineering
Providing Department: Graduate Certificate in Polymer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate an ability to identify, formulate, and solve problems in Polymer Science and Engineering

3: Know about emerging and frontier knowledge in Polymer Science and Engineering
Providing Department: Graduate Certificate in Polymer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student will know about emerging and frontier knowledge in Polymer Science and Engineering

4: An ability to communicate effectively in the field of Polymer Science and Engineering
Providing Department: Graduate Certificate in Polymer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate an ability to communicate effectively in the field of Polymer Science and Engineering.

Master of Science in Chemical Engineering

1: Learning Outcome 1
Providing Department: Master of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate mastery of advanced subject material in Chemical Engineering.

2: Learning Outcome 2
Providing Department: Master of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to conduct scholarly activities in an ethical manner.

3: Learning Outcome 3
Providing Department: Master of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate communication skills.

4: Learning Outcome 4
Providing Department: Master of Science in Chemical Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Student will be able to develop career skills through life-long learning.

Master of Science in Materials Science and Engineering

1: Learning Outcome 1
Providing Department: Master of Science in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Building upon an appropriate background in engineering and/or physical sciences at the baccalaureate level, students will be able to demonstrate mastery of advanced subject material in Materials Science.

2: Learning Outcome 2
Providing Department: Master of Science in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to conduct scholarly activities in an ethical manner.

3: Learning Outcome 3
Providing Department: Master of Science in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate communication skills.

4: Learning Outcome 4
Providing Department: Master of Science in Materials Science and Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student will be able to develop career skills through life-long learning.
Sustainable Engineering Certificate

1: LO 1 - Student will demonstrate a deep understanding of sustainability principles
   Providing Department: Sustainable Engineering Certificate
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will demonstrate a deep understanding of sustainability principles

2: LO 2 - Student will demonstrate the ability to conduct sustainability assessment and life-cycle analysis
   Providing Department: Sustainable Engineering Certificate
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   LO (b): student will demonstrate the ability to conduct sustainability assessment and life-cycle analysis

3: LO 3 - An ability to implement sustainability principles in the engineering analysis and design of a system, component, or process.
   Providing Department: Sustainable Engineering Certificate
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   LO (c): an ability to implement sustainability principles in the engineering analysis and design of a system, component, or process.

4: LO 4 - Students will be able to apply sustainability principles to inform professional and ethical responsibility in a global, economic, environmental, and societal context
   Providing Department: Sustainable Engineering Certificate
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   LO (d): students will be able to apply sustainability principles to inform professional and ethical responsibility in a global, economic, environmental, and societal context
Bachelor of Science in Civil Engineering

a: The ability to apply knowledge of mathematics, science and engineering within the framework of solving civil engineering problems, including...

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to apply knowledge of mathematics, science and engineering within the framework of solving civil engineering problems, including the analysis and design of structures, transportation systems, water treatment and supply systems, wastewater collection and treatment systems, as well as the geotechnical aspects of each.

b: The ability to design and conduct experiments, as well as collect and interpret experimental data, pertaining to civil engineering systems.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to design and conduct experiments, as well as collect and interpret experimental data, pertaining to civil engineering systems.

c: The ability to design a civil engineering system, system component or process which meets specific needs.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to design a civil engineering system, system component or process which meets specific needs.

d: The ability to collaborate, communicate and work effectively with others on multi-disciplinary teams.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to collaborate, communicate and work effectively with others on multi-disciplinary teams.
e: The ability to identify, formulate and solve a range of civil engineering problems.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to identify, formulate and solve a range of civil engineering problems.

f: An understanding and appreciation of professional and ethical responsibility in the practice of civil engineering.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding and appreciation of professional and ethical responsibility in the practice of civil engineering.

g: The ability to communicate effectively in both written and oral form.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to communicate effectively in both written and oral form.

h: A broad educational background which addresses the importance of global and societal factors as they affect and are affected by civil engineering systems.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a broad educational background which addresses the importance of global and societal factors as they affect and are affected by civil engineering systems.
i: An understanding of the importance of life-long learning and continuing education

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of the importance of life-long learning and continuing education.

j: An understanding of important contemporary issues within and outside the civil engineering profession.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of important contemporary issues within and outside the civil engineering profession.

k: The ability to use the techniques, skills and modern engineering tools required for the practice of civil engineering.

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to use the techniques, skills and modern engineering tools required for the practice of civil engineering.

l: An understanding of civil engineering professional practice issues such as: procurement of work, bidding versus quality-based selection processes, addressing public safety concerns in project design, how design professionals interact with the construction

Providing Department: Bachelor of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the ability to use the techniques, skills and modern engineering tools required for the practice of civil engineering.
1: Design and complete original research in their specialty area.
   Providing Department: Doctor of Philosophy with a major in Civil Engineering
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will be able to design and complete original research in their specialty area.

2: Demonstrate the ability to lead project teams.
   Providing Department: Doctor of Philosophy with a major in Civil Engineering
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will be able to demonstrate the ability to lead project teams.

3: Evaluate complex and novel engineering problems and derive solutions using original (non-standard) approaches and methodologies.
   Providing Department: Doctor of Philosophy with a major in Civil Engineering
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will be able to evaluate complex and novel engineering problems and derive solutions using original (non-standard) approaches and methodologies.

4: Communicate technical information to a range of audiences both verbally and in writing.
   Providing Department: Doctor of Philosophy with a major in Civil Engineering
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Students will be able to communicate technical information to a range of audiences both verbally and in writing.

5: Demonstrate professionalism with a commitment to the highest standards of ethical principles.
   Providing Department: Doctor of Philosophy with a major in Civil Engineering
   Start: 9/1/2017
   End: 8/31/2018
Learning Outcome Description
Students will be able to demonstrate professionalism with a commitment to the highest standards of ethical principles.

Master of Science in Civil Engineering

1: Demonstrate the skills and competency to function in, and ultimately lead, project teams.

Providing Department: Master of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the skills and competency to function in, and ultimately lead, project teams.

2: Analyze and solve complex and emerging engineering problems using newly developed approaches and methodologies.

Providing Department: Master of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to analyze and solve complex and emerging engineering problems using newly developed approaches and methodologies.

3: Communicate technical information to a range of audiences both verbally and in writing.

Providing Department: Master of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate technical information to a range of audiences both verbally and in writing.

4: Demonstrate professionalism with a commitment to the highest standards of ethical principles.

Providing Department: Master of Science in Civil Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will be able to demonstrate professionalism with a commitment to the highest standards of ethical principles.

Computer Science

Bachelor of Science in Computer Science

LO1: BS Computer Science_LO 1_Apply Principles
Providing Department: Bachelor of Science in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply the principles of computer science, mathematics, and scientific investigation to solve real-world problems appropriate to the discipline.

LO2: BS Computer Science_LO 2_Lifelong Learning Skills
Providing Department: Bachelor of Science in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have lifelong learning skills, which will allow them to successfully adapt to evolving technologies throughout their professional careers.

LO3: BS Computer Science_LO 3_Prepared for Employment and Advanced Studies
Providing Department: Bachelor of Science in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are sufficiently prepared for employment and advanced studies, and will have significant experiences with complex software development for real-world problems.

LO4: BS Computer Science_LO 4_Teamwork, Communication, and Interpersonal Skills
Providing Department: Bachelor of Science in Computer Science
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will have sufficient teamwork, communication, and interpersonal skills to enable them to work with others effectively in their professional careers.

LO5: BS Computer Science_LO 5_Function Ethically and Responsibly
Providing Department: Bachelor of Science in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can function ethically and responsibly, and are conscious of ethical, social, global, legal, security and professional issues related to computing.

Doctor of Philosophy with a Major in Computer Science

LO1: PhD Computer Science LO1 Advanced Study and Research
Providing Department: Doctor of Philosophy with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must demonstrate the ability to engage in advanced study and research.

LO2: PhD Computer Science LO2 Understand Research and Tools
Providing Department: Doctor of Philosophy with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must demonstrate the ability to understand the major research questions and fundamental tools needed to solve problems in a given sub-field of Computer Science.

LO3: PhD Computer Science LO3 Original and Scholarly Research
Providing Department: Doctor of Philosophy with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must produce original and scholarly research that contributes to one or more of the sub-fields of Computer Science.
LO4: PhD Computer Science LO4 Research Contribution

Providing Department: Doctor of Philosophy with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are expected to have made a significant contribution to research in their sub-field and as a result have become integrated into their various professional communities. They will then be in a position to address large scale issues of both national and global concern.

GC in Cyber-Physical Systems

PL04: Domain-Specific CPS Topics

Providing Department: GC in Cyber-Physical Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply the fundamental principles and techniques of cyber-physical systems.

PLO1: CPS Principles & Techniques

Providing Department: GC in Cyber-Physical Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understanding of fundamental principles and techniques of CPS, including sensing and HMI, embedded computing and networking, control and robotics, security, data analytics, and systems integration.

PLO2: CPS Practice & Research

Providing Department: GC in Cyber-Physical Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Capability of applying CPS principles and techniques in practice (e.g., in different CPS application domains) and pushing the frontiers of CPS knowledge and practice.
PLO3: Teamwork and Collaboration

Providing Department: GC in Cyber-Physical Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to work effectively in a team toward the successful completion of a project.

Master of Science with a Major in Computer Science

LO1: MS Computer Science_LO1_Analyze and produce solution

Providing Department: Master of Science with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to analyze a problem, and identify and define the computing requirements appropriate to its solution, and produce a corresponding implementation.

LO2: MS Computer Science_LO2_Questions and Research

Providing Department: Master of Science with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to understand the fundamental questions relevant to state of research in a selected sub-discipline as presented in CSC 7000 level courses.

LO3: MS Computer Science_LO3_Advance the Field

Providing Department: Master of Science with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to advance the field in the core subject areas through the production of new software, algorithms, and models as documented in peer reviewed publications in the field.
LO4: MS Computer Science_LO4_Lifelong Learning Activities
Providing Department: Master of Science with a Major in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The ability to pursue lifelong learning activities, which will allow them to successfully adapt to evolving technologies throughout their professional careers.

Electrical and Computer Engineering
Bachelor of Science in Electrical Engineering

a: An ability to apply knowledge of mathematics, science, and engineering.
Providing Department: Bachelor of Science in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate an ability to apply knowledge of mathematics, science, and engineering.

b: An ability to design and conduct experiments, as well as to analyze and interpret data.
Providing Department: Bachelor of Science in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate an ability to design and conduct experiments, as well as to analyze and interpret data.

c: An ability to design a system, component or process to meet desired needs.
Providing Department: Bachelor of Science in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate an ability to design a system, component or process to meet desired needs.
d: An ability to function on multidisciplinary teams.
   **Providing Department:** Bachelor of Science in Electrical Engineering
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Students will demonstrate an ability to function on multidisciplinary teams.

---

e: An ability to identify, formulate, and solve engineering problems.
   **Providing Department:** Bachelor of Science in Electrical Engineering
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Students will demonstrate an ability to identify, formulate, and solve engineering problems.

---

f: An understanding of professional and ethical responsibility.
   **Providing Department:** Bachelor of Science in Electrical Engineering
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Students will demonstrate an understanding of professional and ethical responsibility.

---

g: An ability to communicate effectively.
   **Providing Department:** Bachelor of Science in Electrical Engineering
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Students will demonstrate an ability to communicate effectively.

---

h: The broad education necessary to understand the impact of engineering solutions in a global and societal context.
   **Providing Department:** Bachelor of Science in Electrical Engineering
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Students will demonstrate the broad education necessary to understand the impact of engineering solutions in a global and societal context.
A recognition of the need for, and an ability to engage in, life-long learning.

**Providing Department:** Bachelor of Science in Electrical Engineering

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate a recognition of the need for, and an ability to engage in, life-long learning.

A knowledge of contemporary issues.

**Providing Department:** Bachelor of Science in Electrical Engineering

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate a knowledge of contemporary issues.

An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

**Providing Department:** Bachelor of Science in Electrical Engineering

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

Doctor of Philosophy in Computer Engineering

1: Learning Outcome

**Providing Department:** Doctor of Philosophy in Computer Engineering

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will be able to demonstrate mastery of advanced principles pertaining to the computer engineering research path of the Ph.D. candidate.
2: Learning Outcome
Providing Department: Doctor of Philosophy in Computer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to plan and conduct independent research which leads to the development of new knowledge, approaches and solutions for computer engineering problems.

3: Learning Outcome
Providing Department: Doctor of Philosophy in Computer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate comprehension of contemporary literature in the computer engineering area.

4: Learning Outcome
Providing Department: Doctor of Philosophy in Computer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to effectively communicate, both verbally and in writing, scientific and engineering concepts to audiences with a broad range of technical knowledge.

Doctor of Philosophy in Electrical Engineering

1: Learning Outcome
Providing Department: Doctor of Philosophy in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate mastery of advanced principles pertaining to the electrical engineering research path of the Ph.D. candidate.
2: Learning Outcome
Providing Department: Doctor of Philosophy in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to plan and conduct independent research which leads to the development of new knowledge, approaches and solutions for electrical engineering problems.

3: Learning Outcome
Providing Department: Doctor of Philosophy in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate comprehension of contemporary literature in the electrical engineering area.

4: Learning Outcome
Providing Department: Doctor of Philosophy in Electrical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to effectively communicate, both verbally and in writing, scientific and engineering concepts to audiences with a broad range of technical knowledge.

Master of Science in Computer Engineering

1: Learning Outcome
Providing Department: Master of Science in Computer Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to tackle complex and challenging computer engineering problems using contemporary approaches and methodologies.
2: Learning Outcome  
Providing Department: Master of Science in Computer Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to use techniques, skills, and modern engineering tools necessary for computer engineering practice.

3: Learning Outcome  
Providing Department: Master of Science in Computer Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to demonstrate comprehension of contemporary literature in the computer engineering area.

4: Learning Outcome  
Providing Department: Master of Science in Computer Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to effectively communicate, both verbally and in writing, scientific and engineering concepts to audiences with a broad range of technical knowledge.

Master of Science in Electrical Engineering

1: Learning Outcome  
Providing Department: Master of Science in Electrical Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to tackle complex and challenging electrical engineering problems using contemporary approaches and methodologies.
2: Learning Outcome  
Providing Department: Master of Science in Electrical Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to use techniques, skills, and modern engineering tools necessary for electrical engineering practice.

3: Learning Outcome  
Providing Department: Master of Science in Electrical Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to demonstrate comprehension of contemporary literature in the electrical engineering area.

4: Learning Outcome  
Providing Department: Master of Science in Electrical Engineering  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to effectively communicate, both verbally and in writing, scientific and engineering concepts to audiences with a broad range of technical knowledge.

Undergraduate Certificate in Control Systems

0: Please note that this program is canceled or in the process of being shut down.  
Providing Department: Undergraduate Certificate in Control Systems  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
This program is being shut down. It needs to be removed from evaluation.

a: An ability to apply knowledge of mathematics, science, and engineering  
Providing Department: Undergraduate Certificate in Control Systems  
Start: 9/1/2017  
End: 8/31/2018
Learning Outcome Description
An ability to apply knowledge of mathematics, science, and engineering

b: An ability to design and conduct experiments, as well as to analyze and interpret data
Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design and conduct experiments, as well as to analyze and interpret data

c: An ability to design a system, component or process to meet desired needs
Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design a system, component or process to meet desired needs

d: An ability to function on multidisciplinary teams
Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to function on multidisciplinary teams

e: An ability to identify, formulate, and solve engineering problems
Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to identify, formulate, and solve engineering problems

f: An understanding of professional and ethical responsibility
Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
An understanding of professional and ethical responsibility

h: The broad education necessary to understand the impact of engineering solutions in a global and societal context

Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The broad education necessary to understand the impact of engineering solutions in a global and societal context

j: A knowledge of contemporary issues

Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
A knowledge of contemporary issues

k: An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice

Providing Department: Undergraduate Certificate in Control Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice

Electric-drive Vehicle Engineering Program

Graduate Certificate in Electric-drive Vehicle Engineering

1: An ability to select and apply a knowledge of mathematics, science, and engineering to identify and solve problems in ground vehicle electrification and hybridization and related general engineering areas.

Providing Department: Graduate Certificate in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
An ability to select and apply a knowledge of mathematics, science, and engineering to identify and solve problems in ground vehicle electrification and hybridization and related general engineering areas.

2: An ability to apply the methodologies, skills, and modern science and engineering tools in vehicle electrification and hybridization engineering design, research, development, and applications.

Providing Department: Graduate Certificate in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply the methodologies, skills, and modern science and engineering tools in vehicle electrification and hybridization engineering design, research, development, and applications.

3: An ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.

Providing Department: Graduate Certificate in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.

4: An ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.

Providing Department: Graduate Certificate in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to identify, analyze, and solve broadly-defined vehicle electrification and hybridization problems.

Master of Science in Electric-drive Vehicle Engineering
1: An ability to select and apply a knowledge of mathematics, science, and engineering to identify and solve problems in ground vehicle electrification and hybridization and related general engineering areas.

Providing Department: Master of Science in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to select and apply a knowledge of mathematics, science, and engineering to identify and solve problems in ground vehicle electrification and hybridization and related general engineering areas.

2: An ability to apply the methodologies, skills, and modern science and engineering tools in vehicle electrification and hybridization engineering design, research, development, and applications.

Providing Department: Master of Science in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply the methodologies, skills, and modern science and engineering tools in vehicle electrification and hybridization engineering design, research, development, and applications.

3: An ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.

Providing Department: Master of Science in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.

4: An ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.

Providing Department: Master of Science in Electric-drive Vehicle Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to identify, analyze, and solve broadly-defined vehicle electrification and hybridization problems.
hybridization problems.

Engineering Technology Division

Bachelor of Science in Computer Technology

1SO1-a,b,f: Apply knowledge, skills and modern tools
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply knowledge, techniques, skills and modern tools of mathematics, science, engineering, and technology to solve broadly-defined engineering problems appropriate to the discipline;

2SO2-d: Design systems, components
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design systems, components, or processes meeting specific needs for broadly-defined engineering problems appropriate to the discipline.

3SO3-g: Written, oral communication
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply written, oral, and graphical communication in broadly-defined technical and non-technical environments; and an ability to identify and use appropriate.

GENa: an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities

---

**GENb:** an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies

- **Providing Department:** Bachelor of Science in Computer Technology
- **Start:** 9/1/2017
- **End:** 8/31/2018

**Learning Outcome Description**
an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies

---

**GENc:** an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes

- **Providing Department:** Bachelor of Science in Computer Technology
- **Start:** 9/1/2017
- **End:** 8/31/2018

**Learning Outcome Description**
an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes

---

**GENd:** an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives

- **Providing Department:** Bachelor of Science in Computer Technology
- **Start:** 9/1/2017
- **End:** 8/31/2018

**Learning Outcome Description**
an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives

---

**GENe:** an ability to function effectively as a member or leader on a technical team

- **Providing Department:** Bachelor of Science in Computer Technology
- **Start:** 9/1/2017
- **End:** 8/31/2018
Learning Outcome Description
an ability to function effectively as a member or leader on a technical team

GENf: an ability to identify, analyze, and solve broadly-defined engineering technology problems
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to identify, analyze, and solve broadly-defined engineering technology problems

GENg: an ability to communicate effectively regarding broadly-defined engineering technology activities
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to communicate effectively regarding broadly-defined engineering technology activities

GENh: an understanding of the need for and an ability to engage in self-directed continuing professional development
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of the need for and an ability to engage in self-directed continuing professional development

GENi: an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity
Providing Department: Bachelor of Science in Computer Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity
GENj: a knowledge of the impact of engineering technology solutions in a societal and global context

**Providing Department:** Bachelor of Science in Computer Technology
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
a knowledge of the impact of engineering technology solutions in a societal and global context

---

GENk: a commitment to quality, timeliness, and continuous improvement

**Providing Department:** Bachelor of Science in Computer Technology
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
a commitment to quality, timeliness, and continuous improvement

---

Bachelor of Science in Construction Management

1: Ability to recognize and resolve issues and problems arising in construction

**Providing Department:** Bachelor of Science in Construction Management
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Students will be able to demonstrate an ability to recognize and resolve issues and problems arising in construction

---

1S01-1-CMT: Problems arising in construction

**Providing Department:** Bachelor of Science in Construction Management
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Ability to recognize and resolve issues and problems arising in construction.
1SO1: Green Construction
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply knowledge, techniques, and skills in green construct

1SO1-2-CMT: Planning and coordination
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Knowledge and techniques for overall planning, coordination, and control of a project.

1SO1-3-CMT: Key components
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understanding of equipment key components and usage.

1SO1-4-CMT: Estimation
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Knowledge of advanced construction estimation quantities.

1SO1-5-CMT: Communicates
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicates effectively.
1SO2: Methods and material in construction

**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
An ability to apply methods and material in construction.

---

1SO3: Estimates

**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
An ability to implement quantity estimates in residential and commercial construction.

---

1SO4: Legal and environmental process

**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
An ability to understand the legal and environmental difficulties in the land development process.

---

2.a: Knowledge of and techniques for: a. Construction materials and building systems

**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to demonstrate a knowledge of and techniques for construction materials and building systems.

---

2.b: Knowledge of and techniques for: b. Estimating, scheduling, and project administration

**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to demonstrate knowledge of and techniques for estimating,
scheduling, and project administration

2.c: Knowledge of and techniques for: c. On-site safety programs and quality assurance
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for on-site safety programs and quality assurance

2.d: Knowledge of and techniques for: d. On-site material delivery, storage and handling
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for on-site material delivery, storage and handling

2.e: Knowledge of and techniques for: e. State-of-the-art construction equipment and methods
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for state-of-the-art construction equipment and methods

2.f: Knowledge of and techniques for: f. Mechanical and electrical components and systems
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for mechanical and electrical components and systems
2.g: Knowledge of and techniques for: g. Land development
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for land development

2.h: Knowledge of and techniques for: h. Green construction and sustainability
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a knowledge of and techniques for green construction and sustainability

2.i: Knowledge of and techniques for: i. Relevant standards and codes
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate knowledge of and techniques for relevant standards and codes

3: Understanding of contract law and ethical principles
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of contract law and ethical principles

4: Knowledge of advanced construction management software
Providing Department: Bachelor of Science in Construction Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
5: Communicate effectively  
**Providing Department:** Bachelor of Science in Construction Management  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Students will be able to demonstrate the ability to communicate effectively.

---

**Bachelor of Science in Electric Transportation Technology**  

**a:** an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined electrified and alternative energy vehicle activities.  

**Providing Department:** Bachelor of Science in Electric Transportation Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined electrified and alternative energy vehicle activities.

---

**b:** an ability to select and apply a knowledge of mathematics, science, engineering, and technology to vehicle electrification and alternative energy vehicle problems that require the application of principles and applied procedures or methodologies.  

**Providing Department:** Bachelor of Science in Electric Transportation Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
an ability to select and apply a knowledge of mathematics, science, engineering, and technology to vehicle electrification and alternative energy vehicle problems that require the application of principles and applied procedures or methodologies.

---

**d:** an ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.  

**Providing Department:** Bachelor of Science in Electric Transportation Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
an ability to design sub-systems, components, or processes for broadly-defined electric-
drive or alternative energy vehicle problems appropriate to program educational objectives.

f: an ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.  
Providing Department: Bachelor of Science in Electric Transportation Technology  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
an ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.

Bachelor of Science in Electrical/Electronic Engineering Technology

1SO1-a,b,f: Apply knowledge, skills and modern tools  
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
An ability to apply knowledge, techniques, skills and modern tools of mathematics, science, engineering, and technology to solve broadly-defined engineering problems appropriate to the discipline;

2SO2-d: Design systems, components  
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
An ability to design systems, components, or processes meeting specific needs for broadly-defined engineering problems appropriate to the discipline;

3SO3-g: Written, oral communication  
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology  
Start: 9/1/2017  
End: 8/31/2018
Learning Outcome Description
An ability to apply written, oral, and graphical communication in broadly-defined technical and non-technical environments; and an ability to identify and use appropriate technical literature;

4SO4-c: Conduct standard tests
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to conduct standard tests, measurements, and experiments and to analyze and interpret the results to improve processes;

5SO5-e: Team
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to function effectively as a member or leader on a technical team.

GENa: an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities,

GENb: an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies

GENc: an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes

GENd: an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives,

GENe: an ability to function effectively as a member or leader on a technical team,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to function effectively as a member or leader on a technical team

GENf: an ability to identify, analyze, and solve broadly-defined engineering technology problems,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
an ability to identify, analyze, and solve broadly-defined engineering technology problems

GENg: an ability to communicate effectively regarding broadly-defined engineering technology activities,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to communicate effectively regarding broadly-defined engineering technology activities

GENh: an understanding of the need for and an ability to engage in self-directed continuing professional development,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of the need for and an ability to engage in self-directed continuing professional development

GENi: an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity,
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity

GENj: a knowledge of the impact of engineering technology solutions in a societal and global context,
**Providing Department:** Bachelor of Science in Electrical/Electronic Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
a knowledge of the impact of engineering technology solutions in a societal and global context

**GENk: a commitment to quality, timeliness, and continuous improvement.**  
**Providing Department:** Bachelor of Science in Electrical/Electronic Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
a commitment to quality, timeliness, and continuous improvement

**ProgE1: the ability to analyze, design, and implement control systems, instrumentation systems, communications systems, computer systems, or power systems.**  
**Providing Department:** Bachelor of Science in Electrical/Electronic Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
the ability to analyze, design, and implement control systems, instrumentation systems, communications systems, computer systems, or power systems

**ProgE2: the ability to apply project management techniques to electrical/electronic(s) systems.**  
**Providing Department:** Bachelor of Science in Electrical/Electronic Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
the ability to apply project management techniques to electrical/electronic(s) systems

**ProgE3: the ability to utilize statistics/probability, transform methods, discrete mathematics, or applied differential equations in support of electrical/electronic(s) systems.**
Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
the ability to utilize statistics/probability, transform methods, discrete mathematics, or applied differential equations in support of electrical/electronic(s) systems.

ProgE4: the application of circuit analysis and design, computer programming, associated software, analog and digital electronics, and microcomputers, and engineering standards to the building, testing, operation, and maintenance of electrical/electronic(s) systems.

Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
the ability to utilize statistics/probability, transform methods, discrete mathematics, or applied differential equations in support of electrical/electronic(s) systems.

ProgE5: the applications of physics or chemistry to electrical/electronic(s) circuits in a rigorous mathematical environment at or above the level of algebra and trigonometry.

Providing Department: Bachelor of Science in Electrical/Electronic Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
the applications of physics or chemistry to electrical/electronic(s) circuits in a rigorous mathematical environment at or above the level of algebra and trigonometry.

Bachelor of Science in Electromechanical Engineering Technology

1SO1-a,b,f: Apply knowledge, skills and modern tools

Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
An ability to apply knowledge, techniques, skills and modern tools of mathematics, science, engineering, and technology to solve broadly-defined engineering problems appropriate to the discipline.

2SO2-d: Design systems, components
Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to design systems, components, or processes meeting specific needs for broadly-defined engineering problems appropriate to the discipline.

3SO3-g: Written, oral communication
Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply written, oral, and graphical communication in broadly-defined technical and non-technical environments; and an ability to identify and use appropriate technical literature.

GEN a: an ability to select and apply the knowledge, techniques, skills, and modern tools of the discipline to broadly-defined engineering technology activities;
Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to select and apply the knowledge, techniques, skills, and modern tools of the discipline to broadly-defined engineering technology activities;

GEN b: an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies;
Learning Outcome Description
Students will be able to demonstrate an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies;

GEN c: an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes;

Learning Outcome Description
Students will be able to demonstrate an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes;

GEN d: an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives;

Learning Outcome Description
Students will be able to demonstrate an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives;

GEN e: an ability to function effectively as a member or leader on a technical team;

Learning Outcome Description
Students will be able to demonstrate an ability to function effectively as a member or leader on a technical team;
GEN f: an ability to identify, analyze, and solve broadly-defined engineering technology problems;

Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to identify, analyze, and solve broadly-defined engineering technology problems;

GEN g: an ability to apply written, oral, and graphical communication in both technical and non-technical environments; and an ability to identify and use appropriate technical literature;

Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to apply written, oral, and graphical communication in both technical and non-technical environments; and an ability to identify and use appropriate technical literature;

GEN h: an understanding of the need for and an ability to engage in self-directed continuing professional development;

Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of the need for and an ability to engage in self-directed continuing professional development;

GEN i: an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity;

Providing Department: Bachelor of Science in Electromechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of and a commitment to address
professional and ethical responsibilities including a respect for diversity;

---

**GEN j: a knowledge of the impact of engineering technology solutions in a societal and global context;**

**Providing Department:** Bachelor of Science in Electromechanical Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to demonstrate a knowledge of the impact of engineering technology solutions in a societal and global context;

---

**GEN k: a commitment to quality, timeliness, and continuous improvement.**

**Providing Department:** Bachelor of Science in Electromechanical Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will be able to demonstrate a commitment to quality, timeliness, and continuous improvement.

---

Bachelor of Science in Mechanical Engineering Technology

**1SO1-a,b,f: Apply knowledge, skills and modern tools**

**Providing Department:** Bachelor of Science in Mechanical Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
An ability to apply knowledge, techniques, skills and modern tools of mathematics, science, engineering, and technology to solve broadly-defined engineering problems appropriate to the discipline.

---

**2SO2-d: Design systems, components**

**Providing Department:** Bachelor of Science in Mechanical Engineering Technology  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
An ability to design systems, components, or processes meeting specific needs for broadly-defined engineering problems appropriate to the discipline.

3SO3-g: Written, oral communication
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
An ability to apply written, oral, and graphical communication in broadly-defined technical and non-technical environments; and an ability to identify and use appropriate technical literature.

M1: MCT Design Track Students in this track will demonstrate the ability to apply principles of materials and mechanics to the design and analysis of mechanical components and mechanisms.
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students in the Design track will demonstrate the ability to apply principles of materials and mechanics to the design and analysis of mechanical components and mechanisms.

M2: MCT Energy Track Students in this track will demonstrate the ability to apply principles of thermo-fluid sciences to the design and analysis of energy systems.
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students in the Energy track will demonstrate the ability to apply principles of thermo-fluid sciences to the design and analysis of energy systems.

M3: MCT Manufacturing Track Students in this track will demonstrate the ability to apply principles of materials and production techniques to the planning, implementation, and control of manufacturing processes
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students in the Manufacturing track will demonstrate the ability to apply principles of materials and production techniques to the planning, implementation, and control of manufacturing processes

a: an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities,
   Providing Department: Bachelor of Science in Mechanical Engineering Technology
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined engineering technology activities

b: an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies,
   Providing Department: Bachelor of Science in Mechanical Engineering Technology
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
an ability to select and apply a knowledge of mathematics, science, engineering, and technology to engineering technology problems that require the application of principles and applied procedures or methodologies

c: an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes,
   Providing Department: Bachelor of Science in Mechanical Engineering Technology
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
an ability to conduct standard tests and measurements; to conduct, analyze, and interpret experiments; and to apply experimental results to improve processes

d: an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives,
   Providing Department: Bachelor of Science in Mechanical Engineering Technology
   Start: 9/1/2017
   End: 8/31/2018
Learning Outcome Description
an ability to design systems, components, or processes for broadly-defined engineering technology problems appropriate to program educational objectives

e: an ability to function effectively as a member or leader on a technical team,
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to function effectively as a member or leader on a technical team

f: an ability to identify, analyze, and solve broadly-defined engineering technology problems
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to identify, analyze, and solve broadly-defined engineering technology problems

g: an ability to apply written, oral, and graphical communication in both technical and non-technical environments; and an ability to identify and use appropriate technical literature
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to apply written, oral, and graphical communication in both technical and non-technical environments; and an ability to identify and use appropriate technical literature

h: an understanding of the need for and an ability to engage in self-directed continuing professional development,
Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of the need for and an ability to engage in self-directed continuing professional development
i: an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity

Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an understanding of and a commitment to address professional and ethical responsibilities including a respect for diversity

j: a knowledge of the impact of engineering technology solutions in a societal and global context

Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
a knowledge of the impact of engineering technology solutions in a societal and global context

k: a commitment to quality, timeliness, and continuous improvement

Providing Department: Bachelor of Science in Mechanical Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
a commitment to quality, timeliness, and continuous improvement

Master of Science in Engineering Technology

1: Upon graduation, MSET students shall possess the abilities to: formulate and solve advanced engineering problems

Providing Department: Master of Science in Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon graduation, MSET students shall possess the abilities to: formulate and solve advanced engineering problems
2: Upon graduation, MSET students shall possess the abilities to: apply knowledge and cutting edge technology in a specialized area of their discipline

Providing Department: Master of Science in Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon graduation, MSET students shall possess the abilities to: apply knowledge and cutting edge technology in a specialized area of their discipline

3: Upon graduation, MSET students shall possess the abilities to: design and conduct applied research project projects independently

Providing Department: Master of Science in Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
design and conduct applied research project projects independently

4: Upon graduation, MSET students shall possess the abilities to: demonstrate the understanding of the role, ethics and social responsibility of the profession in the society

Providing Department: Master of Science in Engineering Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon graduation, MSET students shall possess the abilities to: demonstrate the understanding of the role, ethics and social responsibility of the profession in the society

Undergraduate Certificate in Advanced Energy Storage Systems

a: an ability to select and apply the knowledge, techniques, skills, and modern tools of their disciplines to broadly-defined electrified and alternative energy vehicle activities.

Providing Department: Undergraduate Certificate in Advanced Energy Storage Systems
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
an ability to select and apply the knowledge, techniques, skills, and modern tools of their
disciplines to broadly-defined electrified and alternative energy vehicle activities.

- **b:** an ability to select and apply a knowledge of mathematics, science, engineering, and technology to vehicle electrification and alternative energy vehicle problems that require the application of principles and applied procedures or methodologies.
  
  **Providing Department:** Undergraduate Certificate in Advanced Energy Storage Systems  
  **Start:** 9/1/2017  
  **End:** 8/31/2018

  **Learning Outcome Description**  
  an ability to select and apply a knowledge of mathematics, science, engineering, and technology to vehicle electrification and alternative energy vehicle problems that require the application of principles and applied procedures or methodologies.

- **d:** an ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.
  
  **Providing Department:** Undergraduate Certificate in Advanced Energy Storage Systems  
  **Start:** 9/1/2017  
  **End:** 8/31/2018

  **Learning Outcome Description**  
  an ability to design sub-systems, components, or processes for broadly-defined electric-drive or alternative energy vehicle problems appropriate to program educational objectives.

- **f:** an ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.
  
  **Providing Department:** Undergraduate Certificate in Advanced Energy Storage Systems  
  **Start:** 9/1/2017  
  **End:** 8/31/2018

  **Learning Outcome Description**  
  an ability to identify, analyze, and solve broadly-defined electric-drive and alternative energy vehicle problems.

**Entrepreneurship Programs**

**EDGE Engineering Entrepreneur Certificate**
1: LO 1.0- Knowledge of Principles and Practices of Innovation in Product and New Venture Development
Providing Department: EDGE Engineering Entrepreneur Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to recognize the contribution of principles, methods, procedures and tools structured innovation in product development and new venture development.

2: LO 2.0- Knowledge of Principles and Practices of New Venture Development and Launch
Providing Department: EDGE Engineering Entrepreneur Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply the basic principles, methods, procedures and tools of new venture development and launch.

3: LO 3.0- Intellectual Property in Student and Sponsored Research
Providing Department: EDGE Engineering Entrepreneur Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn what their freedoms and limitations are with regard to Intellectual Property developed by a student, in different contexts - as a class project, as a WSU student assistant employee, as a GTA, as a GRA. Students will learn what interactions with faculty will limit their IP rights. Students will learn how to secure IP rights.

4: LO 4.0- Business Entity Models, Selection, and Allocation of Ownership
Providing Department: EDGE Engineering Entrepreneur Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn the alternative forms of legal entities for new ventures, the advantages and disadvantages of each, and the requirements for filing. Students will also learn models and methods for allocating ownership among founders, funders, and other parties involved in the start-up with a rigorous model analyzing roles and contributions.
Industrial and Systems Engineering

Bachelor of Science in Industrial Engineering

All: Student Outcomes: Prepare graduates to attain the program educational objectives.

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
See more at ABET site

(a) an ability to apply knowledge of mathematics, science, and engineering
(b) an ability to design and conduct experiments, as well as to analyze and interpret data
(c) an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability
(d) an ability to function on multidisciplinary teams
(e) an ability to identify, formulate, and solve engineering problems
(f) an understanding of professional and ethical responsibility
(g) an ability to communicate effectively
(h) the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context
(i) a recognition of the need for, and an ability to engage in life-long learning (j) a knowledge of contemporary issues
(k) an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice

---
a: ABET (a) An ability to apply knowledge of mathematics, science, and engineering

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to apply knowledge of mathematics, science, and engineering.
b: ABET (b) An ability to design and conduct experiments, as well as to analyze and interpret data

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design and conduct experiments, as well as to analyze and interpret data

c: ABET (c) An ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

d: ABET (d) An ability to function on multidisciplinary teams

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to function on multidisciplinary teams

e: ABET (e) An ability to identify, formulate, and solve engineering problems

Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to identify, formulate, and solve engineering problems
f: ABET (f) An understanding of professional and ethical responsibility
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of professional and ethical responsibility.

---

g: ABET (g) An ability to communicate effectively
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to communicate effectively.

---

h: ABET (h) The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context.

---

i: ABET (i) A recognition of the need for, and an ability to engage in life-long learning
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate a recognition of the need for, and an ability to engage in life-long learning.

---

j: ABET (j) A knowledge of contemporary issues
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will be able to demonstrate a knowledge of contemporary issues

k: ABET (k) An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.
Providing Department: Bachelor of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

Doctor of Philosophy in Industrial Engineering

1: Learning Outcomes - Knowledge and Scholarship
Providing Department: Doctor of Philosophy in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Knowledge and Scholarship
The student will be able to identify and conduct original research, scholarship, or creative endeavors.

2: Learning Outcomes - Analytical Thinking and Problem Solving
Providing Department: Doctor of Philosophy in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Analytical Thinking and Problem Solving
Students will be able to think analytically, creatively, and solve problems in Industrial Engineering and in industry.
3: Learning Outcomes - Communication
Providing Department: Doctor of Philosophy in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Communication

The student will be able to effectively communicate and lead in Industrial Engineering.

4: Learning Outcomes - Ethical Conduct
Providing Department: Doctor of Philosophy in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Ethical Conduct

Students will be able to conduct research in an ethical and responsible manner and have a basic understanding of their ethical responsibilities as future Industrial Engineers and industry leaders.

5: Learning Outcomes - Professional Development
Providing Department: Doctor of Philosophy in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Professional Development

Students will be able to demonstrate attributes of professional development consistent with expectations within Industrial Engineering and within their industry.

Graduate Certificate in Systems Engineering

1: SE Graduate Certificate LO1 - Scholarship
Providing Department: Graduate Certificate in Systems Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Outcome 1: Scholarship

Develop the ability to use computers to simulate, design, test and build automated systems, manage cost in the product development cycle and also control and monitor quality during production.

2: SE Graduate Certificate LO2 - Mastery
Providing Department: Graduate Certificate in Systems Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Mastery of Subject Material

The student will be able to think critically and creatively to address technical problems in the fields of Engineering Management.

3: SE Graduate Certificate LO3 - Communication
Providing Department: Graduate Certificate in Systems Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Communication

The student will be able to synthesize and explain the relevance and application of new, advanced technical knowledge in both technical and non-technical terms.

4: SE Graduate Certificate LO4 - Ethics
Providing Department: Graduate Certificate in Systems Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Ethical Conduct

Student will be educated in ethical and responsible conduct in research and professional activities.

Master of Science in Engineering Management
1: Knowledge & Scholarship
Providing Department: Master of Science in Engineering Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Knowledge and Scholarship
The student will be able to identify and conduct original research, scholarship, or creative endeavors in the field of Engineering Management.

2: Analytical Thinking and Problem Solving
Providing Department: Master of Science in Engineering Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Analytical Thinking and Problem Solving
Students will be able to think analytically, creatively, and solve problems in the field and industry of Engineering Management.

3: Communication
Providing Department: Master of Science in Engineering Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Communication
The student will be able to effectively communicate and lead in the field of Engineering Management.

4: Ethical Conduct
Providing Department: Master of Science in Engineering Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Ethical Conduct
Students will be able to conduct research in an ethical and responsible manner and have a basic understanding of their ethical responsibilities as future engineers and industry leaders.
5: Professional Development
Providing Department: Master of Science in Engineering Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Professional Development

Students will be able to demonstrate attributes of professional development consistent with expectations within the field of Engineering Management and within industry.

Master of Science in Industrial Engineering

1: Knowledge & Scholarship (LO1)
Providing Department: Master of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Knowledge and Scholarship

Understand and apply the principles and tools of industrial engineering to optimize systems and processes involving industry-relevant problems.

2: Mastery of Subject Material (LO2)
Providing Department: Master of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Mastery of Subject Material

The student will be able to think critically and creatively to address technical problems in the fields spanned by Industrial & Systems Engineering.

3: Communication (LO3)
Providing Department: Master of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Outcome 3: Communication

The student will be able to synthesize and explain the relevance and application of new, advanced technical knowledge in both technical and non-technical terms.

4: Ethical Conduct (LO4)
Providing Department: Master of Science in Industrial Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Ethical Conduct

Student will be educated in ethical and responsible conduct in research and professional activities.

Master of Science in Manufacturing Engineering

1: Knowledge & Scholarship (LO1)
Providing Department: Master of Science in Manufacturing Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Knowledge and Scholarship

Develop the ability to use computers to simulate, design, test and build automated systems, manage cost in the product development cycle and also control and monitor quality during production.

2: Mastery of Subject Material (LO2)
Providing Department: Master of Science in Manufacturing Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Mastery of Subject Material

The student will be able to think critically and creatively to address technical problems in the field of Manufacturing Engineering.
3: Communication (LO3)

Providing Department: Master of Science in Manufacturing Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Communication

The student will be able to synthesize and explain the relevance and application of new, advanced technical knowledge in both technical and non-technical terms.

4: Ethical Conduct (LO4)

Providing Department: Master of Science in Manufacturing Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Ethical Conduct

Student will be educated in ethical and responsible conduct in research and professional activities in the field of Manufacturing Engineering.

Mechanical Engineering

Bachelor of Science in Mechanical Engineering

a: an ability to apply knowledge of mathematics, science, and engineering

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to apply knowledge of mathematics, science, and engineering

b: an ability to design and conduct experiments, as well as to analyze and interpret data

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design and conduct experiments, as well as to analyze and interpret data
c: an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability

d: an ability to function on multidisciplinary teams

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to function on multidisciplinary teams

e: an ability to identify, formulate, and solve engineering problems

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an ability to identify, formulate, and solve engineering problems

f: an understanding of professional and ethical responsibility

Providing Department: Bachelor of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate an understanding of professional and ethical responsibility
g: an ability to communicate effectively

Learning Outcome Description
Students will be able to demonstrate an ability to communicate effectively

h: the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context

Learning Outcome Description
Students will be able to demonstrate the broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context

i: a recognition of the need for, and an ability to engage in life-long learning

Learning Outcome Description
Students will be able to demonstrate a recognition of the need for, and an ability to engage in life-long learning

j: a knowledge of contemporary issues

Learning Outcome Description
Students will be able to demonstrate a knowledge of contemporary issues

k: an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.
Learning Outcome Description
Students will be able to demonstrate an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

Doctor of Philosophy in Mechanical Engineering

a: Contribute to the advancement of scientific and engineering knowledge.
Providing Department: Doctor of Philosophy in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to contribute to the advancement of scientific and engineering knowledge.

b: Demonstrate mastery of advanced principles pertaining to the selected research path of the Ph.D. candidate.
Providing Department: Doctor of Philosophy in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate mastery of advanced principles pertaining to the selected research path of the Ph.D. candidate.

c: Ability to conduct independent research work in mechanical engineering and related fields
Providing Department: Doctor of Philosophy in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have the ability to conduct independent research work in mechanical engineering and related fields.

d: Ability to identify and tackle unresolved issues pertaining to emerging mechanical engineering problems.
Providing Department: Doctor of Philosophy in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have the ability to identify and tackle unresolved issues pertaining to
emerging mechanical engineering problems.

Master of Science in Mechanical Engineering

a: Apply knowledge of mathematics, science, and engineering to identify, formulate and solve mechanical engineering problems.

Providing Department: Master of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply knowledge of mathematics, science, and engineering to identify, formulate and solve mechanical engineering problems.

b: Apply engineering principles to tackle open-ended mechanical engineering problems.

Providing Department: Master of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply engineering principles to tackle open-ended mechanical engineering problems.

c: Use techniques, skills, and modern engineering tools necessary for mechanical engineering practice.

Providing Department: Master of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to use techniques, skills, and modern engineering tools necessary for mechanical engineering practice.

d: Engage in lifelong learning.

Providing Department: Master of Science in Mechanical Engineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to seek out knowledge on their own and become self-learners.
Nanoengineering

UG Certificate in Nanoengineering

1.0: scale down engineering
Providing Department: UG Certificate in Nanoengineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students link more familiar bulk materials and phenomena with less familiar nanoscale phenomena.

2.0: nano utilization
Providing Department: UG Certificate in Nanoengineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students utilize engineered materials, processes, and devices at the nanoscale.

3.0: nano synthesis
Providing Department: UG Certificate in Nanoengineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students synthesize nanoparticles.

4: Nano research
Providing Department: UG Certificate in Nanoengineering
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students present their research according to the norms of the field.
#1: Communication: BA in Communication Studies Learning Outcome #1

Providing Department: BA in Communication Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Engage in Communication scholarship using the research traditions of the discipline.

Sources:
NCA Learning Outcomes Document
(http://www.natcom.org/uploadedFiles/Teaching_and_Learning/1%20What%20Should%20a%20Graduate%20Have%20This%20Year.pdf)

Blooms Revised Taxonomy (http://www.celt.iastate.edu/teaching/effective-teaching-practices/taxonomy) See Table 1

#2: Communication: BA in Communication Studies Learning Outcome #2

Providing Department: BA in Communication Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Critically analyze messages.

Sources:
NCA Learning Outcomes Document
(http://www.natcom.org/uploadedFiles/Teaching_and_Learning/1%20What%20Should%20a%20Graduate%20Have%20This%20Year.pdf)

Blooms Revised Taxonomy (http://www.celt.iastate.edu/teaching/effective-teaching-practices/taxonomy) See Table 1)
#3: Communication: BA in Communication Studies Learning Outcome #3
Providing Department: BA in Communication Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Create written texts in a manner appropriately adapted to the topic, audience, occasion, and

Sources:

NCA Learning Outcomes Document (http://www.natcom.org/uploadedFiles/Teaching_and_Learning/1%20What%20Should%20a%20Graduate%20With%20a%20Communication%20Degree.pdf)

Blooms Revised Taxonomy (http://www.celt.iastate.edu/teaching/effective-teaching-practices_taxonomy See Table 1)

---

#4: Communication: BA in Communication Studies Learning Outcome #4
Providing Department: BA in Communication Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Produce presentations in a manner appropriately adapted to the topic, audience, occasion, and

Sources:

NCA Learning Outcomes Document (http://www.natcom.org/uploadedFiles/Teaching_and_Learning/1%20What%20Should%20a%20Graduate%20With%20a%20Communication%20Degree.pdf)

Blooms Revised Taxonomy (http://www.celt.iastate.edu/teaching/effective-teaching-practices_taxonomy See Table 1)
#5: Communication: BA in Communication Studies Learning Outcome #5
**Providing Department:** BA in Communication Studies
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Apply communication theory across multiple contexts.

**Sources:**
- NCA Learning Outcomes Document  
- Blooms Revised Taxonomy  
  [http://www.celt.iastate.edu/teaching/effective-teaching-practices/revised-taxonomy](http://www.celt.iastate.edu/teaching/effective-teaching-practices/revised-taxonomy)  
  See Table 1

---

**BA in Film**

#1: Communication: BA in Film Learning Outcome #1
**Providing Department:** BA in Film  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students should be able to demonstrate knowledge of film history.

---

#2: Communication: BA in Film Learning Outcome #2
**Providing Department:** BA in Film  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students should be able to apply film and media theory to the analysis and production of cinematic works and other media content.
#3: Communication: BA in Film Learning Outcome #3
Providing Department: BA in Film
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students should be able to tell engaging stories in a variety of genres and modes.

#4: Communication: BA in Film Learning Outcome #4
Providing Department: BA in Film
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students should be able to shoot and edit effective narratives.

#5: Communication: BA in Film Learning Outcome #5
Providing Department: BA in Film
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students should be able to manage the resources and logistics inherent in producing film.

BA in Journalism

#1: Communication: BA in Journalism Learning Outcome #1
Providing Department: BA in Journalism
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Gather information through a variety of techniques used in the field using different media platforms.
#2: Communication: BA in Journalism Learning Outcome #2
Providing Department: BA in Journalism
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Present information in accurate, concise, and grammatically correct written ways through different media.

#3: Communication: BA in Journalism Learning Outcome #3
Providing Department: BA in Journalism
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use the profession's accepted "best practices" in both gathering and presenting the news.

#4: Communication: BA in Journalism Learning Outcome #4
Providing Department: BA in Journalism
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Show an awareness through an Exit Interview that the profession is continuing and will continue to evolve, both in terms of ever-changing technology and in the structure of the workplace.

#5: Communication: BA in Journalism Learning Outcome #5
Providing Department: BA in Journalism
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Make informed assessments as to the quality of information gathered using critical thinking skills

BA in Media Arts and Studies

#1: Communication: BA in Media Arts and Studies Learning Outcome #1
Providing Department: BA in Media Arts and Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students should be able to demonstrate knowledge of media history.

#2: Communication: BA in Media Arts and Studies Learning Outcome #2
Providing Department: BA in Media Arts and Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students should be able to apply media theory to the analysis and production of media content.

#3: Communication: BA in Media Arts and Studies Learning Outcome #3
Providing Department: BA in Media Arts and Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students should be able to successfully process information from various sources through research, evaluation and synthesis.

#4: Communication: BA in Media Arts and Studies Learning Outcome #4
Providing Department: BA in Media Arts and Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students should be able to communicate effectively in various forms of media (e.g. print, film, digital media)

#5: Communication: BA in Media Arts and Studies Learning Outcome #5
Providing Department: BA in Media Arts and Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students should be able to produce creative and innovative media content.
BA in Public Relations

#1: Communication: BA in Public Relations Learning Outcome #1
Providing Department: BA in Public Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Public relations majors should have an understanding of how the history of public relations has influenced the development of ethical codes of conduct in the practice of public relations.

#2: Communication: BA in Public Relations Learning Outcome #2
Providing Department: BA in Public Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Public relations majors should be able to use research methods and tools to develop public relations strategies.

#3: Communication: BA in Public Relations Learning Outcome #3
Providing Department: BA in Public Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Public relations majors should be able to use communication theories in the practice of public relations.

#4: Communication: BA in Public Relations Learning Outcome #4
Providing Department: BA in Public Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Public relations majors should be able to prepare appropriate communication materials for use in all media (print and digital).
#5: Communication: BA in Public Relations Learning Outcome #5

**Providing Department:** BA in Public Relations  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Public relations majors should understand all the management functions of public relations.

---

Graduate Certificate in Communication and New Media

**1: Communication: Graduate Certificate in Communication and New Media Learning Outcome #1**

**Providing Department:** Graduate Certificate in Communication and New Media  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Evaluate communication theory and research relevant to the chosen certificate.

---

**2: Communication: Graduate Certificate in Communication and New Media Learning Outcome #2**

**Providing Department:** Graduate Certificate in Communication and New Media  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Apply communication theory and research to analyze communication practices relevant to the chosen certificate.

---

**3: Communication: Graduate Certificate in Communication and New Media Learning Outcome #3**

**Providing Department:** Graduate Certificate in Communication and New Media  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Produce scholarly or creative work as relevant to the chosen concentration.

4: Communication: Graduate Certificate in Communication and New Media learning
Outcome #4
Providing Department: Graduate Certificate in Communication and New Media
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Adhere to professional guidelines for work in the profession.

Graduate Certificate in Dispute Resolution

#1: Communication: GC in Dispute Resolution LO #1 (Cultural Frameworks)
Providing Department: Graduate Certificate in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to identify relevant cultural frameworks when working with social conflict situations.

#2: Communication: GC in Dispute Resolution LO #2 (Negotiation Skills)
Providing Department: Graduate Certificate in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to negotiate effectively drawing upon their knowledge of negotiation theory and best practice.

#3: Communication: GC in Dispute Resolution LO #3 (DR Strategy Options)
Providing Department: Graduate Certificate in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to recommend an appropriate conflict engagement strategy when given a dispute fact pattern.
#4: Communication: GC in Dispute Resolution LO #4 (Articulate Possible Conflict Engagement Roles)

**Providing Department:** Graduate Certificate in Dispute Resolution  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students are able to articulate roles for conflict engagement specialists in the organizations and communities they are part of, cognizant of current methods, opportunities and constraints in the field.

---

**Graduate Certificate in Health Communication**

1: Communication: Graduate Certificate in Health Communication Learning Outcome #1

**Providing Department:** Graduate Certificate in Health Communication  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Evaluate communication theory and research relevant to the chosen certificate.

---

2: Communication: Graduate Certificate in Health Communication Learning Outcome #2

**Providing Department:** Graduate Certificate in Health Communication  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Apply communication theory and research to analyze communication practices relevant to the chosen certificate.

---

3: Communication: Graduate Certificate in Health Communication Learning Outcome #3

**Providing Department:** Graduate Certificate in Health Communication  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Produce scholarly or creative work as relevant to the chosen concentration.
4: Communication: Graduate Certificate in Health Communication Learning Outcome #4

Providing Department: Graduate Certificate in Health Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Adhere to ethical guidelines for work in the profession.

MA in Communication

1: Communication: MA in Communication Learning Outcome #1

Providing Department: MA in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Evaluate communication theory and research in the chosen concentration.

2: Communication: MA in Communication Learning Outcome #2

Providing Department: MA in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply communication theory and research to analyze communication practices relevant to the chosen concentration.

3: Communication: MA in Communication Learning Outcome #3

Providing Department: MA in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce scholarly or creative work as relevant to the chosen concentration.
Learning Outcome Description
Present one's own and other's scholarly or creative work in a public setting.

Learning Outcome Description
Adhere to professional guidelines for work in the profession.

MA in Dispute Resolution

#1: Communication: MA in Dispute Resolution LO #1 (Cultural Frameworks)
Providing Department: MA in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to apply relevant cultural frameworks when working with social conflict situations.

#2: Communication: MA in Dispute Resolution LO #2 (Negotiation Skills)
Providing Department: MA in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to negotiate effectively drawing upon their knowledge of negotiation theory and best practice.

#3: Communication: MA in Dispute Resolution LO #3 (Conflict Situation Assessment)
Providing Department: MA in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students are able to conduct appropriate analyses of a given situation when recommending conflict engagement strategies.

#4: Communication: MA in Dispute Resolution LO #4 (Ability to Mediate)
Providing Department: MA in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to mediate interpersonal or group conflicts using best practice approaches.

#5: Communication: MA in Dispute Resolution LO #5 (Articulate Professional Identity in Field)
Providing Department: MA in Dispute Resolution
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to articulate their own professional identity as a conflict engagement specialist, cognizant of current methods, opportunities and constraints in the field.

Ph.D. in Communication

1: Communication: PhD in Communication Learning Outcome #1
Providing Department: Ph.D. in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Review literature in the communication field to identify new research questions.

2: Communication: PhD in Communication Learning Outcome #2
Providing Department: Ph.D. in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Conduct a study using appropriate methodology to answer a research question.
3: Communication: PhD in Communication Learning Outcome #3
Providing Department: Ph.D. in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate one's own and other's research in a public setting.

4: Communication: PhD in Communication Learning Outcome #4
Providing Department: Ph.D. in Communication
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Adhere to ethical guidelines for work in the discipline.

Department of Music

BA in Music

1: BA Learning Outcome 1
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop proficiency with and accuracy of musical elements, control of his or her instrument with musical intent, and the ability to be expressive.

2: BA Learning Outcome 2
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply analytical tools to fundamental music theory analysis of standard repertoire.
3: BA Learning Outcome 3
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
identify musical intervals, rhythms, and pitches aurally.

4: BA Learning Outcome 4
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Interpret and critique historical Western musical styles, American vernacular styles, and the music of World Cultures.

5: BA Learning Outcome 5
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate functional keyboard skills.

6: BA Learning Outcome 6
Providing Department: BA in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Examine music within the context of Liberal Arts.

BMus in Music

1: BM Learning Outcome 1
Providing Department: BMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop proficiency with and accuracy of musical elements, control of his or her
instrument with musical intent, and the ability to be expressive.

2: BM Learning Outcome 2
Providing Department: BMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply analytical tools to fundamental music theory analysis of standard repertoire.

3: BM Learning Outcome 3
Providing Department: BMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
identify musical intervals, rhythms, and pitches aurally.

4: BM Learning Outcome 4
Providing Department: BMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Interpret and critique historical Western musical styles, American vernacular styles, and the music of World Cultures.

5: BM Learning Outcome 5
Providing Department: BMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Interprets historical Western musical styles, American vernacular styles and the music of World Cultures.
1: GC in Orchestral Studies, Learning Outcome 1
Providing Department: Graduate Certificate in Orchestral Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Interpret the style, genre, and context of a varied repertoire of music informs performance as well as performers’ technical skill to connect with the audience.

2: GC in Orchestral Studies, Learning Outcome 2
Providing Department: Graduate Certificate in Orchestral Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Perform audition skills of a varied repertoire representing diverse cultures, styles, genres, and historical periods.

3: GC in Orchestral Studies, Learning Outcome 3
Providing Department: Graduate Certificate in Orchestral Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Exhibit mastery of the technical demands and expressive qualities of the music on primary orchestral instrument.

4: GC Orchestral Certificate Learning Outcome 4
Providing Department: Graduate Certificate in Orchestral Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop and apply appropriate rehearsal strategies to address individual and ensemble challenges in a varied repertoire of music.
<table>
<thead>
<tr>
<th>Learning Outcome</th>
<th>Providing Department</th>
<th>Start</th>
<th>End</th>
<th>Learning Outcome Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: MA Learning Outcome 1</td>
<td>MA in Music</td>
<td>9/1/2017</td>
<td>8/31/2018</td>
<td>Describe and synthesize scholarly peer-reviewed journal articles through an oral presentation.</td>
</tr>
<tr>
<td>2: MA Learning Outcome 2</td>
<td>MA in Music</td>
<td>9/1/2017</td>
<td>8/31/2018</td>
<td>Develop a research paper utilizing a variety of appropriate print and electronic sources which are cited appropriately.</td>
</tr>
<tr>
<td>3: MA Learning Outcome 3</td>
<td>MA in Music</td>
<td>9/1/2017</td>
<td>8/31/2018</td>
<td>Present significant original research with appropriate format and documentation.</td>
</tr>
</tbody>
</table>

MMus in Music

<table>
<thead>
<tr>
<th>Learning Outcome</th>
<th>Providing Department</th>
<th>Start</th>
<th>End</th>
<th>Learning Outcome Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: MM Learning Outcome 1</td>
<td>MMus in Music</td>
<td>9/1/2017</td>
<td>8/31/2018</td>
<td></td>
</tr>
</tbody>
</table>
Learning Outcome Description
describe and synthesize a scholarly peer-reviewed journal articles through at oral presentation.

2: MM Learning Outcome 2
Providing Department: MMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Present significant original creative activity with appropriate format and documentation

3: MM Learning Outcome 3
Providing Department: MMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop a research paper utilizing a variety of appropriate print and electronic sources which are cited approp

4: MM Learning Outcome 4
Providing Department: MMus in Music
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply analytical tools to Music Theory Analysis of standard repertoire

James Pearson Duffy Department of Art and Art History

1: All Student Learning Outcomes in the Department
Providing Department: James Pearson Duffy Department of Art and Art History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcomes for All Degrees in the Department of Art and Art History
List of Degrees: BA-Art; BA-Art History; BA-Design and Merchandising; BFA-Art; BS-Design and Merchandising; MA-Art; MA-Art History; MA-Design and Merchandising; MFA - Art

BA – Art

Learning Outcome 1: Base of knowledge

Demonstrate an effective knowledge of the essential materials and techniques appropriate to a variety of art and design applications.

Learning Outcome 2: Understanding

Demonstrate an effective knowledge of the historical, contemporary, and emergent practices appropriate to a variety of art and design applications.

Learning Outcome 3: Critical thinking

Demonstrate the ability to reflect on and articulate the effective application of materials, techniques, concepts and practices appropriate to artistic work.

Learning Outcome 4: Synthesis

Produce several art/design works that effectively integrate media, techniques, subject matter, and critical awareness to express a coherent intent.
BA – Art History

Learning Outcome 1: Base of Knowledge

Demonstrate an effective knowledge of art historical vocabulary; recognize basic techniques and materials used in making art; know major movements, monuments, artists, and styles.

Learning Outcome 2: Understanding

Analyze specific works of art and architecture in relationship to a variety of interpretive methods.

Learning Outcome 3: Critical Thinking

Demonstrate analytical skills in interpreting works of art both as formal structures and in relation to social and cultural contexts.

Learning Outcome 4: Synthesis

Research a topic and establish a thesis by synthesizing sources in a clearly organized and persuasive essay.

BA – Design and Merchandising

Learning Outcome 1: Base of Knowledge

Demonstrate an essential knowledge of the styles, materials, principles and practices of the design
and production of apparel and merchandising of products.

**Learning Outcome 2: Understanding**

Develop an understanding of styles, creative designs, diverse construction methods, and merchandising practices in relation to individual, societal, cultural, commercial and global environments.

**Learning Outcome 3: Critical Thinking**

Demonstrate analytical and creative skills in producing conceptual and marketable designs, and applying merchandising concepts and strategies for effective positive outcomes in a variety of contexts.

**Learning Outcome 4: Synthesis**

Demonstrate the ability to research, produce a fashion collection and/or research study by synthesizing sources, methods and practices in a clear and cohesive essay and presentation.

**BFA – Art**

**Learning Outcome 1: Base of knowledge**

Demonstrate an effective knowledge of the essential materials and techniques appropriate to the selected area of concentration.

**Learning Outcome 2: Understanding**
Demonstrate an effective knowledge of the historical, contemporary, and emergent practices appropriate to the selected area of concentration.

**Learning Outcome 3: Critical thinking**

Demonstrate the ability to reflect on and articulate the effective application of materials, techniques, concepts and practices appropriate to artistic work produced in the selected area of concentration.

**Learning Outcome 4: Synthesis**

Produce a body of work that effectively integrates media, techniques, subject matter, and critical awareness to express a coherent intent.

**BS – Design and Merchandising**

**Learning Outcome 1: Base of Knowledge**

Demonstrate an essential knowledge of the styles, materials, principles and practices of the design and production of apparel and merchandising of products.

**Learning Outcome 2: Understanding**

Develop an understanding of styles, creative designs, diverse construction methods, and merchandising practices in relation to individual, societal, cultural, commercial and global environments.

**Learning Outcome 3: Critical Thinking**

Demonstrate analytical and creative skills in producing conceptual and marketable designs, and applying merchandising concepts and strategies for effective positive outcomes in a variety of
Learning Outcome 4: Synthesis

Demonstrate the ability to research, produce a fashion collection and/or research study by synthesizing sources, methods and practices in a clear and cohesive essay and presentation.

MA – Art History

Learning Outcome 1: Base of Knowledge

Demonstrate an advanced knowledge of art historical concepts and issues and in-depth knowledge of select areas of inquiry.

Learning Outcome 2: Understanding

Demonstrate an advanced ability to analyze specific works of art and architecture in relationship to a variety of interpretive methods.

Learning Outcome 3: Critical Thinking

Demonstrate mastery of analytical skills in interpreting works of art both as formal structures and in relation to social and cultural contexts.

Learning Outcome 4: Synthesis

Establish a thesis about a research topic and substantiate the position with evidence and by synthesizing sources; present the position in a clearly organized and persuasive essay.
MA – Art

Learning Outcome 1: Base of Knowledge

Demonstrate thorough knowledge of the materials and techniques appropriate to the selected area of concentration.

Learning Outcome 2: Understanding

Demonstrate an advanced understanding of the historical, contemporary and emergent practices appropriate to the selected area of concentration.

Learning Outcome 3: Critical Thinking

Demonstrate the ability to analyze and interpret artistic practices and critical theses in relation to social and cultural context.

Learning Outcome 4: Synthesis

Produce and exhibit a body of art that synthesizes media and techniques, subject matters and critical awareness that reflects a coherent intent.

MA – Design and Merchandising

Learning Outcome 1: Base Knowledge

Demonstrate an advanced knowledge of the materials, principles and practices of the design and production of apparel and/or merchandising of products.
Learning Outcome 2: Understanding

Demonstrate an advanced understanding of creative design, diverse construction methods, and/or merchandising practices in relation to individual, societal, cultural, commercial and/or global environments.

Learning Outcome 3: Critical Thinking

Demonstrate mastery of analytical and creative skills in producing conceptual and marketable apparel designs and/or applying merchandising concepts and strategies for effective positive outcomes in a variety of contexts.

Learning Outcome 4: Synthesis

Define a research topic, research the background and produce a fashion collection or research study by synthesizing sources, methods and practices in a scholarly professional essay and presentation.

MFA – Art

Learning Outcome 1: Base of Knowledge

Demonstrate thorough knowledge of the materials and techniques appropriate to the selected area of concentration.

Learning Outcome 2: Understanding

Demonstrate an advanced understanding of the historical, contemporary and emergent practices appropriate to the selected area of concentration.

Learning Outcome 3: Critical Thinking
Demonstrate the ability to analyze and interpret artistic practices and critical theses in relation to a social and cultural context.

Learning Outcome 4: Synthesis

Produce and exhibit a body of art that synthesizes media and techniques, subject matters and critical awareness that reflects a coherent intent.

BA in Art

1: Base of Knowledge - SLO 1
Providing Department: BA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an effective knowledge of essential materials and techniques appropriate to a variety of art and design applications.

2: Understanding - SLO2
Providing Department: BA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an effective knowledge of the historical, contemporary, and emergent practices appropriate to a variety of art and design applications.

3: Critical Thinking - SLO3
Providing Department: BA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate the ability to reflect on and articulate the effective application of materials, techniques, concepts, and practices appropriate to artistic work.
4: Synthesis - SLO4  
Providing Department: BA in Art  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Produce several art/design works that effectively integrate media, techniques, subject matter, and critical awareness to express a coherent intent.

BA in Art History  

1: Base of Knowledge - SLO1  
Providing Department: BA in Art History  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Demonstrate an effective knowledge of art historical vocabulary; recognize basic techniques and materials used in making art; know major movements, monuments, artists, and styles.

2: Understanding - SLO2  
Providing Department: BA in Art History  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Analyze specific works of art and architecture in relationship to a variety of interpretive methods.

3: Critical Thinking - SLO3  
Providing Department: BA in Art History  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Demonstrate analytical skills in interpreting works of art both as formal structures and in relation to social and cultural contexts.
4: Synthesis - SLO4
Providing Department: BA in Art History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Research a topic and establish a thesis by synthesizing sources in a clearly organized and persuasive essay.

BA in Fashion Design and Merchandising

1: Base of Knowledge - SLO1
Providing Department: BA in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 1: Base of Knowledge

Demonstrate an essential knowledge of the styles, materials, principles and practices of the design and production of apparel and merchandising of products.

2: Understanding - SLO2
Providing Department: BA in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Understanding

Develop an understanding of styles, creative designs, diverse construction methods, and merchandising practices in relation to individual, societal, cultural, commercial and global environments.

3: Critical Thinking
Providing Department: BA in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Critical Thinking
Demonstrate analytical and creative skills in producing conceptual and marketable designs, and applying merchandising concepts and strategies for effective positive outcomes in a variety of contexts.

4: Synthesis
Providing Department: BA in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Synthesis

Demonstrate the ability to research, produce a fashion collection and/or research study by synthesizing sources, methods and practices in a clear and cohesive essay and presentation.

BFA in Art

1: Base of Knowledge - SLO1
Providing Department: BFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 1: Base of knowledge

Demonstrate an effective knowledge of the essential materials and techniques appropriate to the selected area of concentration.

2: Understanding - SLO2
Providing Department: BFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Understanding

Demonstrate an effective knowledge of the historical, contemporary, and emergent practices appropriate to the selected area of concentration.

---

3: Critical Thinking - SLO 3
Providing Department: BFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Critical thinking

Demonstrate the ability to reflect on and articulate the effective application of materials, techniques, concepts and practices appropriate to artistic work produced in the selected area of concentration.

---

4: Synthesis - SLO4
Providing Department: BFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Synthesis

Produce a body of work that effectively integrates media, techniques, subject matter, and critical awareness to express a coherent intent.

---

BFA in Design

BFA in Design - SLO1: Base of Knowledge
Providing Department: BFA in Design
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce designs that effectively use essential design tools: concepts, formal design principles/structures, and skills.
BFA in Design - SLO2: Understanding
Providing Department: BFA in Design
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Incorporate historical and contemporary practices into the design process.

BFA in Design - SLO3: Critical Thinking
Providing Department: BFA in Design
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Articulate the relationship between form, content, and social/cultural contexts that have impacted the choice of essential design tools.

BFA in Design - SLO4: Synthesis
Providing Department: BFA in Design
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Create designs that synthesize a variety of conceptual approaches, processes, technical knowledge, and research methods in response to complex situations and scenarios.

BS in Fashion Design and Merchandising

1: Base of Knowledge - SLO1
Providing Department: BS in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 1: Base of Knowledge

Demonstrate an essential knowledge of the styles, materials, principles and practices of the design and production of apparel and merchandising of products.
2: Understanding - SLO2

Providing Department: BS in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Understanding

Develop an understanding of styles, creative designs, diverse construction methods, and merchandising practices in relation to individual, societal, cultural, commercial and global environments.

3: Critical Thinking - SLO3

Providing Department: BS in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Critical Thinking

Demonstrate analytical and creative skills in producing conceptual and marketable designs, and applying merchandising concepts and strategies for effective positive outcomes in a variety of contexts.

4: Synthesis - SLO4

Providing Department: BS in Fashion Design and Merchandising
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Synthesis

Demonstrate the ability to research, produce a fashion collection and/or research study by synthesizing sources, methods and practices in a clear and cohesive essay and presentation.
MA in Art

1: Base of Knowledge - SLO1

Providing Department: MA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 1: Base of Knowledge

Demonstrate thorough knowledge of the materials and techniques appropriate to the selected area of concentration.

2: Understanding - SLO2

Providing Department: MA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Understanding

Demonstrate an advanced understanding of the historical, contemporary and emergent practices appropriate to the selected area of concentration.

3: Critical Thinking - SLO3

Providing Department: MA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Critical Thinking

Demonstrate the ability to analyze and interpret artistic practices and critical theses in relation to social and cultural context.
4: Synthesis - SLO4  
**Providing Department:** MA in Art  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Learning Outcome 4: Synthesis

Produce and exhibit a body of art that synthesizes media and techniques, subject matters and critical awareness that reflects a coherent intent.

---

MA in Art History

1: Base of Knowledge - SLO1  
**Providing Department:** MA in Art History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Learning Outcome 1: Base of Knowledge

Demonstrate an advanced knowledge of art historical concepts and issues and in-depth knowledge of select areas of inquiry.

---

2: Understanding - SLO2  
**Providing Department:** MA in Art History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Learning Outcome 2: Understanding

Demonstrate an advanced ability to analyze specific works of art and architecture in relationship to a variety of interpretive methods.

---

3: Critical Thinking - SLO3  
**Providing Department:** MA in Art History  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Learning Outcome 3: Critical Thinking

Demonstrate mastery of analytical skills in interpreting works of art both as formal structures and in relation to social and cultural contexts.

4: Synthesis - SLO4
Providing Department: MA in Art History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Synthesis

Establish a thesis about a research topic and substantiate the position with evidence and by synthesizing sources; present the position in a clearly organized and persuasive essay.

MFA in Art

1: Base of Knowledge - SLO1
Providing Department: MFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 1: Base of Knowledge

Demonstrate thorough knowledge of the materials and techniques appropriate to the selected area of concentration.

2: Understanding - SLO2
Providing Department: MFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Understanding
Demonstrate an advanced understanding of the historical, contemporary and emergent practices appropriate to the selected area of concentration.

3: Critical Thinking - SLO3
Providing Department: MFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Critical Thinking

Demonstrate the ability to analyze and interpret artistic practices and critical theses in relation to a social and cultural context.

4: Synthesis - SLO4
Providing Department: MFA in Art
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Synthesis

Produce and exhibit a body of art that synthesizes media and techniques, subject matters and critical awareness that reflects a coherent intent.

Maggie Allesee Department of Theatre and Dance
BA in Theatre

3: Knowledge of the Profession
Providing Department: BA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of the fundamental organizational, managerial and
entrepreneurial concepts and practices associated with the theatre profession.

4: Translational Knowledge
Providing Department: BA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate comprehension of how theatre arts knowledge, skills and practices can be translated into various professional settings.

Learning Outcome #1: Conceptual and Critical Thinking
Providing Department: BA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates demonstrate the ability to think conceptually and critically about text, performance and production.

Learning Outcome #2: Performance and Production Competency
Providing Department: BA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates demonstrate the ability to achieve intermediate to advanced competence in creation, performance or scholarship in the areas of acting, design/technology, applied theatre and scholarly aspects of theatre.

BFA in Dance

1: BFA in Dance: Proficiency in Modern Dance Technique
Providing Department: BFA in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates demonstrate proficiency in the technical and expressive aspects of modern dance.

2: BFA in Dance: Competence in Ballet Technique

Providing Department: BFA in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students perform at the Department’s Intermediate to Advanced level of Ballet Technique

3: Kinesiology

Providing Department: BFA in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate a fundamental knowledge of the body and kinesiology as applicable to work in dance and related professions.

Students complete somatic studies in dance kinesiology (DNC 3180) and Pilates mat (DNC 5110). Components of dance science, somatics, therapy, and body systems and approaches are included in DNC 1810 and DNC 4910.

4: Knowledge of the Profession

Providing Department: BFA in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of the fundamental organizational, managerial and entrepreneurial concepts and practices associated with the dance profession.

BFA in Theatre
1: BFA in Theatre - Acting: Personal and Ensemble Acting Skills
Providing Department: BFA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate personal & ensemble acting skills needed for creative rehearsals and for artistic performances.

2: BFA in Theatre - Acting: Ability to Create Characters
Providing Department: BFA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate ability to create characters from different styles, periods, and genres.

3: BFA in Theatre - Acting: Speech and Voice Development
Providing Department: BFA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate clear, articulate, and expressive speech; and a flexible, strong and controlled voice.

4: BFA in Theatre - Acting: Body Control and Stage Movement Skills
Providing Department: BFA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate a flexible, relaxed, and controlled body trained in basic stage movement disciplines.

5: BFA in Theatre - Acting: Comprehension of Business Procedures
Providing Department: BFA in Theatre
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate comprehension of the basic business procedures of the actor’s profession.
1: BS in Dance: Knowledge and Skills as Competent Dancers  
Providing Department: BS in Dance  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Demonstrate knowledge and skills as competent dancers consistent with the objectives of the liberal arts degree program.  

Students complete a minimum of 12 semesters of modern dance, ballet, and jazz dance supplemented by electives in other dance styles: pointe, African 2, hip-hop. Students must successfully complete at least two semesters of technique at the 3000-level (proficiency). Proficiency is further demonstrated through successful auditions for faculty and guest repertory works and dance companies. Graduates are proficient in at least one dance style, supplemented by competency in other dance styles.

2: BS in Dance: Ability to Identify and Work Conceptually  
Providing Department: BS in Dance  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Graduates demonstrate the ability to identify and work conceptually with the elements of dance in diverse contexts.  

Students complete the required BS core curriculum of five courses (DNC 1810, DNC 3810, DNC 4910, DNC 5910, and DNC 5998) including an internship and capstone course in the senior year.

3: BS in Dance: Understanding of Processes, Properties and Values  
Providing Department: BS in Dance  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Demonstrate understanding of choreographic processes, aesthetic properties, production values and the ways these shape artistic, social and cultural ideas.  

DNC 2000, DNC 2310, DNC 2400, DNC 2460, and DNC 2500 each include aspects of choreographic processes and aesthetics; DNC 1330, DNC 2410, and DNC 3310 include components of production.
4: BS in Dance: Familiarity with Repertory, Eras, Genres and Practices
Providing Department: BS in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop familiarity with a wide range of repertory, principal eras, genres, and cultural and community practices in dance.

Students complete a minimum of two performance courses earned through participation in dance companies (DNC 5610), touring (DNC 5000), and repertory (DNC 5800). Study of eras, genres and practices is included in DNC 2000, DNC 2310, DNC 3810, and DNC 4910.

5: BS in Dance: Ability to Develop and Defend Critical Evaluations
Providing Department: BS in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate the ability to develop and defend critical evaluations.

The University General Education program requires that students must successfully complete writing assignments that demonstrate an ability to communicate effectively with specialized or professional audiences. This is formally accomplished under the Writing Intensive Course (DNC 5993) and honed through analytical discussion, writing assignments, and critique in other required dance courses (DNC 1810, DNC 2000, DNC 2310, DNC 3310, DNC 3810, DNC 4910, and DNC 5910).

6: BS in Dance: Fundamental Knowledge of the Body and Kinesiology
Providing Department: BS in Dance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate a fundamental knowledge of the body and kinesiology as applicable to work in dance and related professions.

Students complete somatic studies in dance kinesiology (DNC 3180) and Pilates mat (DNC 5110). Components of dance science, somatics, therapy, and body systems and approaches are included in DNC 1810 and DNC 4910.
1: Leadership
Providing Department: MA in Arts Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate awareness of a wide range of techniques of leadership in approaches to arts administration.

2: Management Skills
Providing Department: MA in Arts Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate awareness of a wide range of management skills to be utilized in arts administration contexts.

3: Innovation and Creativity
Providing Department: MA in Arts Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate awareness of a wide range of techniques to promote processes of innovation and creativity in the context of arts administration.

4: Networks
Providing Department: MA in Arts Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate awareness of a wide range of networks and sources of support to draw from in arts administration contexts.
1: Research Methods
Providing Department: MA in Theatre and Dance (AY2015-2016)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate competency in a range of research methods over the course of
the degree program, culminating in a thesis or essay project in which one or more
research methods are appropriately and effectively utilized.

2: Pedagogical Foundations
Providing Department: MA in Theatre and Dance (AY2015-2016)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate knowledge of pedagogical foundations of teaching artistry and
can articulate, document and analyze how their personal practice as a teaching artist is
informed by one or more educational philosophies.

3: Praxis
Providing Department: MA in Theatre and Dance (AY2015-2016)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can effectively document their practice, organize and analyze documentation,
reflect on their practice in relation to the documentation and implement changes or
modifications to their practice based on this reflection.

4: Professional Practice
Providing Department: MA in Theatre and Dance (AY2015-2016)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of the fundamental organizational, managerial and
entrepreneurial concepts and practices associated with the teaching artist profession.
1: MFA in Theatre - Acting: Personal & Ensemble Acting Skills
   Providing Department: MFA in Theatre
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate personal & ensemble acting skills needed for creative rehearsals and for artistic performances in a repertory season.

2: MFA in Theatre - Acting: Ability to Create Characters
   Providing Department: MFA in Theatre
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate knowledge of and ability to create characters from different styles, periods, and genres.

3: MFA in Theatre - Acting: Speech and Voice Development
   Providing Department: MFA in Theatre
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate clear, articulate, and expressive speech; and a flexible, strong and dynamic voice.

4: MFA in Theatre - Acting: Body Control and Stage Movement Skills
   Providing Department: MFA in Theatre
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate a flexible, relaxed, and controlled body trained in intermediate and advanced stage movement disciplines.

5: MFA in Theatre - Acting: Comprehension of Business Procedures
   Providing Department: MFA in Theatre
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate comprehension of the business procedures of the actor’s profession.
African and African American Studies

BA in African American Studies

1: Learning Outcome 1
Providing Department: BA in African American Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify, discuss, and evaluate selected Black leaders, organizations, and social movements.

2: Learning Outcome 2
Providing Department: BA in African American Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify, discuss, and evaluate selected concepts integral to African American Studies.

3: Learning Outcome 3
Providing Department: BA in African American Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify, discuss, and evaluate selected Black writers, filmmakers, artists, and cultural figures.

4: Learning Outcome 4
Providing Department: BA in African American Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate research skills, integrate their own ideas with those of others, apply the conventions and of attribution and citation correctly, formulate a thesis related to a specific topic, and support the thesis with evidence and argumentation.
Anthropology

BA in Anthropology

1: Cultivating Anthropological Knowledge
Providing Department: BA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Anthropology majors will form an understanding of the four disciplinary sub-fields and will apply this understanding to specialized knowledge of theories, disciplinary history, and key concepts within these sub-fields.

2: Methods and Skill Building
Providing Department: BA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Anthropology majors will demonstrate fluency in anthropological methods, critical thinking, and analysis.

3: Engagement and Practice
Providing Department: BA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Anthropology majors will apply knowledge, skills, and perspectives gained inside the classroom to the local and global community outside the classroom.

4: Oral and Written Communication
Providing Department: BA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Anthropology majors will demonstrate fluency in oral and written communication.
5: Teamwork  
**Providing Department:** BA in Anthropology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Anthropology majors will demonstrate their ability to engage in teamwork.

---

**MA in Anthropology**

1: MA Outcome 1: Theories and Concepts  
**Providing Department:** MA in Anthropology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Demonstrate advanced written knowledge of key theories and concepts in the major subfields of anthropology, including the history of the discipline.

---

2: MA Outcome 2: Methods  
**Providing Department:** MA in Anthropology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Exhibit high proficiency with the core methods of their subfield(s).

---

3: MA Outcome 3: Specific Area Mastery  
**Providing Department:** MA in Anthropology  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Demonstrate written mastery of a specific area of study through intensive study and/or original research.

---

4: MA Outcome 4: Conferences  
**Providing Department:** MA in Anthropology  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Present scholarly material at an academic conference.

5: MA Outcome 5: Teaching
Providing Department: MA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Teach introductory anthropology across its multiple subdisciplines.

6: MA Outcome 6: Practicing Anthropology
Providing Department: MA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Practice anthropology in non-academic settings in a particular area of the discipline.

7: MA Outcome 7: Ethics
Providing Department: MA in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of ethical practices when conducting research with human subjects research, engaging with community stakeholders, and presenting academic scholarship.

PhD in Anthropology

1: PhD Outcome 1: Theories and Concepts
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate advanced written knowledge of key theories and concepts in the major subfields of anthropology, including the history of the discipline.
2: PhD Outcome 2: Topic Mastery
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate written and oral mastery of a specific area of study through intensive study and qualifying exams.

3: PhD Outcome 3: Original Research
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Design and put into practice a well-designed original research project that addresses major theoretical issues in a particular area of anthropology.

4: PhD Outcome 4: Ethics
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of ethical practices when conducting research with human subjects research, engaging with community stakeholders, and presenting academic scholarship.

5: PhD Outcome 5: Publication
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce peer-reviewed journal articles and book chapters in anthropology and/or relevant allied disciplines.

6: PhD Outcome 6: Conferences
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Present scholarly material at peer-reviewed conferences in anthropology and/or in relevant allied disciplines.

7: PhD Outcome 7: Teaching
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Teach general anthropology across its multiple subdisciplines, as well as upper-division courses in a particular subfield.

8: PhD Outcome 8: Practicing Anthropology
Providing Department: PhD in Anthropology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Exhibit practical knowledge and skills appropriate for non-academic career opportunities in their subfield.

Biological Sciences

BA in Biological Sciences

01: Adequate progress
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to progress through the curriculum and graduate in four to six years and move on to employment or advanced study in an area related to the biological sciences.

02: Core Concept 1 - Evolution
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Core Concept 1 - Students should be able to demonstrate an understanding of the core concept of **evolution**.

---

**03: Core Concept 2 - Structure and Function**
**Providing Department:** BA in Biological Sciences  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Core Concept 2 - Students should be able to demonstrate an understanding of the core concept of **biological structure and function**.

---

**04: Core Concept 3 - Information**
**Providing Department:** BA in Biological Sciences  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Core Concept 3 - Students should be able to demonstrate an understanding of the core concept of **information flow, exchange and storage**.

---

**05: Core Concept 4 - Energy**
**Providing Department:** BA in Biological Sciences  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Core Concept 4 - Students should be able to demonstrate an understanding of the core concept of **pathways and transformations of energy and matter**.

---

**06: Core Concept 5 - Systems**
**Providing Department:** BA in Biological Sciences  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Core Concept 5 - Students should be able to demonstrate an understanding of the core concept of **biological systems**.
07: Core Competency 1 - Process of Science
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 1 - Students should have the **ability to apply the process of science**.

08: Core Competency 2 - Quantitative Reasoning
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 2 - Students should be **able to use quantitative reasoning**.

09: Core Competency 3 - Modeling and Simulation
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 3 - Students should be able to **use modeling and simulation**.

10: Core Competency 4 - Science is Interdisciplinary
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 4 - Students should be able to **tap into the interdisciplinary nature of science**.

11: Core Competency 5 - Communication and Collaboration
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 5 - Students should be able to **communicate and collaborate with other disciplines**.
12: Core Competency 6 - Science and Society
Providing Department: BA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 6 - Students should understand the relationship between science and society.

BS in Biological Sciences

01: Adequate progress
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to progress through the curriculum and graduate in four to six years and move on to employment or advanced study in an area related to the biological sciences.

02: Core Concept 1 - Evolution
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Concept 1 - Students should be able to demonstrate an understanding of the core concept of evolution.

03: Core Concept 2 - Structure and Function
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Concept 2 - Students should be able to demonstrate an understanding of the core concept of biological structure and function.
04: Core Concept 3 - Information  
Providing Department: BS in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Core Concept 3 - Students should be able to demonstrate an understanding of the core concept of information flow, exchange and storage.

05: Core Concept 4 - Energy  
Providing Department: BS in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Core Concept 4 - Students should be able to demonstrate an understanding of the core concept of pathways and transformations of energy and matter.

06: Core Concept 5 - Systems  
Providing Department: BS in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Core Concept 5 - Students should be able to demonstrate an understanding of the core concept of biological systems.

07: Competency 1 - Process of Science  
Providing Department: BS in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Core Competency 1 - Students should have the ability to apply the process of science.

08: Core Competency 2 - Quantitative Reasoning  
Providing Department: BS in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Core Competency 2 - Students should be able to use quantitative reasoning.
09: Core Competency 3 - Modeling and Simulation
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 3 - Students should be able to use modeling and simulation.

10: Core Competency 4 - Science is Interdisciplinary
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 4 - Students should be able to tap into the interdisciplinary nature of science.

11: Core Competency 5 - Communication and Collaboration
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 5 - Students should be able to communicate and collaborate with other disciplines.

12: Core Competency 6 - Science and Society
Providing Department: BS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Core Competency 6 - Students should understand the relationship between science and society.
1: Learning Outcomes-1
Providing Department: MA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who are presently in educational fields will attain knowledge and understanding of current advances in biological theory and practice to bring back to their classrooms to enrich their curricula.

2: Learning outcomes-2
Providing Department: MA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who are interested in progressing into health professional field will enhance their professional resumés and improve their preparedness for future coursework in their preferred programs by demonstrating knowledge and success in graduate-level coursework dealing with advances in cellular, molecular, developmental, and neuro-biology.

3: Learning outcomes-3
Providing Department: MA in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who are interested in administrative or sales careers in biotechnology industries will attain an intricate understanding of molecular biology techniques that can aid them in sales, scientific writing, and patent law.

MS in Biological Sciences

1: Learning outcome-1
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
- Students will demonstrate a strong understanding of current state of knowledge in their chosen fields.

2: Learning outcomes-2
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will be proficient in general experimental design for experiments in their fields.

3: Learning outcomes-3
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will demonstrate independence in the execution and trouble-shooting of experimental programs.

4: Learning outcomes-4
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will learn to keep current with published literature to identify significant gaps in the current arena of knowledge in their specific disciplines.

5: Learning outcomes-5
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will propose testable hypotheses and will develop novel experimental designs to test those hypotheses.
6: Learning outcomes 6
Providing Department: MS in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will present research work in written and oral forms as is common and appropriate for their fields of research.

MS in Molecular Biotechnology

1: Learning outcome-1
Providing Department: MS in Molecular Biotechnology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will attain a strong understanding of the structure and functional aspects of prokaryotic and eukaryotic systems and processes that are utilized in RNA, DNA, and protein biotechnologies.

2: Learning outcome-2
Providing Department: MS in Molecular Biotechnology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will be proficient in general experimental design for experiments in molecular and cellular biology laboratories.

3: Learning outcome-3
Providing Department: MS in Molecular Biotechnology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will become proficient in the execution and trouble-shooting of experimental programs.
4: Learning outcome-4  
Providing Department: MS in Molecular Biotechnology  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- Students will have the skills to seek out, understand, and implement new techniques as they are developed.

5: Learning outcome-5  
Providing Department: MS in Molecular Biotechnology  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- Students will present research work in written and oral forms as is common and appropriate for their fields of research.

PhD in Biological Sciences  
1: Learning outcome-1  
Providing Department: PhD in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- Students will demonstrate a strong understanding of current state of knowledge in their chosen fields.

2: Learning outcome-2  
Providing Department: PhD in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- Students will be proficient in general experimental design for experiments in their fields.
3: Learning outcome-3

Providing Department: PhD in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will demonstrate independence in the execution and trouble-shooting of experimental programs.

4: Learning outcome-4

Providing Department: PhD in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will learn to keep current with published literature to identify significant gaps in the current arena of knowledge in their specific disciplines.

5: Learning outcome-5

Providing Department: PhD in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will propose testable hypotheses and will develop novel experimental designs to test those hypotheses.

6: Learning outcome-6

Providing Department: PhD in Biological Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will present research work in written and oral forms as is common and appropriate for their fields of research.
7: Learning outcome-7  
Providing Department: PhD in Biological Sciences  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
- Students will become independent researchers in Biological Sciences.

Chemistry  
BA in Chemistry  

1.: Coursework  
Providing Department: BA in Chemistry  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
1. Graduates will show competence in the five areas of chemistry (organic, inorganic, analytical, physical and biological) by passing the final exam in each course. Each area will be assessed individually  
   a. One semester general chemistry (CHM 1220)  
   b. Full year of organic chemistry (CHM 1240, 2220)  
   c. Analytical chemistry (CHM 2280)  
   d. Biochemistry, one semester (CHM 5600)  
   e. Survey of Physical Chemistry (CHM 5400)  
   f. Inorganic Chemistry (CHM 3020)  
   g. One advanced elective in any area

2.: Oral Communication  
Providing Department: BA in Chemistry  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will use prior knowledge and problem solving skills to create effective oral presentations in Chemistry. The oral presentation is required in the Physical Chemistry lab course (CHM 5550).
3: Written Communication
  Providing Department: BA in Chemistry
  Start: 9/1/2017
  End: 8/31/2018

Learning Outcome Description
Students will use prior knowledge and problem solving skills to create professional written reports in Chemistry. This will occur in the Physical Chemistry Lab course, CHM 5550

4: Laboratory Problem Solving
  Providing Department: BA in Chemistry
  Start: 9/1/2017
  End: 8/31/2018

Learning Outcome Description
Students will develop problem solving skills in laboratory applications.

BS in Chemistry

1.: Written Communication
  Providing Department: BS in Chemistry
  Start: 9/1/2017
  End: 8/31/2018

Learning Outcome Description
Students will use prior knowledge, the chemical literature and problem solving skills to create professional written reports in Chemistry.

2. : Students will show competence in the five traditional areas of Chemistry via the capstone course of Advanced Inorganic Chemistry with a Physical Chemistry Pre-requisite
  Providing Department: BS in Chemistry
  Start: 9/1/2017
  End: 8/31/2018

Learning Outcome Description
Graduates will show competence in the five areas of chemistry (organic, inorganic,
analytical, physical and biological). Each area will be assessed individually
   a. One semester general chemistry (CHM 1220)
   b. Full year of organic chemistry (CHM 1240, 2220)
   c. Analytical chemistry (CHM 2280, 5160)
   d. Biochemistry, one semester (CHM 5600)
   e. Comprehensive Physical Chemistry (CHM 5420, 5440)
   f. Inorganic Chemistry (CHM 3020, 5020*)

i. *CHM 5020 is our senior capstone course, with physical chemistry pre-requisite.

---

**3.: Independent Research**

*Providing Department: BS in Chemistry*

*Start: 9/1/2017*

*End: 8/31/2018*

**Learning Outcome Description**

Students will use advanced laboratory skills and problem solving to carry out independent undergraduate research.

---

**4: Oral Communication**

*Providing Department: BS in Chemistry*

*Start: 9/1/2017*

*End: 8/31/2018*

**Learning Outcome Description**

Students will use prior knowledge, the chemical literature and problem solving skills to create professional oral presentations in Chemistry.

---

**BS with a major in Biochemistry and Chemical Biology**

**1.: Coursework**

*Providing Department: BS with a major in Biochemistry and Chemical Biology*

*Start: 9/1/2017*

*End: 8/31/2018*

**Learning Outcome Description**

Graduates will show competence in the five areas of chemistry (biological, organic, inorganic, analytical and physical).
2.: Research
Providing Department: BS with a major in Biochemistry and Chemical Biology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop the analytical and problem solving skills necessary to carry out independent research.

3.: Applications
Providing Department: BS with a major in Biochemistry and Chemical Biology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn the applications of chemical concepts and technologies to biological problems.

4.: Sub-speciality
Providing Department: BS with a major in Biochemistry and Chemical Biology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop in depth understanding of one the four specialized areas: bioorganic, bioinorganic, bioanalytical and biophysical chemistry.

BS with a major in Chemistry and a concentration in Biochemistry

1.: ACS Certification
Providing Department: BS with a major in Chemistry and a concentration in Biochemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates will earn degrees certified by the Committee on Professional Training of the American Chemical Society.
2. Coursework

Providing Department: BS with a major in Chemistry and a concentration in Biochemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

1. Graduates will show competence in the five areas of chemistry (organic, inorganic, analytical, physical and biological) with additional emphasis placed on Biochemistry. Each area will be assessed individually
   a. One semester general chemistry (CHM 1220)
   b. Full year of organic chemistry (CHM 1240, 2220)
   c. Analytical chemistry (CHM 2280, 5160)
   d. Biochemistry, two semesters with laboratory (CHM 6610, 6620, 6640)
   e. Biological Physical Chemistry (CHM 5400)
   f. Inorganic Chemistry (CHM 3020, 5020*)

   i. *CHM 5020 is our senior capstone course, with physical chemistry pre-requisite.

3. Research

Providing Department: BS with a major in Chemistry and a concentration in Biochemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Graduates will have experience in independent undergraduate research.

4. Written and Oral Communication

Providing Department: BS with a major in Chemistry and a concentration in Biochemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students will create professional oral presentations and written reports in Chemistry.
MA in Chemistry

1.: Goal 1
Providing Department: MA in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate advanced proficiency in diverse areas of chemical knowledge

2.: Goal 2
Providing Department: MA in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Effectively search primary and secondary chemical literature

3.: Goal 3
Providing Department: MA in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply chemical problem solving skills to day-to-day situations

4.: Goal 4
Providing Department: MA in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Effectively communicate with diverse audiences regarding chemical subjects
1.: Goal 1
Providing Department: MS in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop advanced proficiency in diverse areas of chemical knowledge

2. : Goal 2
Providing Department: MS in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Familiarity with and the ability to understand the primary and secondary chemical literature

3.: Goal 3
Providing Department: MS in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply chemical problem solving skills to day-to-day situations

4.: Goal 4
Providing Department: MS in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Effectively communicate with diverse audiences regarding chemical subjects

5.: Goal 5
Providing Department: MS in Chemistry
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Knowledge of a specific research problem in their field and a measurable contribution to the creation of new chemical knowledge based on original experimental data collection.

PhD in Chemistry

1.: Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop advanced proficiency in diverse areas of chemical knowledge and deep mastery of a sub-discipline based largely on advanced secondary chemical literature that is necessary to form a foundation for critically evaluating primary chemical literature.

2.: Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate proficiency in the teaching of chemistry to help perpetuate the discipline in the form of supervising students and leading discussions.

3. : Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Effectively use the primary chemical literature to advance personal understanding of chemistry and to put this knowledge into context such that the limits of current knowledge can be effectively assessed.

4. : Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Learn to identify important societal problems that chemical knowledge can help to address and then tackle those problems through original research

5. Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To add to the body of chemical knowledge through original research

6. Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Effectively communicate using multiple modalities (written manuscripts, poster presentations, orally, using electronic media, etc) with diverse audiences regarding chemical subjects

7. Learning Outcome
Providing Department: PhD in Chemistry
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate participation in a culture of safety and responsible conduct of research necessary to be responsible stewards of the chemistry discipline.

Classical and Modern Languages, Literatures, and Cultures

B.A. Asian Studies
1.0: BA Asian Studies Learning Outcome 1
Providing Department: B.A. Asian Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Following the ACTFL proficiency guidelines, our majors should reach an intermediate high level and minors an intermediate low level in all the four language skills in Chinese and/or Japanese languages.

2.0: BA; Asian Studies Learning Outcome 2
Providing Department: B.A. Asian Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Interpret the translated literary texts from China and Japan, and East Asia in general, within the socio-historical and cultural contexts and in a comparative method.

3.0: BA: Asian Studies Learning Outcome 3
Providing Department: B.A. Asian Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to appreciate and recognize the values of translated literature works from China and Japan, as well as East Asia in general, from the critical thinking skills they have learned from our curriculum.

4.0: BA: Asian Studies Learning Outcome 4
Providing Department: B.A. Asian Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to identify major cultural differences and similarities between American culture and East Asian culture and they should be able to critique East Asian culture-related phenomena in today's global society.

4.1: Improve students' cultural awareness of JPN and CHI
Providing Department: BA Asian Studies
Start: 9/1/2017
End: 8/30/2019
Learning Outcome Description
We want to strengthen the focus of our graduates. In the past, student paid more attention to completing the credits, but now we want to see them with their own focus either in Chi or Jpn.

B.A. Classics

1.0: BA Classics Learning Outcome 1
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, undergraduate students will demonstrate reading comprehension of either Latin or Ancient Greek.

2.0: BA Classics Learning Outcome 2
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, undergraduate students will demonstrate translation skills in either Latin or Ancient Greek.

3.0: BA Classics Learning Outcome 3
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate an understanding of the history of the Ancient World.

4.0: BA Classics Learning Outcome 4
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate an understanding of...
Greek and/or Roman philosophy.

5.0: BA Classics Learning Outcome 5
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate an understanding of Greek and Roman material culture.

6.0: BA Classics Learning Outcome 6
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate an understanding of Greek and Roman literature.

7.0: BA Classics Learning Outcome 7
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate the practical skills needed to conduct research in Classics.

8.0: BA Classics Learning Outcome 8
Providing Department: B.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, Classics Majors will demonstrate the ability to present their research in written format.
1.0: BA German, LO1 Writing

Providing Department: B.A. German
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who receive a BA have completed a writing intensive research project, consisting of multiple stages and two drafts, that demonstrates their ability to:

* formulate and support a thesis in extended and well organized formal written discourse
* discern between primary secondary academic sources and assess and integrate information from those sources them into their own arguments
* produce written German at the advanced ACTFL level or the B2-C1 level of the CEFR

2: BA German, LO2 Presentational Speaking

Providing Department: B.A. German
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who receive a BA in German will demonstrate the ability to deliver an organized presentation, prepared in multiple stages, that is appropriate to the audience about course-related academic or professional topics. In so doing, they will demonstrate a clear understanding of the differences between effective oral and written presentations. Their presentations will effectively summarize and analyze materials for a listening audience and make effective use of visual aids and technology. They will demonstrate the attainment of presentational speaking skills German at the advanced ACTFL level or the B2-C1 level of the CEFR.

3: BA German, LO 3 Interpersonal Communication

Providing Department: B.A. German
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students receiving a BA in German with an average of B or better in the upper-level German courses (4000 and above) will be able to engage in interpersonal communication the Advanced Mid to Advanced High level according to ACTFL standards. This means that they can express themselves fully and largely fluently, with ease and mostly with lexical, syntactic and intercultural accuracy not only on familiar and concrete topics but also on most unfamiliar and complex issues within the realm of German cultural studies. Students can develop hypotheses, express opinions and develop arguments to support them. They can communicate in this manner both in one-on-one and group settings, such as discussions.
4: BA german, LO 4 Analysis of Primary and Secondary Sources
Providing Department: B.A. German
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students receiving a BA in German with an average of B or better in the upper-level German courses (4000 and above) will be able to comprehend and analyze a wide range of authentic German sources. Their skills of reading and listening comprehension will be at the Advanced Mid to Advanced High level of the ACTFL scale. Primary sources include everyday discourse, such as newspapers, radio and television programs, literary texts published between the 18th and the 21st century, documentary and feature films released between the early 20th century and the present. Secondary sources include academic writing, both analyses of literary and filmic narratives and theory in literary, linguistic and cultural studies. In their analysis of primary sources students can analyze the narratives with regard to specific themes and topics. In their analysis of secondary sources, students can understand and summarize the thesis and argument. They can also incorporate appropriate ideas from secondary sources into their own analyses of primary sources, both in written (essay) and oral (presentation) format.

B.A. Global Studies

LO1: LO1: Language Competency
Providing Department: B.A. Global Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: Language Competency. Students must demonstrate intermediate-level competency in one language or basic-level competency in two languages.

LO2: LO2: Intersections in Global Issues
Providing Department: B.A. Global Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to demonstrate how global issues intersect with the individual and the social with respect to gender, sexuality, class, race, and/or ethnicity.
Providing Department: B.A. Global Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to analyze the processes of globalization from economic, political, environmental, historical, and cultural perspectives and how these processes impact social structures and people’s everyday lives.

LO4: LO4: Global and Local
Providing Department: B.A. Global Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to discuss globalization and global issues as they relate to the local, the regional (as it relates to regional issues within nation states), and the national.

B.A. Near Eastern Languages

LO1: LO1: ADVANCED WRITTEN COMMUNICATION
Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Write texts on different topics using the styles and genres appropriate for the purpose of writing (e.g. letters, articles, narratives, etc.)

LO2: LO2: ADVANCED ORAL COMMUNICATION
Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop conversational skills to discuss topics of interest using a variety of language functions (e.g. clarification, description, comparison, reasoning, argumentation, supporting ideas with the appropriate evidence, etc.)
LO3: CRITICAL ANALYSIS AND INTERPRETATION

Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Critically analyze information/concepts related to a subject area (e.g., linguistic principles, narrative style, regional cultures, literary and cultural history)

LO4: GRAMMAR

Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Recognize and use correct word, sentence and text level grammar in writing

LO5: ADVANCED READING SKILLS

Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Employ analytical reading and critical thinking skills to understand different types of texts

LO6: Culture Awareness

Providing Department: B.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate awareness of cultural issues, such as ethnic, cultural, religious and linguistic plurality of the target language; and discuss different aspects of the target language culture.
1.0: BA NES LO1: Assessing Causal Relationships in NE Region
Providing Department: B.A. Near Eastern Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assess, discern and determine causal relationships in mapping social, historical, political economic and cultural processes in the Near East region.

2.0: BA NES LO2: Historical Developments, Contemporary Contexts
Providing Department: B.A. Near Eastern Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Compare and contrast historical and sociological developments to contemporary contexts of Near East issues.

3.0: BA NES LO3: Develop Social History Research Skills
Providing Department: B.A. Near Eastern Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop social history research skills through oral history and interview techniques, and construct narratives relevant to Near East region and communities.

4.0: BA NES LO4: Personal Narrative Methodology
Providing Department: B.A. Near Eastern Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assess the role of personal narrative as a methodological device in Near East history and culture.

5.0: BA NES LO5: Analyze Scholarly Literature
Providing Department: B.A. Near Eastern Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze relevant scholarly literature (i.e. secondary source material) in students' areas of
6.0: BA NES LO6: Analyze Philosophical Source Material  
Providing Department: B.A. Near Eastern Studies  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Analyze source material of Western and Near East philosophical and ideological traditions and their relevance to contemporary social, political and historical debates.

B.A. Romance Languages

1.0: BA Romance Languages_LO1_Oral Proficiency  
Providing Department: B.A. Romance Languages  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO1: Students will be able to communicate orally at an advanced-intermediate level.

2.0: BA Romance Languages_LO2_Academic Writing  
Providing Department: B.A. Romance Languages  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO2: Students will be able to write in the target language at an advanced-intermediate level.

3.0: BA Romance Languages_LO3_Literary Competency  
Providing Department: B.A. Romance Languages  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO3: Students will be able to discuss major cultural or literary trends of the target language.
4.0: BA Romance Languages_LO4_Critical Thinking
Providing Department: B.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO4: Students will be able to analyze linguistic, cultural, or literary content from multiple perspectives.

5.0: BA Romance Languages_LO5_Research Skills_Bibliography
Providing Department: B.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO5: Students will be able to create a bibliography comprised of academic sources.

6.0: BA Romance Languages_LO6_Research Skills_Argument
Providing Department: B.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO6: Students will be able to apply knowledge from academic sources to support an argument.

B.A. Slavic Studies

1: Acquisition of Essentials of Polish Cultural Competency
Providing Department: B.A. Slavic Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Version:1.0 StartHTML:0000000105 EndHTML:0000004935 StartFragment:0000003879 EndFragment:0000004899
Version:1.0 StartHTML:0000000105 EndHTML:0000006044 StartFragment:0000004584 EndFragment:0000006008

Cultural Literacy

- Level: POL 2710 (Survey of Polish Culture)
- Outcome Details: Students will be able to: demonstrate familiarity with the most significant products, practices, and perspectives of Polish culture, as well as an
understanding of and appreciation for these cultural phenomena. They will also be able to articulate some of the differences between their own culture and Polish culture, as well as demonstrate knowledge of the Polish-American cultural legacy in Detroit.

1: Acquisition of Essentials of Russian Cultural Competency
Providing Department: B.A. Slavic Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Cultural Competency
- Level: RUS 2710 (Introduction to Russian Culture)

Outcome Details: Students will be able to analyze a contemporary news article in a way that demonstrates cultural and historical literacy. Specifically, they will be able to place a contemporary news event in the appropriate cultural context, articulate the main questions being discussed, identify the author’s perspective, and explain the significance of the event in relation to contemporary culture, politics, or society.

2: Achieving Language-Proficiency Goals in Polish: Speaking
Providing Department: B.A. Slavic Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Speaking Skills
- Level: POL 2060 (Composition and Conversation)

Outcome Details: Students finishing 2060 will be able to demonstrate speaking skills at the Intermediate Mid-level as defined by ACTFL: Speakers at the Intermediate Mid sublevel are able to handle successfully a variety of uncomplicated communicative tasks in straightforward social situations. Conversation is generally limited to those predictable and concrete exchanges necessary for survival in the target culture. These include personal information related to self, family, home, daily activities, interests and personal preferences, as well as physical and social needs, such as food, shopping, travel, and lodging. Intermediate Mid speakers tend to function reactively, for example, by responding to direct questions or requests for information. However, they are capable of asking a variety of questions when necessary to obtain simple information to satisfy basic needs, such as directions, prices, and services. When called on to perform functions or handle topics at the Advanced level, they provide some information but have difficulty linking ideas, manipulating time and aspect, and using communicative strategies, such as circumlocution. Intermediate Mid speakers are able to express personal meaning by creating with the language, in part by combining and recombing known elements and conversational input to produce responses typically consisting of sentences and strings of sentences. Their speech may contain pauses, reformulations, and self-corrections as they search for adequate
vocabulary and appropriate language forms to express themselves. In spite of the limitations in their vocabulary and/or pronunciation and/or grammar and/or syntax, Intermediate Mid speakers are generally understood by sympathetic interlocutors accustomed to dealing with non-natives. Overall, Intermediate Mid speakers are at ease when performing Intermediate-level tasks and do so with significant quantity and quality of Intermediate-level language.

2: Achieving Language-Proficiency Goals in Russian: Speaking

Providing Department: B.A. Slavic Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Speaking Skills

- **Level:** RUS 2020 (Intermediate Russian)
- **Outcome Details:** Students finishing 2020 will be able to demonstrate speaking skills at the Intermediate Mid level as defined by ACTFL: "Speakers at the Intermediate Mid sublevel are able to handle successfully a variety of uncomplicated communicative tasks in straightforward social situations. Conversation is generally limited to those predictable and concrete exchanges necessary for survival in the target culture. These include personal information related to self, family, home, daily activities, interests and personal preferences, as well as physical and social needs, such as food, shopping, travel, and lodging. Intermediate Mid speakers tend to function reactively, for example, by responding to direct questions or requests for information. However, they are capable of asking a variety of questions when necessary to obtain simple information to satisfy basic needs, such as directions, prices, and services. When called on to perform functions or handle topics at the Advanced level, they provide some information but have difficulty linking ideas, manipulating time and aspect, and using communicative strategies, such as circumlocution. Intermediate Mid speakers are able to express personal meaning by creating with the language, in part by combining and recombining known elements and conversational input to produce responses typically consisting of sentences and strings of sentences. Their speech may contain pauses, reformulations, and self-corrections as they search for adequate vocabulary and appropriate language forms to express themselves. In spite of the limitations in their vocabulary and/or pronunciation and/or grammar and/or syntax, Intermediate Mid speakers are generally understood by sympathetic interlocutors accustomed to dealing with non-natives. Overall, Intermediate Mid speakers are at ease when performing Intermediate-level tasks and do so with significant quantity and quality of Intermediate-level language."
Learning Outcome Description
Writing Skills:

- **Level:** POL 3030 (Advanced Speaking and Writing)
- **Outcome details:** Students write at the Advanced Low level as defined by ACTFL: “Writers at the Advanced Low level are able to meet basic work and/or academic writing requirements. They demonstrate the ability to narrate and describe in major time frames with some control of aspect. They are able to compose simple summaries on familiar topics. Advanced Low writers are able to combine and link sentences into texts of paragraph length and structure. Their writing, while adequate to satisfy the criteria of the Advanced level, may not be substantive. Writers at the Advanced Low sublevel demonstrate the ability to incorporate a limited number of cohesive devices, and may resort to some redundancy and awkward repetition. They rely on patterns of oral discourse and the writing style of their first language. These writers demonstrate minimal control of common structures and vocabulary associated with the Advanced level. Their writing is understood by natives not accustomed to the writing of non-natives, although some additional effort may be required in the reading of the text. When attempting to perform functions at the Superior level, their writing will deteriorate significantly.”

---

Learning Outcome Description
Writing Skills:

- **Level:** RUS 3020 (Intermediate-Advanced Russian)
- **Outcome details:** Students will be able to demonstrate writing skills at the Advanced Low level as defined by ACTFL: “Writers at the Advanced Low sublevel are able to meet basic work and/or academic writing needs. They demonstrate the ability to narrate and describe in major time frames with some control of aspect. They are able to compose simple summaries on familiar topics. Advanced Low writers are able to combine and link sentences into texts of paragraph length and structure. Their writing, while adequate to satisfy the criteria of the Advanced level, may not be substantive. Writers at the Advanced Low sublevel demonstrate the ability to incorporate a limited number of cohesive devices, and may resort to some redundancy and awkward repetition. They rely on patterns of oral discourse and the writing style of their first language. These writers demonstrate minimal control of common structures and vocabulary associated with the Advanced level. Their writing is understood by natives not accustomed to the writing of non-natives, although some additional effort may be required in the reading of the text. When attempting to perform functions at the Superior level, their writing will deteriorate significantly.”
minimal control of common structures and vocabulary associated with the Advanced level. Their writing is understood by natives not accustomed to the writing of non-natives, although some additional effort may be required in the reading of the text. When attempting to perform functions at the Superior level, their writing will deteriorate significantly.

M.A. Classics

1: MA Classics Learning Outcome 1
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate a higher level of reading comprehension in their target language (Latin, Ancient Greek, or both).

2: MA Classics Learning Outcome 2
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate a higher level of translating skills in their target language (Latin, Ancient Greek, or both).

3: MA Classics Learning Outcome 3
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate a higher level of understanding of grammar and syntax in their target language (Latin, Ancient Greek, or both).
4: MA Classics Learning Outcome 4
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate a higher level of knowledge of the history of literature in their target language (Latin, Ancient Greek, or both).

5: MA Classics Learning Outcome 5
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate an enhanced knowledge and understanding of the history of either Ancient Greece, Rome, or both, depending on their personal program.

6: MA Classics Learning Outcome 6
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate an enhanced knowledge and understanding of the cultural markers of Ancient Greece or Rome, or both, depending on their personal program.

7: MA Classics Learning Outcome 7
Providing Department: M.A. Classics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of their studies, graduate students will demonstrate an ability to conduct research in Classics and present their findings as an oral presentation.
8: MA Classics Learning Outcome 8  
Providing Department: M.A. Classics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
At the completion of their studies, graduate students will demonstrate an ability to  
conduct research in Classics and present their findings as a written format.

M.A. German

1: LO 1, Writing  
Providing Department: M.A. German  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students who receive a MA can write research papers that demonstrate their ability to:

1. formulate and support a thesis  
2. support arguments with a range of primary and secondary sources  
3. organize content clearly and according to North American academic style  
4. make persuasive arguments  
5. make some original arguments  
6. use the MLA style sheet for bibliography and citations  
7. write in German at the advanced high to superior level

2: LO 2, Presentational Speaking  
Providing Department: M.A. German  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students who receive an MA in German will demonstrate the ability to deliver an  
organized presentation on a scholarly subject that is appropriate to the audience. In  
doing so, they will demonstrate a clear understanding of the differences between  
effective oral and written presentations. Their presentations will effectively summarize  
and analyze materials for a listening audience and make effective use of visual aids and  
technology. They will demonstrate the attainment of presentational speaking skills  
German at the advanced high to superior ACTFL level.
3: LO 3, Interpersonal Communication  
Providing Department: M.A. German  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students receiving an MA in German will be able to engage in interpersonal communication the Advanced High to Superior level according to ACTFL standards. This means that they can express themselves fully and fluently with ease and largely with lexical, syntactic and intercultural accuracy not only on familiar and concrete topics but also on unfamiliar and complex issues within the realm of German cultural studies. Students can develop hypotheses, express opinions, and develop complex arguments to support them. They can communicate in this manner both in one-on-one and group settings, such as discussions.

4: LO 4, Analysis of Primary and Secondary Sources  
Providing Department: M.A. German  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students receiving an MA in German will be able to comprehend and analyze a wide range of authentic German sources. Their skills of reading and listening comprehension will be at the Advanced High to Superior level of the ACTFL scale. Primary sources include everyday discourse, such as newspapers, radio and television programs, literary texts published between the 18th and the 21st century, documentary and feature films released between the early 20th century and the present. Secondary sources include academic writing, both analyses of literary and filmic narratives and theory in literary, linguistic and cultural studies. In their analysis of primary sources students can analyze the narratives with regard to specific themes and topics. In their analysis of secondary sources, students can understand and summarize the thesis and argument. They can also incorporate appropriate ideas from secondary sources into their own analyses of primary sources, both in written (essay) and oral (presentation) format.

M.A. Near Eastern Languages  

LO1: Reading in the target language  
Providing Department: M.A. Near Eastern Languages  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
To read complex Arabic/Hebrew texts at an advanced level.
LO2: Writing in the target language
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To write in Arabic/Hebrew at an advanced level.

LO3: Speaking in the target language
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To speak in Arabic/Hebrew at an advanced level. Develop conversational skills to discuss topics of interest using a variety of language functions (e.g. clarification, description, comparison, reasoning, argumentation, supporting ideas with the appropriate evidence, etc.).

LO4: Analyzing and interpreting primary texts
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To analyze and interpret the structural, conceptual, and cultural contents of Arabic/Hebrew primary sources.

LO5: Evaluating scholarly literature
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To evaluate the thesis, reasoning, evidences, and importance of scholarly literature (i.e. secondary sources) in the context of the student's research area.
LO6: Developing information literacy
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To determine what information is needed to address a research question; to access diverse library and information resources for strategic exploration; to identify scholarship of high technical quality for use in developing the research question, hypothesis, theory, and methodology.

LO7: Writing arguments based on research
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To write evidence-based research papers and well-reasoned argumentative essays with appropriate documentation of evidences/sources.

LO8: Communicating research in oral presentations
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To present research in clear, concise, and engaging oral presentations for diverse audiences.

Program Goal 1: Developing a Comprehensive Curriculum
Providing Department: M.A. Near Eastern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- To offer a rich and coherent curriculum with important linkages across linguistic, literary, and cultural studies for students to develop a comprehensive understanding of the Near East
Program Goal 2: Effective Scheduling and POW Designs  
Providing Department: M.A. Near Eastern Languages  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- To provide course schedules and registration/Plan of Work (POW) advising to ensure that students can make timely degree progress

Program Goal 3: Extracurricular Training  
Providing Department: M.A. Near Eastern Languages  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- To train students in professional activities outside the classroom, such as conference participation, etc.

Program Goal 4: Connecting Students to Professional Opportunities  
Providing Department: M.A. Near Eastern Languages  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
- To connect students with potential employers, professional and alumni networks, and other professional opportunities (e.g. Career Day, GTA/teacher training, workshops, etc.)

M.A. Romance Languages  

1.0: MA Romance Languages_LO1_ Advanced oral communication  
Providing Department: M.A. Romance Languages  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Students communicate orally at an advanced level in the target language.
2.0: MA Romance Languages_LO2_ Advanced Written Communication
Providing Department: M.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students communicate in writing at an advanced level in the target language.

3.0: MA Romance Languages_LO3_ Critical Thinking/Analysis
Providing Department: M.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students critically analyze linguistic principles, regional cultures, literary and cultural history, and critical theories and approaches.

4.0: MA Romance Languages_LO4_ Research Skills: Bibliography
Providing Department: M.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students create an extensive bibliography comprised of field-specific academic sources.

5.0: MA Romance Languages_LO5_ Research Skills: Research Project
Providing Department: M.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students develop an original research project appropriate to the field

6.0: MA Romance Languages_LO6_ Research Skills: Argument
Providing Department: M.A. Romance Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students sustain an argument drawing from field-specific academic sources
MA in Language Learning

1.0: MALL Outcome 1_ Summarize theory and research
Providing Department: MA in Language Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students accurately summarize theory and research in second language acquisition and foreign language pedagogy

2.0: MALL Outcome 2_ Evaluate Existing Pedagogical Materials
Providing Department: MA in Language Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students apply theory and research to the evaluation of pedagogical materials and activities.

3.0: Create pedagogically sound materials
Providing Department: MA in Language Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students develop/create pedagogically sound materials. (Pedagogically sound = student appropriately applies theory and research to the target teaching context)

4.0: MALL Outcome 4: Assessment
Providing Department: MA in Language Learning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students design valid and reliable assessments for context-specific FL learning.

PhD in Modern Languages
LO1: Advanced Requisite Knowledge of Essential Concepts
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students develop advanced requisite knowledge of essential concepts relevant to their area of expertise.

LO2: Original Research Projects
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2: Original Research Projects
Students develop original research projects that contribute new knowledge to their field.

LO3: Research Skills: Bibliography
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students create an extensive bibliography comprised of field-specific academic sources that is part of an original research project.

LO4: Research Skills: Engagement with Previous Scholarship
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students incorporate and engage with field-specific academic sources to support an original argument; they demonstrate awareness of how their own work fits within their field of expertise.

LO5: Professionalization
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students demonstrate professional competence beyond the classroom through the participation and organization of workshops and conferences, through grant writing, and through other forms of professional development.

LO6: Pedagogical Skills
Providing Department: PhD in Modern Languages
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to both design and deliver content for language courses and other types of courses relevant to their field.

Communication Sciences and Disorders

Learning Outcome 3: Describe and Evaluate the Effects of Language and Culture on Normal and Disordered Communication Skills
Providing Department: Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will be able to describe and evaluate the effects of language and culture on normal and disordered communication skills

BA in Communication Sciences and Disorders

LO 5: Clinical Writing Skills
Providing Department: BA in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate introductory level clinical writing skills.

LO 6: Professionalism
Providing Department: BA in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
The students will demonstrate effective communication and interpersonal skills for professional interactions.

Learning Outcome 3: Describe and Evaluate the Effects of Language and Culture on Normal and Disordered Communication Skills
Providing Department: BA in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will be able to describe and evaluate the effects of language and culture on normal and disordered communication skills.

Learning Outcome 4: Professional Responsibilities
Providing Department: BA in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate the interpersonal skills and personal qualities necessary for developing effective professional relationships.

Learning Outcome 7: Demonstrate General Academic Skills Appropriate for Introductory Clinical Experience and Graduate Coursework
Providing Department: BA in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate general academic skills (including computer, research and study skills) appropriate for introductory clinical experience and graduate coursework.

Doctor of Audiology

1: General academic skills
Providing Department: Doctor of Audiology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
LO1: Demonstrate Academic Skills (including computer, research and study skills) in the areas of Hearing and Diagnostics appropriate for Clinical Experience.

2: Language and Culture
Providing Department: Doctor of Audiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2:
Describe and evaluate the effects of language and culture on normal and hearing impaired individuals.

L03: Clinical Skills
Providing Department: Doctor of Audiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will possess foundation clinical skills for diagnosis of hearing impairment and hearing (re)habilitation.

L04: Interpersonal Skills
Providing Department: Doctor of Audiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student demonstrate the interpersonal and personal qualities necessary for developing effective professional relationships.

LO 5: Professionalism
Providing Department: Doctor of Audiology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students will demonstrate effective communication and interpersonal skills for
MA with a major in speech-language pathology

1: Knowledge
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: Demonstrate academic skills in the areas of Communication Sciences and Disorders appropriate for clinical experience.

2: Skills
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2: Possess foundation for diagnosis and treatment for basic human communication and swallowing processes.

L03: Culture and Communication
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Describe and evaluate the effects of language and culture on normal and disordered communication skills.

L04: Interpersonal Skills
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate the interpersonal skills and personal qualities necessary for developing effective professional relationships.
LO 3: Professionalism
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students will demonstrate effective communication and interpersonal skills for professional interactions.

LO 5: Culture and Communication
Providing Department: MA with a major in speech-language pathology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will be able to describe and evaluate the effects of language and culture on normal and disordered communication skills

PhD with a major in Communication Sciences and Disorders

L03: Language and culture
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of the effects of language and culture on normal and disordered communication skills

L04: Teaching Preparation
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 8/1/2017
End: 8/31/2018

Learning Outcome Description
The student will complete a pedagogy course, a teaching portfolio, and at least ten hours of university classroom teaching under faculty supervision.
LO 1: Knowledge
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will read, analyze, and synthesize current scholarly publications in their major content area, and synthesize their findings in a written presentation.

LO 3: Professionalism
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will communicate effectively and interact using appropriate interpersonal skills for a professional setting.

LO 4: Culture and Communication
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2019

Learning Outcome Description
The student will be able to describe and evaluate the effects of language and culture on normal and disordered communication skills.

LO 2: Research Skills
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will conduct independent research by completing pre-candidacy and dissertation research projects.
LO5: Teaching
Providing Department: PhD with a major in Communication Sciences and Disorders
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will design course content for a communication sciences and disorders course, and deliver course content to students at the university level.

Computer Science

BA in Computer Science

LO1: BA Computer Science LO 1_Apply Principles
Providing Department: BA in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to apply the principles of Computer Science, Algorithmic Principles, Mathematics, and scientific investigation to solve real-world problems appropriate to the discipline as part of a system development team.

LO2: BA Computer Science LO 2_Lifelong Learning Skills
Providing Department: BA in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have lifelong learning skills, which will allow them to successfully adapt to evolving technologies throughout their professional careers.

LO3: BA Computer Science LO 3_sufficiently prepared for employment.
Providing Department: BA in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are sufficiently prepared for employment and will have significant experiences with complex software development for real-world problems.
LO4: BA Computer Science_LO 4_ sufficient teamwork, communication, and interpersonal skills
Providing Department: BA in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have sufficient teamwork, communication, and interpersonal skills to enable them to work with others effectively in their professional careers.

LO5: BA Computer Science_LO 5_Function ethically and responsibly
Providing Department: BA in Computer Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can function ethically and responsibly, and are conscious of ethical, social, global, legal, security and professional issues related to computing.

Bachelor of Arts in Information Systems Technology

LO1: BAIS Outcome 1_ develop programming skills
Providing Department: Bachelor of Arts in Information Systems Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn to develop their programming skills in order to allow them to apply these learned techniques to analyze an information technology problem, evaluate possible solutions, and create a solution as part of an organizational development team.

LO2: BAIS Outcome 2_ lifelong learning skills
Providing Department: Bachelor of Arts in Information Systems Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have lifelong learning skills, which will allow them to successfully adapt to evolving technologies throughout their professional careers.
LO3: BAIS Outcome 3_ sufficiently prepared for employment
Providing Department: Bachelor of Arts in Information Systems Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are sufficiently prepared for employment and will have significant experiences with complex software development for real-world problems.

LO4: BAIS Outcome 4_ sufficient teamwork, communication, and interpersonal skills
Providing Department: Bachelor of Arts in Information Systems Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will have sufficient teamwork, communication, and interpersonal skills to enable them to work with others effectively in their professional careers.

LO5: BAIS Outcome 5_ Function ethically and responsibly
Providing Department: Bachelor of Arts in Information Systems Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can function ethically and responsibly, and are conscious of ethical, social, global, legal, security and professional issues related to computing.

Criminal Justice

BS in Criminal Justice

1: BS Criminal Justice_Learning Outcome 1.0
Providing Department: BS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can explain the general nature of crime and criminality.
2: BS Criminal Justice_Learning Outcome 2.0
Providing Department: BS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can identify the separate components of the criminal justice system and understand the interrelationships between these components.

3: BS Criminal Justice_Learning Outcome 3.0
Providing Department: BS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can describe the major theoretical explanations of crime and criminality.

4: BS Criminal Justice_Learning Outcome 4.0
Providing Department: BS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can describe the scientific method typically used in the social sciences.

5: BS Criminal Justice_Learning Outcome 5.0
Providing Department: BS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can describe Constitutional rights and judicial procedure.

MS in Criminal Justice

1: MS Criminal Justice_Learning Outcome 1.0
Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop knowledge of theories of crime and criminality, research
methodology, and the empirical validity of criminal justice theories.

2: MS Criminal Justice Learning Outcome 2.0
Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate synthesis on a particular criminal justice topic by accessing and integrating empirical and non-empirical information into a cohesive overview of current knowledge.

3: MS Criminal Justice Learning Outcome 3.0
Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate the ability to critically evaluate the meaning, value, and contribution of published literature in the field of Criminal Justice.

4: MS Criminal Justice Learning Outcome 4.0
Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate imagination and originality of thought.

5: MS Criminal Justice Learning Outcome 5.0
Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop skills in analysis such that they can design and implement an appropriate collection and analysis of data to adequately answer a research question or hypothesis and interpret empirical findings.
6: MS Criminal Justice Learning Outcome 6.0

Providing Department: MS in Criminal Justice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop skills in application such that they can interpret criminal justice-related theory, literature and research to articulate a critical public policy response.

---

Economics

BA in Economics

2: Learning Outcome 2 for B.A. in economics

Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 2: Each student will demonstrate an understanding of the basic concepts and methods of microeconomics and macroeconomics.

Outcome Assessment 2.1: Students will demonstrate their understanding by successfully completing Economics 5000, 5050 and 5100.

---

2: Learning Outcome for Economics 2010

Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 2010

Supply, demand, price at the level of the firm and industry; business institutions and their operation; determinants of wage and salary levels, interest rates, rent, profits, income distribution; public policy in relation to business and labor.

The student will learn the basics of microeconomic theory. Topics include markets supply and demand; labor market; market efficiency and its application; government intervention in specific markets; i.e., the impact of taxation. The course will also cover market structure and compares competitive markets to monopoly.
3: Learning Outcome 3 for B.A. in economics
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 3: Each student will be able to communicate economic ideas in both writing and speech.

Outcome Assessment 3.1: Students will demonstrate their written and oral communication skills through their written work and class participation in 5000-level Economics courses.

Outcome Assessment 3.2: Students will demonstrate their written communication skills through completion of ECO 5993, the writing-intensive requirement.

3: Learning Outcome for Economics 2020
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 2020

Determination of national income, consumption and saving, and investment; money, banking and the Federal Reserve; inflation and unemployment; monetary and fiscal policy; economic growth and productivity; the international sector.

The student will learn the basics of macroeconomic theory. Topics include determination of national income, consumption and saving, and investment; inflation and unemployment; money and interest rates; monetary and fiscal policy. This course may cover the following topics: economic growth and productivity; the international sector.

4: Learning Outcome 4 for B.A. in economics
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome 4: Students will demonstrate the ability to critically evaluate articles on economic subjects.

Outcome Assessment 4.1: Students will demonstrate their ability to evaluate articles on economic subjects through completion of ECO 5993, the writing-intensive requirement.
Learning Outcome for Economics 4000
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 4000

Students will be able to analyze economic problems using supply and demand techniques, using both diagrams and algebra.

Students will be able to analyze consumer behavior using utility functions, indifference curves and budget lines, using diagrams and sometimes algebra.

Students will be able to do this in a variety of contexts, including the basic model, labor-leisure choice, intertemporal consumption, and general equilibrium theory.

Students will be able to analyze producer behavior using production functions, isoquants and cost curves, using diagrams and sometimes algebra.

Students will be able to integrate the techniques above to analyze problems in market structure (competitive markets, monopoly, monopsony, etc.) and government intervention in the economy.

Learning Outcome for Economics 4050
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 4050 (formerly 5050)

Theory of national income determination. National output and income, saving and capital formation.

The student will learn theory of national income determination, economic growth, inflation, and unemployment. Effects of monetary and fiscal policy are studied using numerical examples. Emphasis is placed on the difference between long-run and short-run effects. All the basic concepts of macroeconomic theory are covered in this course.
6: Learning Outcome for Economics 4100
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 4100 (formerly 5100)

Preliminary data analysis; simple regression; multiple regression; probability and statistics; inference in multiple regression; generalized regression.

The student will learn basics of statistics and econometrics. Topics include the properties of data and the clear definition of descriptive statistics; difference between the sample and the population; estimation of population moments; basics of probability theory. Then, the student will learn the concepts and methods of hypothesis testing. Finally, the instructor will teach simple linear regression and multiple linear regression models that are often used not only in academic research but also in business and finance.

7: Learning Outcome for Economics 5300
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Econ. 5300

Students successfully completing this course will be able to

- Identify the principal reasons that countries trade with each other
- Predict the likely effects of trade, including the effect on prices, levels of production, and consumer welfare in each country
- Predict the likely effects of worker migration and financial capital movements between countries
- Identify the major instruments of government trade policy and their effects
- Describe important recent events and trends related to international trade
- Describe the chief arguments in favor of liberalized international trade, and some arguments against liberalized trade.

8: Learning Outcome for Economics 5520
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. To learn and apply the concepts and methods of state and local public finance in depth.
2. To learn the historical context of state and local public finance, the connections to other fields of study, and the role of ethical values in decisions and policymaking.

3. To carry out independent research and communicate findings related to state and local public finance to students, faculty, and others.

4. To interpret critically and communicate quantitative and verbal information about state and local public finance.

5. To learn how state and local public finance can be applied to issues of contemporary concern.

6. To acquire skills and interests which enable students to be lifelong learners and contributing members of their communities, including critical thinking, clear and thoughtful communication, and honest and open inquiry.

---

9: Learning Outcome for Economics 5500

**Providing Department:** BA in Economics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

** Students will be able to analyze public finance problems using a variety of different techniques.**

** Students will be able to analyze consumer behavior in public finance problems, using utility functions, indifference curves and (linear or nonlinear) budget lines, using diagrams and algebra.

** Students will be able to analyze market equilibrium in public finance problems, using supply and demand techniques, using diagrams and algebra.

** Students will be able to examine efficiency (including differences between equilibrium outcomes and socially optimal outcomes) in public finance problems.

---

10: Learning Outcome for Economics 5270

**Providing Department:** BA in Economics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Upon successful completion of this course, 1) Students will be able to develop the ability to apply the game theory knowledge to
various economic situations and find the suitable tools to analyze and derive the economic intuition.

2) Students will be able to understand how decision makers (such as Individuals, groups, rms...) make their decisions strategically when their actions affect each other.

3) Students will be able to define the basics of a game and translate the basics of a game into a wide range of conicts.

4) Students will be able to analyze conict dynamics from the standpoint of rationality.

5) Students will be able to theorize possible and probable strategies where information is complete and incomplete.

6) Students will be able to appraise theoretical predictions obtained from Game Theory.

11: Learning Outcome for Economics 5020
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
** You should learn how to analyze many different types of mathematical problems.

** You should learn to analyze some kinds of economics problems (although this is much less important than learning the mathematics).

** After taking this course, you should be prepared (from a mathematical point of view) to take most of our Ph.D.-level classes in economics.

** After taking this course and ECO 7021, you should be prepared (from a mathematical point of view) to take all of our Ph.D.-level classes in economics.

12: Learning Outcome for Economics 5210
Providing Department: BA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The successful student will be able to apply economics to four issues of industrial organization: (1) how price, quality, and variety get determined in a market; (2) how social welfare depends on these features of a market; (3) how public policies toward industry affect social welfare; (4) how new fields such as behavioral economics and neuroeconomics have contributed to our understanding of market behavior.
1: Learning Outcome 1 for M.A. Program

Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. A good foundation in microeconomic and macroeconomic theory as well as in quantitative methods.

1: Learning Outcome for Economics 6410

Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Eco 7410/6410 Economics of Human Resources

Upon successful completion of this course, students will be able to do the following:

- Apply microeconomic theory to individual behavior regarding labor, education, marriage, fertility, and related outcomes.
- Evaluate public policies, workplace policies, and other 'natural experiments', and predict some of their impacts on labor force outcomes and demographic outcomes.
- Critique both empirical and theoretical aspects of empirical research papers in economics.
- Design and plan a theoretically-based empirical research project.

2: Learning Outcome 2 for M.A. Program

Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. One field specialization in Industrial Organization, International Trade and Finance, Labor and Human Resources, or Health Economics.

2: Learning Outcome for Economics 6520

Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
1. To learn and apply the concepts and methods of state and local public finance in depth.

2. To learn the historical context of state and local public finance, the connections to other fields of study, and the role of ethical values in decisions and policymaking.

3. To carry out independent research and communicate findings related to state and local public finance to students, faculty, and others.

4. To interpret critically and communicate quantitative and verbal information about state and local public finance.

5. To learn how state and local public finance can be applied to issues of contemporary concern.

6. To acquire skills and interests which enable students to be lifelong learners and contributing members of their communities, including critical thinking, clear and thoughtful communication, and honest and open inquiry.

3: Learning Outcome 3 for M.A. Program
Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. In special cases, the M.A. student may choose a concentration in Advanced Microeconomics or Macroeconomics.

3: Learning Outcome for Economics 6510
Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
** Students will be able to analyze public finance problems using a variety of different techniques.

** Students will be able to analyze consumer behavior in public finance problems, using utility functions, indifference curves and (linear or nonlinear) budget lines, using diagrams and algebra.

** Students will be able to analyze market equilibrium in public finance problems, using supply and demand techniques, using diagrams and algebra.
** Students will be able to examine efficiency (including differences between equilibrium outcomes and socially optimal outcomes) in public finance problems.

---

4: Learning Outcome 4 for M.A. Program

**Providing Department:** MA in Economics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

4. The M.A. program should provide Preparation for careers in research organizations, industry, and public service.

---

4: Learning Outcome for Economics 6100

**Providing Department:** MA in Economics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Upon completion of this course, successful students will be able to:

- Conduct Ordinary Least Square (OLS) regression for linear models, and analyze the estimation and inference results;
- Evaluate the properties for OLS under different circumstances;
- Identify endogeneity issues and conduct Instrument Variable (IV) estimation when necessary;
- Apply Logit and Probit models to binary choice models;
- Identify the differences among corner solutions, censoring and truncations in samples and conduct suitable estimations;
- Assess whether a time series is stationary and conduct appropriate estimation and inferences.

---

5: Learning Outcome for Economics 6000

**Providing Department:** MA in Economics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

** You should learn how to analyze various economic situations that are stated in the form of microeconomics problems.

** You should learn to use graphical analysis in analyzing problems.

** You should learn to apply pre-calculus mathematical analysis in analyzing problems.

** You should learn to apply various calculus-based techniques (including ordinary
derivatives, partial derivatives and Lagrangians) in analyzing problems.

6: Learning Outcome for Economics 6210
Providing Department: MA in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The learning outcomes here are similar to those for ECO 5210. Successful students here will be able to think at a higher level of abstraction, express ideas with greater clarity, and write analyses with greater rigor.

The successful student will be able to apply economics to four issues of industrial organization: (1) how price, quality, and variety get determined in a market; (2) how social welfare depends on these features of a market; (3) how public policies toward industry affect social welfare; (4) how new fields such as behavioral economics and neuroeconomics have contributed to our understanding of market behavior.

PhD in Economics

1: Learning Outcome 1 for Ph.D. Program
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. The student should acquire a solid foundation in economic theory and quantitative methods.

2: Learning Outcome 2 for Ph.D. Program
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2023

Learning Outcome Description
2. The student will choose two or more field specializations from the following: Industrial Organization, International, Labor, and Health/Health Care; in preparation for careers in universities, research organizations, industry, and financial institutions.
### Learning Outcome 3 for Ph.D. Program

**Providing Department:** PhD in Economics  
**Start:** 9/1/2017  
**End:** 8/30/2023

#### Learning Outcome Description

2. The student must choose two or more field specializations from the following: Industrial Organization, International, Labor, and Health/Health Care; in preparation for careers in universities, research organizations, industry, and financial institutions.

---

### Learning Outcome for Economics 7410

**Providing Department:** PhD in Economics  
**Start:** 9/1/2017  
**End:** 8/31/2018

#### Learning Outcome Description

**Eco 7410/6410 Economics of Human Resources**

Upon successful completion of this course, students will be able to do the following:

- Apply microeconomic theory to individual behavior regarding labor, education, marriage, fertility, and related outcomes.
- Evaluate public policies, workplace policies, and other ‘natural experiments’, and predict some of their impacts on labor force outcomes and demographic outcomes.
- Critique both empirical and theoretical aspects of empirical research papers in economics.
- Design and plan a theoretically-based empirical research project.

---

### Learning Outcome for Economics 7050

**Providing Department:** PhD in Economics  
**Start:** 9/1/2017  
**End:** 8/31/2018

#### Learning Outcome Description

Economic growth theory; Business cycle model; Monetary policy. Students who take this course will be able to understand the general framework of neoclassical growth model and business cycle model. Also, they can explain the issues related to monetary policy based on modern theory.
9: Learning Outcome for Economics 7200
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
ECO 7200 Industrial Organization I The successful student will know the literature on three fundamental issues of industrial organization: why firms direct resource allocation when prices could do the same thing, how a firm determines its boundary and how a firm organizes its activities. Beyond that, the successful student can do research on any of the following issues of markets: managerialism, fragility, contagion, leverage, and bubbles. The successful student is conversant in antitrust case history and can conduct economic analyses for parties involved in antitrust litigation.

10: Learning Outcome for Economics 7021
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of this course, successful students will be able to

- Define sets and their Cartesian products and apply basic operations on sets;
- Define various spaces and characterize their properties;
- Use convergence theory to determine limits of sequences;
- Use distribution functions to calculate moments, probabilities and conditional probabilities;
- Identify the commonly used distributions and derive their properties;
- Derive limiting distributions for a sequence of random variables and characterize their properties;
- Derive Euler Equation and solve Calculus of Variation problems;
- Apply Maximum Principle to solve Optimal Control problems;
- Derive Value Function and use Bellman Equation to solve Dynamic Programming problems.

11: Learning Outcome for Economics 7120
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of this course, successful students will be able to

- Conduct Generalized Method of Moments (GMM) estimation and inferences;
- Conduct time series analysis for stationary and nonstationary, univariate and
multivariate data;
- Measure, model, estimate and forecast volatility;
- Estimate binary choice models;
- Identify sample selection problems and conduct censored or truncated regression analysis.

12: Learning Outcome for Economics 7020
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
** You should learn how to analyze many different types of mathematical problems.

** You should learn to analyze some kinds of economics problems (although this is much less important than learning the mathematics).

** After taking this course, you should be prepared (from a mathematical point of view) to take most of our Ph.D.-level classes in economics.

** After taking this course and ECO 7021, you should be prepared (from a mathematical point of view) to take all of our Ph.D.-level classes in economics.

13: Learning Outcome for Economics 7060
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Detailed specifications of macroeconomic models; Interpretation of empirical macroeconomic models. Students who take this course will be able to understand the detailed specification of macroeconomic models. The theories of overlapping generations model, aggregate consumption, investment, unemployment, and nominal and real rigidities are covered. Students will be able to read and interpret the empirical literature on macroeconomic issues.

14: Learning Outcome for Economics 7100
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
By the end of the course, the students will
- be able to understand the fundamental concepts and techniques in econometric
analysis;
- be able to construct valid econometric models based on sound hypotheses;
- be able to apply linear regression analysis to real world problems and primary datasets;
- be able to identify and solve a number of common problems in linear regression estimation;
- be able to critically read and understand journal articles that use methods introduced in the course.

15: Learning Outcome for Economics 7110
Providing Department: PhD in Economics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
By the end of the course, the students will
- be able to understand the theoretical properties of various econometric estimation and testing procedures;
- be able to apply different mathematical, statistical and graphical techniques appropriately;
- be able to conduct empirical research at an advanced level using modern econometrics techniques;
- be able to critically interpret and analyze the regression results in a written report.

English
BA in English

1: Reading
Providing Department: BA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
READING: Students will be able to describe, explicate, analyze, comprehend, and explain literary, media, and/or rhetorical works.

2: Writing
Providing Department: BA in English
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**

**WRITING:** Students will be able to write logical and compelling essays that demonstrate fluency in close reading, clarity in argumentation, and sophistication in critical thinking, reflecting broad knowledge of a range of literary and cultural topics and methods. (NB: By “sophistication,” we mean nuance, complexity, and reflexivity.)

---

3: Research

**Providing Department:** BA in English

**Start:** 9/1/2017

**End:** 8/31/2018

**Learning Outcome Description**

**RESEARCH:** Students will be able to search for, identify, and evaluate pertinent primary and secondary sources, in both print and digital formats; identify, define, and use field-appropriate research methods as well as theoretical and interpretive frames; and integrate, with appropriate citation, sources, methods, and theories into original arguments.

---

4: Content Knowledge

**Providing Department:** BA in English

**Start:** 9/1/2017

**End:** 8/31/2018

**Learning Outcome Description**

**CONTENT KNOWLEDGE:** Students will be able to demonstrate familiarity with literary and cultural production from a range of communities and cultures; to make connections among diverse historical eras, genres, styles, forms, theories, and techniques; and to situate works within literary, historical, and cultural contexts.

---

BA in Film Studies

1: Analysis

**Providing Department:** BA in Film Studies

**Start:** 9/1/2017

**End:** 8/31/2018

**Learning Outcome Description**

Students will be able to describe, explicate, comprehend, and explain moving image (and other) media, employing methods of formal, structural, theoretical, historical, technical, and cultural analysis.
2: Writing

**Providing Department:** BA in Film Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will be able to write logical and compelling essays that demonstrate fluency in analysis, clarity in argumentation, and sophistication in critical thinking, reflecting broad knowledge of topics and methods in cinema and media studies. (NB: sophistication connotes nuance, complexity, and reflexivity)

---

3: Research

**Providing Department:** BA in Film Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will be able to search for, identify, and evaluate pertinent scholarly sources in both print and digital formats; to identify, define, and use field-appropriate research methods as well as theoretical and interpretive frames; and to integrate, with appropriate citation, sources, methods, and theories into original arguments.

---

4: Content Knowledge

**Providing Department:** BA in Film Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will be able to demonstrate familiarity with film and media production from a range of historical periods, national cinemas, communities, and cultures; to make connections among diverse historical eras, geographical locations, genres, styles, forms, techniques, and media; to explain and deploy major positions in the history of classical and contemporary film theory; and to situate works within economic, social, technical, and cultural contexts and systems.

---

Composition

1: **Learning Outcome #1: Analyze occasions for writing**

**Providing Department:** Composition  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
Produce writing that demonstrates the ability to identify, describe, and analyze various occasions for writing, individual texts, genres, conventions, and audiences, from a rhetorical perspective.

2: Learning Outcome #2: Produce extended writing project
Providing Department: Composition
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce an extended writing project that uses research methods and research genres to explore a topic applicable to the course and that draws substantively on concepts from primary and/or secondary sources.

3: Learning Outcome #3: Use a flexible writing process
Providing Department: Composition
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce writing that shows use of a flexible writing process (generating ideas, drafting, substantive revision, and editing) and shows the ability to adapt this process for different writing situations and tasks.

4: Learning Outcome #4: Find, evaluate, and integrate research into writing
Providing Department: Composition
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Find, evaluate, and integrate research into writing

MA in English

A.1: Demonstrate broad knowledge of their field in English Studies.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Plan A learning outcomes pertain to the Plan A Thesis track for the M.A. in English.

A.2: Conduct scholarly and creative work in an ethical manner, consistent with professional standards.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan A learning outcomes pertain to the Plan A Thesis track for the M.A. in English.

A.3: Create an original work or an original body of work of aesthetic value, assessable by a Master’s Thesis
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan A learning outcomes pertain to the Plan A Thesis track for the M.A. in English.

B.1: Demonstrate broad knowledge of their field in English Studies.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan B learning outcomes pertain to the Plan B Essay track for the M.A. in English.

B.2: Conduct scholarly work in an ethical manner, consistent with professional standards.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan B learning outcomes pertain to the Plan B Essay track for the M.A. in English.

B.3: Create scholarly work that demonstrates fluency and skill in the critical analysis of literature, media, culture, and/or rhetoric & composition, assessable by the M.A. Essay.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan B learning outcomes pertain to the Plan B Essay track for the M.A. in English.

C.1: Demonstrate broad knowledge of their field in English Studies
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan C learning outcomes pertain to the Plan C Portfolio track for the M.A. in English.

C.2: Conduct scholarly and creative work in an ethical manner, consistent with professional standards.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan C learning outcomes pertain to the Plan C Portfolio track for the M.A. in English.

C.3: Create scholarly work that demonstrates fluency and skill in the critical analysis of literature, media, culture, and/or rhetoric & composition, assessable by the M.A. Portfolio.
Providing Department: MA in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Plan C learning outcomes pertain to the Plan C Portfolio track for the M.A. in English.

PhD in English

1: Demonstrate proficiency in their field.
Providing Department: PhD in English
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Demonstrate proficiency in their field.

2: Conduct scholarly and professional activities in an ethical manner.
Providing Department: PhD in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Conduct scholarly and professional activities in an ethical manner.

3: Meet degree benchmarks in a timely manner.
Providing Department: PhD in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Meet degree benchmarks in a timely manner.

4: Create and defend scholarly work that makes a contribution to knowledge in the field.
Providing Department: PhD in English
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Create and defend scholarly work that makes a contribution to knowledge in the field.

Geology

BA in Geology

1: Identification
Providing Department: BA in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to identify and name rocks, minerals and soils on the basis of their physical and mineralogical characteristics both in hand specimen and thin section.
2: Origin
Providing Department: BA in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to recognize geologic structures and be able to explain how and why they formed.

3: History
Providing Department: BA in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to summarize relative and numerical dating techniques and arrange major events in Earth history along the geologic time scale.

4: Three-Dimensional Thinking
Providing Department: BA in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to describe the structure, forces, properties and changes in the Earth's surface in three dimensions.

5: Mapping
Providing Department: BA in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to construct and interpret geologic maps and cross-sections.
1: Identification
Providing Department: BS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to identify and name rocks, minerals and soils on the basis of
their physical and mineralogical characteristics both in hand specimen and thin section.

2: Origin
Providing Department: BS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to recognize geologic structures and be able to explain how and
why they formed.

3: History
Providing Department: BS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to summarize relative and numerical dating techniques and
arrange major events in Earth history along the geologic time scale.

4: Three-dimensional thinking
Providing Department: BS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to describe the structure, forces, properties and changes in the
Earth's surface in three dimensions.

5: Mapping
Providing Department: BS in Geology
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
Students should be able to construct and interpret geologic maps and cross-sections.

MS in Geology

1: Research skills

**Providing Department:** MS in Geology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students who earn a Master of Science in Geology should be able to locate information in the scientific literature and critically read a scientific paper.

2: Technical writing

**Providing Department:** MS in Geology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students who earn a Master of Science in Geology should be able to write a scientific paper with appropriate statistical analysis and proper citations.

3: Oral communication

**Providing Department:** MS in Geology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students who earn a Master of Science in Geology should be able to describe/defend the results of a scientific investigation before a scientific audience.

4: Conceptual knowledge

**Providing Department:** MS in Geology

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students who earn a Master of Science in Geology should be able to collect and analyze geological samples and data and demonstrate advanced proficiency in one or more of the following areas of study: Mineralogy, Petrology, Sedimentology, Stratigraphy, Structural...
5: Problem Solving
Providing Department: MS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who earn a Master of Science in Geology should be able to apply quantitative methods to solving problems, including identifying and formulating the appropriate calculations.

6: Data analysis
Providing Department: MS in Geology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students who earn a Master of Science in Geology should be able to perform statistical data analysis and evaluate uncertainties in data as well as apply geostatistical statistics when appropriate.

History

BA in History

1.0: B.A. LO1 - Compare Histories over Region and Time
Providing Department: BA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
History majors will be able to compare the histories of diverse geographical regions and appraise their development over time.

2.0: B.A. LO2 - Analyze Historical Documents
Providing Department: BA in History
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
History majors will be able to analyze historical documents, address historical problems, and pose historical questions.

3.0: B.A. LO3 - Analytical Writing
Providing Department: BA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
History majors will demonstrate a command of analytical writing.

4.0: B.A. LO4 - Ability to Conduct Independent Historical Research
Providing Department: BA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
History majors will demonstrate the ability to conduct independent historical research.

Graduate Certificate in World History

1: Historical Knowledge in World History
Providing Department: Graduate Certificate in World History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will recognize broad global historical areas.

2: World Historical Analysis
Providing Department: Graduate Certificate in World History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will interpret prominent theories and methodologies in world history.
3: Historical Scholarship in World History

Providing Department: Graduate Certificate in World History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will assemble relevant secondary sources of a specific historical area or event relating to world history for a literature review.

4: Linking World History to Academic Interests

Providing Department: Graduate Certificate in World History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will assess literature linking their own academic interests to broader historical scholarship.

MA in History

1: Locating sources

Providing Department: MA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA students will locate relevant primary and secondary sources.

2: Analyzing sources

Providing Department: MA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA Students will analyze relevant primary and secondary sources.

3: Describe & explain events

Providing Department: MA in History
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
MA Students will describe and explain the principal historical events in a chosen field of history.

4: Historiography
Providing Department: MA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA Students will analyze current historiographical debates in a chosen field of history.

5: Historical argument
Providing Department: MA in History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA Students will articulate a historical argument, using evidence based in primary and secondary sources.

MA in Public History

1.0: MAPH A1 Historical Knowledge
Providing Department: MA in Public History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA Students will describe and explain the principal historical events in a chosen field of history, and in the context of a public history specialization.

2.0: MAPH A2 Research Skills
Providing Department: MA in Public History
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA Students will apply current methods of producing public history research.
3.0: MAPH A3 Public History Project
   Providing Department: MA in Public History
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   MAPH students will synthesize, develop, and carry out a public history project

4.0: MAPH A4 Professional Experience
   Providing Department: MA in Public History
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   MAPH students will acquire professional experience in public history

PhD in History

1: Locating sources
   Providing Department: PhD in History
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Doctoral Students will locate relevant primary and secondary sources.

2: Analyzing sources
   Providing Department: PhD in History
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Doctoral Students will analyze relevant primary and secondary sources.
3: Describe & explain events

**Providing Department:** PhD in History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Doctoral Students will describe and explain the principal historical events in two major fields and one minor field of history.

4: Historiography

**Providing Department:** PhD in History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Doctoral students will analyze current historiographical debates in their specialized area(s) of research.

5: Historical argument

**Providing Department:** PhD in History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Doctoral Students will articulate an original historical argument, using extensive evidence based in primary and secondary sources.

6: Professional standards

**Providing Department:** PhD in History  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Doctoral students will adhere to professional/scholarly standards.

Mathematics

BA in Mathematics
1: B.A. in Mathematics: Learning Outcome
Providing Department: BA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.A. in Mathematics program is proficient in the application of the laws of logic. Each student can see connections between mathematical notions and applications; can formulate precise and relevant mathematical statements and questions; and can find valid means of resolving those questions.

Each student can distinguish between valid and fallacious arguments, and can understand the role of axioms or assumptions. Each student can abstract general principles from examples.

2: B.A. in Mathematics: Learning Outcome
Providing Department: BA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.A. in Mathematics program has a detailed understanding of a broad subset of known mathematical notions and results.

3: B.A. in Mathematics: Learning Outcome
Providing Department: BA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.A. in Mathematics program can effectively communicate in mathematical terms, both written and orally.

4: B.A. in Mathematics: Learning Outcome
Providing Department: BA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.A. in Mathematics program has possesses mathematical skills suitable for employment in government, industry, or academics.
BS in Mathematics

1: B.S. in Mathematics: Learning Outcome
Providing Department: BS in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.S. in Mathematics program is proficient in the application of the laws of logic. Each student can see connections between mathematical notions and applications; can formulate precise and relevant mathematical statements and questions; and can find valid means of resolving those questions. Each student can distinguish between valid and fallacious arguments, and can understand the role of axioms or assumptions. Each student can abstract general principles from examples.

2: B.S. in Mathematics: Learning Outcome
Providing Department: BS in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.S. in Mathematics program has a detailed understanding of a broad subset of known mathematical notions and results.

3: B.S. in Mathematics: Learning Outcome
Providing Department: BS in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.S. in Mathematics program can effectively communicate in mathematical terms, both written and orally.

4: B.S. in Mathematics: Learning Outcome
Providing Department: BS in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.S. in Mathematics program has possesses mathematical skills suitable for employment in government, industry, or academics.
5: B.S. in Mathematics: Learning Outcome
Providing Department: BS in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the B.S. in Mathematics program has an appreciation for the essential role of mathematics in the natural sciences.

MA in Applied Mathematics

1: M.A. in Applied Mathematics: Learning Outcome
Providing Department: MA in Applied Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Applied Mathematics possesses a broad background in applied mathematics.

2: M.A. in Applied Mathematics: Learning Outcome
Providing Department: MA in Applied Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Applied Mathematics possesses a broad background in an area for which applied mathematics is relevant.

3: M.A. in Applied Mathematics: Learning Outcome
Providing Department: MA in Applied Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Applied Mathematics can effectively communicate in mathematical terms, both written and orally.
4: M.A. in Applied Mathematics: Learning Outcome
Providing Department: MA in Applied Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Applied Mathematics possesses mathematical skills suitable for employment in government, industry, or academics.

MA in Mathematics

1: M.A. in Mathematics: Learning Outcome
Providing Department: MA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematics will have a solid mathematical foundation suitable for future Ph.D. work in mathematics.

2: M.A. in Mathematics: Learning Outcome
Providing Department: MA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematics possesses mathematical skills suitable for employment in government, industry, or academics.

3: M.A. in Mathematics: Learning Outcome
Providing Department: MA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematics can effectively communicate in mathematical terms, both written and orally.
4: M.A. in Mathematics: Learning Outcome
Providing Department: MA in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematics has a detailed understanding of a broad subset of known mathematical notions and results.

MA with a major in Mathematical Statistics

1: M.A. in Mathematical Statistics: Learning Outcome
Providing Department: MA with a major in Mathematical Statistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematical Statistics possesses solid mathematical foundation suitable for future Ph.D. work in statistics, applied mathematics, or another STEM (science, technology, engineering, and mathematics) field.

2: M.A. in Mathematical Statistics: Learning Outcome
Providing Department: MA with a major in Mathematical Statistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematical Statistics possesses statistical skills suitable for employment in government, industry, or academics.

3: M.A. in Mathematical Statistics: Learning Outcome
Providing Department: MA with a major in Mathematical Statistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematical Statistics can effectively communicate in mathematical terms, both written and orally.
4: M.A. in Mathematical Statistics: Learning Outcome
Providing Department: MA with a major in Mathematical Statistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the M.A. in Mathematical Statistics has a detailed understanding of a broad subset of known mathematical notions and results.

PhD in Mathematics

1: Ph.D. in Mathematics: Learning Outcome
Providing Department: PhD in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the Ph.D. in Mathematics will have a solid foundation in a broad selection of mathematical areas.

2: Ph.D. in Mathematics: Learning Outcome
Providing Department: PhD in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the Ph.D. in Mathematics will make original research contributions in a specific field of study.

3: Ph.D. in Mathematics: Learning Outcome
Providing Department: PhD in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the Ph.D. in Mathematics will have deep knowledge in a specific field of study.
4: Ph.D. in Mathematics: Learning Outcome
Providing Department: PhD in Mathematics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Each student completing the Ph.D. in Mathematics possesses mathematical skills suitable for employment in government, industry, or academics.

Nutrition and Food Sciences

BA in Nutrition and Food Sciences

Learning Outcome 1: Integrate general research and analytical skills
Providing Department: BA in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Integrate general research and analytical skills into contemporary food and nutrition issues

Learning Outcome 2: Understand the structure, biochemical and metabolic functions
Providing Department: BA in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Understands the structure, biochemical and metabolic functions of nutrients and other dietary constituents

Learning Outcome 3: Apply knowledge of food, diets, and supplements
Providing Department: BA in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Apply knowledge of food, diets, and supplements in assessment and planning optimal diets
Learning Outcome 4: Apply techniques of nutritional status assessment
Providing Department: BA in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Apply techniques of nutritional status assessment in intervention and policy-making for healthy people and those with chronic diseases

BS in Dietetics

Learning Outcome 1: Dietetics Learning Outcomes Assessment CRD 1
Providing Department: BS in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Scientific & Evidence Base of Practice: Integration of scientific information and research into practice

Learning Outcome 2: Dietetics Learning Outcomes Assessment CRD 2
Providing Department: BS in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Professional Practice Expectations: Beliefs, values, attitudes and behaviors for the professional dietitian level of practice

Learning Outcome 3: Dietetics Learning Outcomes Assessment CRD 3
Providing Department: BS in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Clinical and Customer Services: Development and delivery of information, products and services to individuals, groups and populations
Learning Outcome 4: Dietetics Learning Outcomes Assessment CRD 4
Providing Department: BS in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Practice Management and Use of Resources: Strategic application of principles of management and systems in the provision of services to individuals and organizations.

Learning Outcome Overview: An Overview of Learning outcome
Providing Department: BS in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
• The CPD is accredited by the Academy of Nutrition and Dietetics educational arm
  – Accreditation Council for Education in Nutrition and Dietetics (ACEND)
  – The accreditation cycle is 7 years, with reporting annually
• ACEND education standards include learning outcomes
  – Core Competencies (CRDs)
• All Programs must have an assessment plan
  – The plan includes data collection on
    • Measurable objectives for each CRD
    • Methods used for data collection, including tools and timeline
    • Designation of person/s responsible for the data collection

BS in Nutrition and Food Sciences

Learning Outcome 1: Integrate general research and analytical skills
Providing Department: BS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Integrate general research and analytical skills into contemporary food and nutrition issues.
Learning Outcome 2: Understand the structure, biochemical and metabolic functions
Providing Department: BS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Understand the structure, biochemical and metabolic functions of nutrients and other dietary constituents

Learning Outcome 3: Apply knowledge of food, diets, and supplements
Providing Department: BS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Apply knowledge of food, diets, and supplements in assessment and planning optimal diets

Learning Outcome 4: Apply techniques of nutritional status assessment
Providing Department: BS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Apply techniques of nutritional status assessment in interventions and policy-making for healthy people and those with chronic diseases

MA in Nutrition and Food Sciences

Learning Outcome 1: Understand the structure, biochemical and metabolic functions
Providing Department: MA in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Understand the structure, biochemical and metabolic functions of nutrients and other dietary constituents and integrate general research and analytical skills into food and nutrition issues at an advanced level
**Learning Outcome 2:** Develop scientific methods, collect and interpret data  
**Providing Department:** MA in Nutrition and Food Sciences  
**Start:** 9/1/2017  
**End:** 8/30/2019

**Learning Outcome Description**  
Develop scientific methods, collect and interpret data

---

**Learning Outcome 3:** Develop a testable hypothesis, locate and utilize information related to his/her field of study  
**Providing Department:** MA in Nutrition and Food Sciences  
**Start:** 9/1/2017  
**End:** 8/30/2019

**Learning Outcome Description**  
Develop a testable hypothesis, locate and utilize information related to his/her field of study and read, understand and critically review literature

---

**Learning Outcome 4:** Analyze and explain the contributions his/her work to the field of existing knowledge....  
**Providing Department:** MA in Nutrition and Food Sciences  
**Start:** 9/1/2017  
**End:** 8/30/2019

**Learning Outcome Description**  
Analyze and explain the contributions his/her work to the field of existing knowledge: Communicate the importance of his/her work in an oral presentation and written format

---

**MS in Nutrition and Food Sciences**

**Learning Outcome 1:** Understand the structure, biochemical and metabolic......  
**Providing Department:** MS in Nutrition and Food Sciences  
**Start:** 9/1/2017  
**End:** 8/30/2019

**Learning Outcome Description**  
Understand the structure, biochemical and metabolic functions of nutrients and other dietary constituents and integrate general research and analytical skills into food and nutrition issues at an advanced level
Learning Outcome 2: Develop scientific methods, collect and interpret data
Providing Department: MS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Develop scientific methods, collect and interpret data

Learning Outcome 3: Develop a testable hypothesis, locate and utilize and critically review literature
Providing Department: MS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Develop a testable hypothesis, locate and utilize information related to his/her field of study and read, understand and critically review literature

Learning Outcome 4: Analyze and explain the contributions his/her work to the field of existing knowledge.
Providing Department: MS in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Analyze and explain the contributions his/her work to the field of existing knowledge: Communicate the importance of his/her work in an oral presentation and written format

PhD in Nutrition and Food Sciences

Learning Outcome 1: Develop and display foundation in nutrition and food science for continuing Ph.D. programs in either nutrition or food science disciplines
Providing Department: PhD in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Develop and display foundation in nutrition and food science for continuing Ph.D. programs in either nutrition or food science disciplines
Learning Outcome 2: Understand the structure, biochemical and metabolic functions of nutrients and other dietary constituents and integrate general research and analytical skills into food and nutrition issues at an advanced level

Providing Department: PhD in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Understand the structure, biochemical and metabolic functions of nutrients and other dietary constituents and integrate general research and analytical skills into food and nutrition issues at an advanced level

Learning Outcome 3: Apply acquired scientific knowledge in nutrition and food science to research and developing hypotheses

Providing Department: PhD in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Apply acquired scientific knowledge in nutrition and food science to research and developing hypotheses

Learning Outcome 4: Develop scientific methods, collect and interpret data and draft manuscripts

Providing Department: PhD in Nutrition and Food Sciences
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Develop scientific methods, collect and interpret data and draft manuscripts

Post Bachelor Certificate in Dietetics

Learning Outcome 1: Dietetics Learning Outcomes Assessment CRD 1

Providing Department: Post Bachelor Certificate in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Scientific & Evidence Base of Practice: Integration of scientific information and research into practice
Learning Outcome 2: Dietetics Learning Outcomes Assessment CRD 2
Providing Department: Post Bachelor Certificate in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Professional Practice Expectations: Beliefs, values, attitudes and behaviors for the professional dietitian level of practice

Learning Outcome 3: Dietetics Learning Outcomes Assessment CRD 3
Providing Department: Post Bachelor Certificate in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Clinical and Customer Services: Development and delivery of information, products and services to individuals, groups and populations

Learning Outcome 4: Dietetics Learning Outcomes Assessment CRD 4
Providing Department: Post Bachelor Certificate in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description
Practice Management and Use of Resources: Strategic application of principles of management and systems in the provision of services to individuals and organizations

Learning Outcome Overview: An Overview of Learning Outcome
Providing Department: Post Bachelor Certificate in Dietetics
Start: 9/1/2017
End: 8/30/2019

Learning Outcome Description

• The CPD is accredited by the Academy of Nutrition and Dietetics educational arm
  – Accreditation Council for Education in Nutrition and Dietetics (ACEND)
  – The accreditation cycle is 7 years, with reporting annually
• ACEND education standards include learning outcomes
  – Core Competencies (CRDs)
• All Programs must have an assessment plan
  – The plan includes data collection on
    • Measurable objectives for each CRD
    • Methods used for data collection, including tools and timeline
• Designation of person/s responsible for the data collection

Other Programs

College Centers

Center for Latino/a and Latin American Studies

Latino/a and Latin American Studies Co-major

1: Successful Student Transition from HS to WSU

Providing Department: Latino/a and Latin American Studies Co-major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will make a successful transition from their high schools of origin to WSU through participation in LAS 1410 and LAS 1420, as well as important gateway courses, such as ENG 1010, ENG 1020, MAT 0993 and MAT 1050.

2: Successful Graduation from WSU

Providing Department: Latino/a and Latin American Studies Co-major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will successfully graduate from WSU in a timely manner, preferably within six or fewer years of first time enrollment.

3: Undergraduate Research

Providing Department: Latino/a and Latin American Studies Co-major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to perform original, community-based, service-learning, undergraduate research projects, and will present their research at academic research conferences.
4: Knowledge of Latino/a and Latin American History & Culture  
Providing Department: Latino/a and Latin American Studies Co-major  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will deepen their understanding and knowledge of Latino/a and Latin American history, culture and social issues.

Center for Peace and Conflict Studies  
Co-major  

1: Subject Area Knowledge and Societal Remedies  
Providing Department: Co-major  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
- Demonstrated knowledge of and critical thinking about Peace and Conflict related societal problems and remedial methods. Problems include violence ramifications and management, conflict definitions and aspects in local, interpersonal and global contexts, and definitions of peace. Critical thinking entails balanced views with pros and cons about implications and remedies.

2: Life changing impacts  
Providing Department: Co-major  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Self-awareness of how peace and conflict issues affect the student’s personal life. Changes for student’s personal outlook instilled by courses.

3: Subject Area Community Engagement  
Providing Department: Co-major  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
- Familiarity with the relationship of peace to social justice concerns and with
practical experience of community and global organizations in this domain.

4: Cogent writing
Providing Department: Co-major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Ability to write cogently on topics covered in the first three learning objectives. Cogent writing entails at minimum the ability to write a clear and well organized essay of approximately five paragraphs, including an introduction, expansion and exposition, and conclusion, based on logical and evidence based arguments or assertions. All writing assignments should feature proper source utilization and citation.

Graduate Certificate

1: Subject Knowledge
Providing Department: Graduate Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Demonstrated knowledge of and critical thinking about Peace Studies and Security Studies as social science related fields. Peace and Security Studies have traditionally been separate areas of study. The certificate student will become familiar with the approaches and findings in each area and be able to integrate them across the areas.

2: Implication of Boundaries
Providing Department: Graduate Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Awareness of the implications of inter-personal, inter-group and international boundaries and the prerequisites for peaceful relations across such boundaries.
3: Policy Relevant Knowledge
Providing Department: Graduate Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be familiarized with policy models, alternatives, and practices as applied to peace and security issues. Role playing and practicum or internship experience will be required in appropriate courses.

4: Professional writing
Providing Department: Graduate Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will improve their ability to write cogently and professionally, including critical perspectives, on peace and security related topics. Writing may be in the form of policy papers or academic analyses. Analytical papers will be required in all courses, dealing with professional research journals and books, and/or with policy alternatives and selection criteria.

5: Research
Providing Department: Graduate Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Ability to analyze and conduct research at the graduate level on peace and conflict topics. Occasion for such research will take place in reviews of relevant literature as well as in field research or practicum assignments.

Labor Studies Center

BA in Labor Studies

1: Knowledge and Skills
Providing Department: BA in Labor Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
# 1: Students master the knowledge and skills to become professional leaders in
the field of employment and labor relations and human resource management in order to earn successful careers in business, labor, or government. They will demonstrate knowledge of basic concepts in the areas of human resource management, collective bargaining, and the role of unions and the state in employment and labor relations. Such knowledge will be assessed through a short answer assessment instrument.

### 2: Verbal and Oral Presentation Skills

**Providing Department:** BA in Labor Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

They will be able to make clear, professional, substantively meaningful presentations that address questions and problems relevant to the audience. Their proficiency in oral presentation will be assessed through an evaluative instrument applied to their class presentations on their career development plans.

### 3: Career Development

**Providing Department:** BA in Labor Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students develop plans for career enhancement and work toward acquiring the relevant knowledge and skills. These plans will identify realistic goals, steps that can be taken to realize the goals, and how the ELR program can help them meet the goals. Students will also monitor their progress and report on progress as part of their plans of study to their academic advisor.

### Learning Outcome 4: Apply Critical Thinking

**Providing Department:** BA in Labor Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will apply critical thinking to analyze important problems in the field of employment and labor relations. Such thinking involves specifying important problems or questions (e.g., what impact do human resource management compensation policies have on pay equity?); framing how you would collect data to analyze the question, and analyzing the data and reporting the results.
MA in Employment and Labor Relations

#1: Knowledge and Skills
Providing Department: MA in Employment and Labor Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1: Students master the knowledge and skills to become professional leaders in the field of employment and labor relations and human resource management in order to earn successful careers in business, labor, or government. They will demonstrate knowledge of basic concepts in the areas of human resource management, collective bargaining, and the role of unions and the state in employment and labor relations. Such knowledge will be assessed through a short answer assessment instrument.

#2: Verbal and Oral Presentation Skills
Providing Department: MA in Employment and Labor Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will improve their verbal and communications skills. They will be able to make clear, professional, substantively meaningful presentations that address questions and problems relevant to the audience. Their proficiency in oral presentation will be assessed through an evaluative instrument applied to their class presentations on their career development plans.

#3: Career Development
Providing Department: MA in Employment and Labor Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students develop plans for career enhancement and work toward acquiring the relevant knowledge and skills. These plans will identify realistic goals, steps that can be taken to realize the goals, and how the ELR program can help them meet the goals. Students will also monitor their progress and report on progress as part of their plans of study to their academic advisor.
#4: Apply Critical Thinking

Providing Department: MA in Employment and Labor Relations
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will apply critical thinking to analyze important problems in the field of employment and labor relations. Such thinking involves specifying important problems or questions (e.g., what impact do human resource management compensation policies have on pay equity?); framing how you would collect data to analyze the question, and analyzing the data and reporting the results.

College Degree/Minor/Certificate, not based in departments

BS in Public Health

1: BS Public Health Learning Outcome 1_Public Health Foundational Knowledge
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Describe foundational knowledge in public health on a specific topic.

2: BS Public Health Learning Outcome 2_Written Communication
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate audience-appropriate public health content clearly in written form.

3: BS Public Health Learning Outcome 3_Oral Communication
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate audience-appropriate public health content clearly in oral form.
4: BS Public Health Learning Outcome 4 Research & Evaluation Methods
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Summarize methodological techniques in public health to assess, plan, and evaluate.

5: BS Public Health Learning Outcome 5 Data Analysis
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Perform analytic techniques in public health applied to a specific topic.

6: BS Public Health Learning Outcome 6 Fieldwork & Practice
Providing Department: BS in Public Health
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Locate, use, evaluate and synthesize public health information on a specific topic.

Environmental Science

BS in Environmental Science

1.0: Unit Conversions
Providing Department: BS in Environmental Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will correctly apply unit conversions in flow rates, fluxes, and mass balance calculations.

2.0: Ecological Writing
Providing Department: BS in Environmental Science
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will convey ecological concepts effectively in written form.

3.0: Interpreting Figures and Charts
Providing Department: BS in Environmental Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will correctly interpret environmental data and relationships among environmental variables displayed in figures and charts.

4.0: Uncertainty and Error
Providing Department: BS in Environmental Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will quantify uncertainty and propagation of error in environmental calculations.

Gender, Sexuality, and Women’s Studies

Gender, Sexuality, and Women’s Studies Major

BA LO1: BA Learning Outcome 1
Providing Department: Gender, Sexuality, and Women’s Studies Major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate their ability to communicate their arguments effectively in written form.

BA LO2: BA Learning Outcome 2
Providing Department: Gender, Sexuality, and Women’s Studies Major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will situate their analysis of questions within the broader field of GSW
studies to demonstrate the breadth of their knowledge.

BA LO3: BA Learning Outcome 3
Providing Department: Gender, Sexuality, and Women's Studies Major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Drawing from feminist, gender, and queer theory, students demonstrate the ability to engage in their subject theoretically.

BA LO4: BA Learning Outcome 4
Providing Department: Gender, Sexuality, and Women's Studies Major
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate a depth of knowledge in their understanding of the GSW field.

Linguistics

BA in Linguistics

S-1: Syntactic Patterns
Providing Department: BA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Recognize syntactic patterns in English and other languages for which glosses are provided.

S-2: Theoretical Concepts in Syntax
Providing Department: BA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Utilize the theoretical concepts and tools of syntactic theory in order to describe and analyze patterns.
S-3: Syntactic Analysis
Providing Department: BA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze the structure of reasonably complex sentences

S4: Proficiency in articulating the defining properties of human language
Providing Department: BA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
General proficiency in articulating the defining properties of human language.

S5: Patterns of language usage
Providing Department: BA in Linguistics
Start: 9/1/2016
End: 8/31/2018

Learning Outcome Description
The students will be able to recognize and analyze the patterns of language usage as researched in one or more of the following linguistic disciplines: pragmatics/discourse, sociolinguistics, psycholinguistics, anthropological linguistics.

MA in Linguistics

A4.1: Helping students with MA thesis
Providing Department: MA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Writing an MA thesis has proved to be the most challenging job for many of our MA students. Students are faced with issues of finding the proper topic, finding the most helpful faculty, practicing writing, and following the university regulation for filing the thesis. Some students cannot graduate in time, mainly because of the burden and frustration for completing their MA theses.
A4.1: Helping students with MA thesis
Providing Department: MA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Writing an MA thesis has proved to be the most challenging job for many of our MA students. Students are faced with issues of finding the proper topic, finding the most helpful faculty, practicing writing, and following the university regulation for filing the thesis. Some students cannot graduate in time, mainly because of the burden and frustration for completing their MA theses.

S-1: Syntax: Recognize Patterns
Providing Department: MA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Recognize syntactic patterns in English and other languages for which glosses are provided

S-2: Syntax: Theoretical Concepts
Providing Department: MA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Utilize the theoretical concepts and tools of syntactic theory in order to describe and analyze syntactic patterns

S-3: Syntax: Analysis
Providing Department: MA in Linguistics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze the structure of reasonably complex sentences
**S-4: Do scholarly work (MA essay)**

**Providing Department:** MA in Linguistics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Demonstrate ability to produce scholarly work in linguistics through MA essay process

---

**S-4: Do scholarly work (MA essay)**

**Providing Department:** MA in Linguistics  
**Start:** 9/1/2015  
**End:** 6/7/2018

**Learning Outcome Description**  
Demonstrate ability to produce scholarly work in linguistics through MA essay process

---

**S-5: Patterns of Language Usage**

**Providing Department:** MA in Linguistics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
The students will be able to recognize and analyze the patterns of language usage as researched in one or more of the following linguistic disciplines: pragmatics/discourse, sociolinguistics, psycholinguistics, anthropological linguistics.

---

**Philosophy**

**BA in Philosophy**

**1: Content Knowledge**

**Providing Department:** BA in Philosophy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Students will demonstrate knowledge of important themes, figures, problems, and methods in the major areas of philosophy.
2: Analytical Reasoning
Providing Department: BA in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at identifying, constructing, evaluating, and re-constructing arguments.

3: Clarity of Thought and Expression
Providing Department: BA in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at writing (or speaking) in an organized, informed, and precise manner.

4: Research Skill
Providing Department: BA in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at identifying and evaluating relevant sources for the philosophical themes, figures, and problems they explore.

MA in Philosophy

1: Content Knowledge
Providing Department: MA in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate knowledge of important themes, figures, problems, and methods in the major areas of philosophy.
2: **Analytical Reasoning**

**Providing Department:** MA in Philosophy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate skill at identifying, constructing, evaluating, and re-constructing arguments.

---

3: **Clarity of Thought and Expression**

**Providing Department:** MA in Philosophy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate skill at writing (or speaking) in an organized, informed, and precise manner.

---

4: **Research Skill**

**Providing Department:** MA in Philosophy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate skill at identifying and evaluating relevant sources for the philosophical themes, figures, and problems they explore.

---

**PhD in Philosophy**

1: **Content Knowledge**

**Providing Department:** PhD in Philosophy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will demonstrate knowledge of important themes, figures, problems, and methods in the major areas of philosophy.
2: Analytical Reasoning
Providing Department: PhD in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at identifying, constructing, evaluating, and re-constructing arguments.

3: Clarity of Thought and Expression
Providing Department: PhD in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at writing (or speaking) in an organized, informed, and precise manner.

4: Research Skill
Providing Department: PhD in Philosophy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate skill at identifying and evaluating relevant sources for the philosophical themes, figures, and problems they explore.

Physics and Astronomy
BA in Astronomy

1: Demonstrate physical reasoning
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to master the basic concepts of physics.
2: Explain and analyze observations.
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to use conceptual physical and mathematical reasoning to analyze and thus explain physics and astronomy observations.

3: Scientific communication
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate scientific information in an effective and professional manner.

4: Modeling
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use mathematical and computer-based modeling to analyze data and solve moderately complex problems.

5: Experimental Skills
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate proficient experimental design skills to solve technical problems and gather and analyze data involving modern physics and astronomy research techniques.

6: Synthesis
Providing Department: BA in Astronomy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Synthesize knowledge and proficiencies in astronomy, physics, mathematics, chemistry, geology and biology and have familiarity with the interdisciplinary nature of modern
7: Student Success

**Providing Department:** BA in Astronomy

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students who complete the BA in Astronomy degree program should go on to a career in a STEM field.

---

BA in Physics

1: Learning Outcome: Knowledge

**Providing Department:** BA in Physics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Learn about the properties of matter and energy through studies of mechanics, electricity, magnetism, heat, light, and other radiation, and the structure of atoms.

---

2: Learning Outcome: Conceptual Reasoning

**Providing Department:** BA in Physics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Use conceptual-physics and mathematical reasoning to explain and analyze physical systems encountered in laboratory experiments and the physical world.

---

3: Learning Outcome: Communication

**Providing Department:** BA in Physics

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Critically read, write and orally present scientific information in an effective and professional manner.
4: Learning Outcome: Problem Solving  
Providing Department: BA in Physics  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Use mathematical and computer-based modeling to solve moderately complex problems.

5: Learning Outcome: Application  
Providing Department: BA in Physics  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Appreciate the role of quantum and classical mechanics, electricity and magnetism, and relativity in contemporary problems in frontier research.

6: Learning Outcome: Experiment  
Providing Department: BA in Physics  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Demonstrate proficient experimental techniques to gather and critically analyze data involving state-of-the-art physics research techniques.

BS in Biomedical Physics

1: Learning Outcome: Problem Solving  
Providing Department: BS in Biomedical Physics  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Apply laws of physics in solving biomedical physics problems.
2: **Learning Outcome: Reasoning and Analysis**
   **Providing Department:** BS in Biomedical Physics
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Use physical-conceptual and mathematical reasoning to explain and analyze physical systems related to biological and medical problems.

3: **Learning Outcome: Scientific Communication**
   **Providing Department:** BS in Biomedical Physics
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Critically read, write and orally present scientific knowledge in biomedical research area effectively and professionally.

4: **Learning Outcome: Computation and Modeling**
   **Providing Department:** BS in Biomedical Physics
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Use mathematical and computer-based modeling to solve moderately complex problems.

5: **Learning Outcome: Knowledge Synthesis**
   **Providing Department:** BS in Biomedical Physics
   **Start:** 9/1/2017
   **End:** 8/31/2018

   **Learning Outcome Description**
   Synthesize knowledge and proficiencies in physics, mathematics, biology, chemistry and medical technology and appreciate the interdisciplinary nature of modern biomedical science.

6: **Learning Outcome: Experimental Skills**
   **Providing Department:** BS in Biomedical Physics
   **Start:** 9/1/2017
   **End:** 8/31/2018
Learning Outcome Description
Demonstrate proficient experimental design skills to solve technical problems, and
gather and analyze data involving optics, electronics and modern biophysical research

techniques.

BS in Physics

1: Learning Outcome: Knowledge
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learn about the properties of matter and energy through studies of mechanics,
electricity, magnetism, heat, light, and other radiation, and the structure of atoms.

2: Learning Outcome: Reasoning
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Translate the physical description of a problem into equations that can be used to
answer relevant questions.

3: Learning Outcome: Science Communication
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Critically read, write and orally present scientific information in an effective and
professional manner.

4: Learning Outcome: Problem Solving
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Employ mathematical methods needed to solve physics problems:
a. Work analytically and numerically with ordinary and partial differential equations,
linear algebra, calculus of variations, probability and statistics, and other mathematical tools.

b. Visualize problems in terms of relevant sketches or graphs.
c. Recognize when and how to make useful approximations, i.e., which terms in a series expansion are important in a specific physical limit.
d. Recognize when symmetries are useful.

---

5: Learning outcome: Applications
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply knowledge in quantum and classical mechanics, electricity and magnetism, and relativity to contemporary problems in frontier research.

---

6: Learning Outcome: Experiment
Providing Department: BS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate proficient experimental techniques to gather and critically analyze data involving state-of-the-art physics research techniques.

---

MA in Physics

1: Broad knowledge of advanced physics
Providing Department: MA in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must have a broad knowledge of advanced physics.

---

2: Oral Presentation Skills
Providing Department: MA in Physics
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
Students must be able to orally present results of their original research.

---

**3: Written presentation skills**

**Providing Department:** MA in Physics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students must be able to make a written presentation of original research.

---

**4: Time to degree**

**Providing Department:** MA in Physics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students should complete a Masters Of Arts degree in a timely manner.

---

**5: Post MA Employment**

**Providing Department:** MA in Physics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students should achieve a job in the STEM field after completing their MA.

---

**MS in Physics**

**1: Broad knowledge of advanced physics**

**Providing Department:** MS in Physics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students must have a broad knowledge of advanced physics.
2: Oral Presentation Skills
Providing Department: MS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must be able to orally present results of their original research.

3: Written presentation skills
Providing Department: MS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students must be able to make a written presentation of original research.

4: Time to degree
Providing Department: MS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should complete a Masters Of Sciences degree in a timely manner.

5: Original contribution to research
Providing Department: MS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student must make an original contribution to modern physics research.

6: Post MS employment
Providing Department: MS in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should achieve a job in the STEM field after completing their MS.
1: Mastery of Undergraduate Physics
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PhD candidates will demonstrate mastery of the broad knowledge of physics expected of all students who have obtained an undergraduate level physics degree. This includes Classical Mechanics, Electricity and Magnetism, Statistical and Thermal Physics, Quantum Mechanics, and Modern Physics.

2: Planning and Presentation Skills
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PhD candidates have to demonstrate the ability to plan a research project and present the results of research activities.

3: Research Skills
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students have to master the research skills in whichever sub-discipline they are conducting research.

4: Written communication of research.
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PhD students have to demonstrate the ability to communicate in writing the results of original research.
5: Broad knowledge of modern physics research
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PhD students should have a broad knowledge of modern physics research.

6: Original research contribution
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PhD students must make an original research contribution.

7: Success of post-PhD employment
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be working as a STEM researcher in their initial job after the completion of their PhD.

8: Time to PhD
Providing Department: PhD in Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should complete their PhD in a reasonable time frame.

Political Science

BA in Political Science

1: Research
Providing Department: BA in Political Science
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
To access and appropriately invoke scholarly research bearing on issues and topics.

2: Appreciation of Multiple Perspectives
Providing Department: BA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To demonstrate appreciation of competing conceptual approaches to the subject matter.

3: Critical Judgment
Providing Department: BA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To apply critical judgment in assessing accounts and explanations of political phenomena.

4: Expression
Providing Department: BA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To communicate information and argumentation in writing in a clear, logical, and formally correct manner (with appropriate citations).

Bachelor of Public Affairs

1: Research
Providing Department: Bachelor of Public Affairs
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To access and appropriately invoke scholarly research bearing on issues and topics.
2: Appreciation of Multiple Perspectives

Providing Department: Bachelor of Public Affairs
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To demonstrate appreciation of competing conceptual approaches to the subject matter.

3: Critical Judgment

Providing Department: Bachelor of Public Affairs
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To apply critical judgment in assessing accounts and explanations of political phenomena.

4: Expression

Providing Department: Bachelor of Public Affairs
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To communicate information and argumentation in writing in a clear, logical, and formally correct manner (with appropriate citations).

MA in Political Science

1.0: MA Political Science LO 1.0 Statistical Analysis

Providing Department: MA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will understand fundamental concepts in statistics and be able to apply the basics of statistical inference, estimation hypothesis testing and statistical reasoning. They will learn to conduct and interpret statistical analysis with statistical packages (SPSS or STATA).
2.0: MA Political Science - LO 2.0 Research Methods
Providing Department: MA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will identify the basic characteristics of the four major research designs in political science, and apply this knowledge by designing an original research project.

3.0: MA Political Science LO 3.0 Formal academic writing and citation
Providing Department: MA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master skills of formal academic writing and citation. They will communicate information and argumentation in writing in a clear, logical and formally correct manner with good grammar and appropriate citations.

4.1: MA Political Science LO 4.1 Subfield Specialization
Providing Department: MA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
MA students will demonstrate specialized knowledge of the literature in one of six subfields of Political Science: American Politics, Comparative Politics, Political Theory, Public Policy, Urban Politics or World Politics.

4.2: MA Political Science LO 4.2 Subfield Mastery
Providing Department: MA in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate mastery of key literature and concepts in one of six subfields of Political Science: American Politics, Comparative Politics, Political Theory, Public Policy, Urban Politics or World Politics.
1. To lead and manage in public governance

   Providing Department: Master of Public Administration
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   • 1. to lead and manage in public governance;
   •   A. A graduate of our program will be able to understand how both structure and culture of public
       organizations affect organizational effectiveness
   •   B. A graduate of our program will know how to effectively manage human resources and
       provide leadership in this regard

2. To participate in and contribute to the policy process

   Providing Department: Master of Public Administration
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   2. to participate in and contribute to the policy process;
   •   A. A graduate of our program must be able to identify key stakeholders, their positions, coalitions, and
       the political context
   •   B. A graduate of our program must be able to understand and apply the different aspects of the policy
       making cycle

3. To analyze, synthesize, think critically, solve problems and make decisions

   Providing Department: Master of Public Administration
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   • 3. to analyze, synthesize, think critically, solve problems and make decisions;
   •   A. A graduate of our program must be able to utilize scholarly research, data and
       other analytic techniques, and best professional practice, systematically analyzing and
       making decisions on administrative and policy in the public service.
   •   B. A graduate of our program must be able to apply these concepts to a real world
       (substantive) case
4. To articulate and apply a public service perspective;
   Providing Department: Master of Public Administration
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
- 4. to articulate and apply a public service perspective;
  - A. A graduate of our program will be able to make informed decisions and manage public service organizations in the public interest by effectively utilizing and balancing key public administration values
  - B. A graduate of our program will understand the value of fair and transparent administration, and will be able to effectively and ethically engage citizens in public service organizations

5. To communicate and interact productively with a diverse and changing workforce and citizenry.
   Providing Department: Master of Public Administration
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
- 5. to communicate and interact productively with a diverse and changing workforce and citizenry.
  - A. A graduate of our program will have the ability to develop and exercise intercultural sensitivity with employees and other stakeholders
  - B. A graduate of our program will be able to communicate and engage appropriately, effectively, and respectfully with multiple audiences

PhD in Political Science

1.0: PhD Political Science LO 1.0 Statistical analysis
   Providing Department: PhD in Political Science
   Start: 9/1/2017
   End: 8/31/2018

Learning Outcome Description
Students will learn principles of statistical inference, estimation, hypothesis-testing and statistical reasoning. They will learn to conduct and interpret linear and multivariate regression with statistical packages (SPSS or STATA).
2.0: PhD Political Science LO 2.0 Research Methods
Providing Department: PhD in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate mastery of techniques for using quantitative and qualitative methods to test competing hypotheses about problems in politics.

3.1: PhD Political Science LO 3.1 Summarize theory and research
Providing Department: PhD in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will accurately summarize theory and research in their major field of specialization.

3.2: PhD in Political Science LO 3.2 Summarize Theory and Research: Minor fields
Providing Department: PhD in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will accurately summarize core works of theory and research in two minor fields of specialization.

4.0: PhD in Political Science LO 4.0 Research Design
Providing Department: PhD in Political Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will design and carry out independent research.

Psychology
BA in Psychology
1: Knowledge Base in Psychology  
Providing Department: BA in Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students should be able to demonstrate and apply fundamental knowledge and comprehension of the major concepts and theoretical perspectives in psychology.

2: Ethics  
Providing Department: BA in Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students should be able to identify violations of ethical standards in psychological contexts.

3: Writing Style  
Providing Department: BA in Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students should have the ability to write and format papers using APA style.

4: Expression of Ideas  
Providing Department: BA in Psychology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students should be able to write clear, logical, scientific arguments.

5: Research Design  
Providing Department: BA in Psychology  
Start: 9/1/2017  
End: 8/31/2018
Learning Outcome Description
Demonstrate an understanding of common research designs.

6: Research Interpretation
Providing Department: BA in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Draw appropriate conclusions about scientific data using knowledge of research.

BS in Psychology

1: Knowledge Base in Psychology
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to demonstrate and apply fundamental knowledge and comprehension of the major concepts and theoretical perspectives in psychology.

2: Ethics
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to identify violations of ethical standards in psychological contexts.

3: Writing Style
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to write and format papers using APA style.
4: Expression of Ideas
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to write clear, logical, scientific arguments.

5: Research Design
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an understanding of common research designs.

6: Research Interpretation
Providing Department: BS in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Draw appropriate conclusions about scientific data using knowledge of research.

MA in Industrial/Organizational Psychology

1: Application of Psychological Principles
Providing Department: MA in Industrial/Organizational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply psychological principles to the solution or amelioration of organizational problems.
2: Personnel Selection and Placement Establishment
Providing Department: MA in Industrial/Organizational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Establish personnel selection and placement programs in work organizations in accordance with accepted scientific, professional, and legal standards.

3: Performance Management Systems Knowledge
Providing Department: MA in Industrial/Organizational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Design, implement, and evaluate performance management systems in work organizations.

4: Job Training and Development Skills
Providing Department: MA in Industrial/Organizational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Formulate and evaluate employee and management job-relevant training and employee development programs.

5: Organizational Policy and Management Support
Providing Department: MA in Industrial/Organizational Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Design, execute, and present organizational policy and management support research.
1: Knowledge Base
   Providing Department: MA in Psychology
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate knowledge of the broad science of psychology, and deep mastery of one or more chosen subdisciplines.

2: Evaluation Skills
   Providing Department: MA in Psychology
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Critically evaluate research and theory in psychology, including its validity, interpretation, and application.

3: Research Design Skills
   Providing Department: MA in Psychology
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Apply research methods appropriate to the research question.

4: Data Analysis Skills
   Providing Department: MA in Psychology
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Conduct data analysis appropriate to the research question.

5: Research Contributions
   Providing Department: MA in Psychology
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Disseminate research that adds to the body of knowledge in psychology.
6: Communication Skills
Providing Department: MA in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate scientific knowledge effectively to varied audiences, both orally and in writing.

7: Ethics
Providing Department: MA in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will adhere to ethical guidelines for research and professional work as a psychologist, appropriate to their specialty.

PhD in Psychology

1: Knowledge Base
Providing Department: PhD in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of the broad science of psychology, and deep mastery of one or more chosen subdisciplines.

2: Evaluation Skills
Providing Department: PhD in Psychology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Critically evaluate research and theory in psychology, including its validity, interpretation, and application.
3: Research Design Skills
  Providing Department: PhD in Psychology
  Start: 9/1/2017
  End: 8/31/2018

  Learning Outcome Description
  Apply research methods appropriate to the research question.

4: Data Analysis Skills
  Providing Department: PhD in Psychology
  Start: 9/1/2017
  End: 8/31/2018

  Learning Outcome Description
  Conduct data analysis appropriate to the research question.

5: Research Contributions
  Providing Department: PhD in Psychology
  Start: 9/1/2017
  End: 8/31/2018

  Learning Outcome Description
  Disseminate research that adds to the body of knowledge in psychology.

6: Communication Skills
  Providing Department: PhD in Psychology
  Start: 9/1/2017
  End: 8/31/2018

  Learning Outcome Description
  Communicate scientific knowledge effectively to varied audiences, both orally and in writing.

7: Ethics
  Providing Department: PhD in Psychology
  Start: 9/1/2017
  End: 8/31/2018
Learning Outcome Description
Students will adhere to ethical guidelines for research and professional work as a psychologist, appropriate to their specialty.

Sociology

BA in Sociology

1: BA SOCIOLOGY_Learning Outcome 1_Theoretical Knowledge
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Demonstrate knowledge of theoretical foundation in sociology and ability to apply theory to a specific topic.

2: BA SOCIOLOGY_Learning Outcome2_Research Methods
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Demonstrate knowledge of methodological techniques in sociology and ability to apply methodology to a specific topic.

3: BA SOCIOLOGY_Learning Outcome 3_Data Analysis
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. Demonstrate knowledge of data analytic techniques in sociology and ability to apply data analysis technique to a specific topic.

4: BA SOCIOLOGY_Learning Outcome 4_Writing
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
4. Demonstrate ability to write clearly in sociological style, including logical and compelling arguments.

5: BA SOCIOLOGY_Learning Outcome 5_Source Use
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
5. Uses sources appropriately, including sources that are credible and relevant, ability to paraphrase, and appropriate citations.

6: BA SOCIOLOGY_Learning Outcome 6_Critical Thinking
Providing Department: BA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
6. Demonstrate ability to think critically about social issues.

MA in Sociology

1: MA SOCIOLOGY_Learning Outcome 1_Foundational Knowledge
Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Describe foundational knowledge in sociology applied to a topic.

2: MA SOCIOLOGY_Learning Outcome 2_Research Methods
Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Summarize methodological techniques in sociology evaluating a specific topic.
3: MA SOCIOLOGY_Learning Outcome 3_Data Analysis

Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. Perform analytic techniques in sociology applied to a specific topic.

4: MA SOCIOLOGY_Learning Outcome 4_Written Communication

Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4. Communicate clearly in a sociological writing style on a specific topic.

5: MA SOCIOLOGY_Learning Outcome 5_Contributions

Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
5. Generate original contributions to the discipline.

6: MA SOCIOLOGY_Learning Outcome 6_Oral Communication

Providing Department: MA in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
6. Communicate clearly in oral presentation on a specific topic.

PhD in Sociology

1: PhD SOCIOLOGY_Learning Outcome 1_Foundational Knowledge

Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Describe theoretical foundational knowledge in sociology applied to a specific topic.

2: PhD SOCIOLOGY_Learning Outcome 2_Research Methods
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Summarize methodological techniques in sociology evaluating a specific topic.

3: PhD SOCIOLOGY_Learning Outcome 3_Data Analysis
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Perform analytic techniques in sociology applied to a specific topic.

4: PhD SOCIOLOGY_Learning Outcome 4_Written Communication
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate clearly in a sociological writing style on a specific topic.

5: PhD SOCIOLOGY_Learning Outcome 5_Contributions
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Generate original contributions to the discipline.
6: PhD SOCIOLOGY_Learning Outcome 6_Oral Communication
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Communicate clearly in a sociological in oral presentation on a specific topic.

7: PhD SOCIOLOGY_Learning Outcome 7_Substantive Area
Providing Department: PhD in Sociology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate knowledge of a substantive specialization.

Urban Studies and Planning
BA in Urban Studies

1a: Program Learning Outcome 1a - Content-Driven Knowledge
Providing Department: BA in Urban Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Urban Studies Program graduates shall know:

US1a - Theories on how to view the city, including distinctive perspectives and analytic insights each of the core disciplines (GPH, HIS, PS, SOC and US) provides about urban areas.

Assessment method: Capstone course questionnaire (see Assessment section); relevant exam and quiz grades in GPH3130 and US4510

1b: Program Learning Outcome 1b - Content-Driven Knowledge
Providing Department: BA in Urban Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Urban Studies Program graduates shall know:

**US1b** - The *history of urbanization* and its associated economic processes. This includes histories of ancient settlements, post-Renaissance cities, and post-Industrial Revolution cities.

Assessment method: Capstone course questionnaire; relevant exam and course grades in GPH 3130 and US4510

---

2a: Program Learning Outcome 2a - Competencies

**Providing Department:** BA in Urban Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Urban Studies Program graduates shall be able to:

**US2a** - *Demonstrate written and oral competencies* in the analysis of urban issues and policy, including the completion of the writing intensive (WI) capstone course, involving several significant writing assignments and oral presentation of completed work.

Assessment method: Capstone course questionnaire; assignment grades in US4620 for final written and oral presentations

---

2b: Program Learning Outcome 2b - Competencies

**Providing Department:** BA in Urban Studies  
**Start:** 9/1/2017  
**End:** 8/31/2018

Learning Outcome Description
Urban Studies program graduates shall be able to:

**US2b** - *Retrieve and analyze* economic, demographic, and research data, including primary and secondary data sources.

Assessment method: Capstone course questionnaire; course grades and assignment grades in US5820, GPH3600, and research methods program requirement
Graduate Certificate in Economic Development

Learning Outcome 1: Theory and Practice of Urban Economic Development
Providing Department: Graduate Certificate in Economic Development
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Theory and Practice of Urban Economic Development
Students will be able to describe basic concepts, policies, and practices to enhance local economies and their strengths and weaknesses.

Learning Outcome 2: Economic Development Policy, Politics, and Institutions
Providing Department: Graduate Certificate in Economic Development
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Economic Development Policy, Politics, and Institutions
Students will be able to analyze policies, institutions, and processes (and their interactions) related to labor and employment relations in the private or public sectors, or as they may relate to other urban policy areas that affect and are affected by economic development, such as housing, education, or place-based development.

Learning Outcome 3: Economics and Finance of Economic Development
Providing Department: Graduate Certificate in Economic Development
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. Economics and Finance of Economic Development
Students will be able to describe and apply basic concepts and methods of urban economics and public finance.

Learning Outcome 4: Economic Development Management and Analysis Techniques
Providing Department: Graduate Certificate in Economic Development
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4. Economic Development Management and Analysis Techniques
Students will be able to analyze and apply principles and procedures of economic
development management in public or private settings, including as they may relate to real estate development, financial management, or evaluation.

Master of Urban Planning

**MUP LO #1: MUP Learning Outcome #1 (General Planning Knowledge)**
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Students have knowledge about the basic purpose and meaning of planning. This includes knowledge of the evolution and history of planning, its rationales, purposes, and significant successes and failures in US contexts; relationship of planning to society, economy, and governance; and basic tools of planning.

**MUP LO #2: MUP Learning Outcome #2 (General Planning Knowledge)**
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Students have knowledge about theories of planning. This includes knowledge of planning contexts and problems; relationship of politics, and rationales for and methods of community participation in planning; planning models; ethical dimensions of planning practice; and relationship between planning field, profession, practice.

**MUP LO #3: MUP Learning Outcome #3 (Planning Skills)**
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. Students are competent in the application of quantitative and qualitative methods in the analysis of planning problems.

**MUP LO #4: MUP Learning Outcome #4 (Planning Skills)**
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
4. Students are knowledgeable about and have skills to develop and implement plans and policies, including components of comprehensive plans.

MUP LO #5: MUP Learning Outcome #5 (Values and Ethics)
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
5. Students diagnose and apply professional ethical principles in everyday planning processes.

MUP LO #6: MUP Learning Outcome #6 (Values and Ethics)
Providing Department: Master of Urban Planning
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
6. Students incorporate and nurture in their planning practice, core values associated with community participation and collaborative processes in democratic governance.

College of Nursing
Graduate Certificate Program in College of Nursing
Graduate Certificate in Acute Care Nurse Practitioner

1.0: Scientific Findings and Quality Improvement
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Demonstrate skill in translating and integrating scientific findings and quality improvement principles to provide safe acute and critical care management of the adult-gerontological patient population health/illness status through health promotion, health protection, disease prevention, and treatment.
2.0: Interprofessional Teams
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Carry out interpersonal transactions to manage and coordinate care with the adult-gerontological patient population and interprofessional teams as a member and a leader to achieve therapeutic patient outcomes.

3.0: Teaching/Coaching
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competently use the teaching-coaching function through imparting knowledge and skills to the adult-gerontological patient population, as well as interpreting and individualizing therapies.

4.0: Advocacy and Policy Development
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Formulate a position on the Adult-Gerontology Acute Care Nurse practitioner role in the policy development process and employment of advocacy strategies to advance the profession and influence health and health care of the adult-gerontological population.

5.0: Communication and Coordination of Care
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Skillfully use patient-care and communication technologies to deliver, enhance, integrate, and coordinate care in the Acute and Critical Care delivery systems.

6.0: Monitoring and ensuring quality of care
Providing Department: Graduate Certificate in Acute Care Nurse Practitioner
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Assume responsibility for monitoring and ensuring the quality of healthcare practice that is developmentally, culturally, spiritually, and ethically appropriate with respect for the adult-gerontological population.

Graduate Certificate in Complementary Therapies in Healthcare

1.0: Assess, guide, and evaluate CAM
Providing Department: Graduate Certificate in Complementary Therapies in Healthcare
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the end of the certificate program, the student will be able to assess, guide and evaluate CAM use in their patient/client populations using knowledge of complementary therapies, alternative medical systems (whole systems of care) and integrative system models of healthcare, thereby promoting safety and positive health outcomes.

2.0: Integrate CAM into practice
Providing Department: Graduate Certificate in Complementary Therapies in Healthcare
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the end of the certificate program, the student will be able to integrate selected complementary therapies into their nursing/healthcare plan within the context of evidence-based practice.

3.0: Develop competency in CAM
Providing Department: Graduate Certificate in Complementary Therapies in Healthcare
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the end of the certificate program, the student will be able to develop competency in skills related to selected CAM therapies covered in the course content.

4.0: Philosophical and historical underpinnings of CAM
Providing Department: Graduate Certificate in Complementary Therapies in Healthcare
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
Students will understand and apply philosophical and historical underpinnings of CAM within a multicultural framework.

---

**5.0: Supporting research**
**Providing Department:** Graduate Certificate in Complementary Therapies in Healthcare  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will understand and apply research supporting the evidence-base of selected CAM therapies.

---

**6.0: Prevalence and purpose of CAM**
**Providing Department:** Graduate Certificate in Complementary Therapies in Healthcare  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will understand and apply prevalence and purpose for use of CAM providers, practices and products for health promotion and wellness, illness prevention, and symptom management related to chronic illness.

---

**7.0: Integrating CAM into practice**
**Providing Department:** Graduate Certificate in Complementary Therapies in Healthcare  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will understand and apply selected CAM therapies that can be integrated into professional nursing practice.

---

**8.0: Ethical and legal implications**
**Providing Department:** Graduate Certificate in Complementary Therapies in Healthcare  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will understand and apply ethical and legal implications of CAM therapy use, movement toward integrative care, and influence on conventional health care delivery in the U.S.
Graduate Certificate in Nurse Midwifery

1.0: Demonstrate Competence
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate competence in the clinical practice of midwifery as characterized by the Core Competencies for Basic Midwifery Practice 2012 (American College of Nurse Midwives, 2012)

2.0: Practice Collaboratively
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Practice collaboratively within the healthcare system while providing primary care to women and newborns.

3.0: Adapt healthcare interventions
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use midwifery knowledge, innovation, creativity and cultural competence to adapt healthcare interventions based on the interrelationships among person, environment and health.

4.0: Analyze and evaluate effectiveness of healthcare interventions
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze current knowledge for midwifery practice, evaluate effectiveness of health care interventions and use evidence-based care in clinical practice
5.0: Advance Knowledge
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Engage in scholarly activity to advance knowledge in women's health, newborn and midwifery care and collect accurate and clinical practice data/statistics.

6.0: Provide leadership
Providing Department: Graduate Certificate in Nurse Midwifery
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Provide leadership in women's health care through active involvement in professional organizations, clinical teaching, and political awareness/involvement.

Graduate Certificate in Nursing Education

1.0: Formulate a conceptual framework
Providing Department: Graduate Certificate in Nursing Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the GCNE, the student will formulate a conceptual framework of the teaching-learning process.

2.0: Analyze concepts and theories
Providing Department: Graduate Certificate in Nursing Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the GCNE, the student will analyze concepts and theories relevant to cognitive, affective and psychomotor learning, the teaching process, and instructional methods.
3.0: Measurement, analysis, evaluation and grading.
Providing Department: Graduate Certificate in Nursing Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the GCNE, the student will utilize concepts of measurement, analysis, evaluation and grading by analyzing results of evaluation strategies.

4.0: Role of the teacher
Providing Department: Graduate Certificate in Nursing Education
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the GCNE, the student will examine the role of the teacher in nursing in varied settings and situations.

Graduate Certificate in Pediatric Nurse Practitioner-Acute Care

1.0: Demonstrate competence
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate competence in Acute Care Pediatric Nurse Practitioner clinical practice as characterized by the Nurse Practitioner Core Competencies (NONFP, 2012) and Population-Focused Nurse Practitioner Competencies-Pediatric Acute Care (NONPF, 2013).

2.0: Practice collaboratively
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Practice collaboratively within the health care system while providing care to infants, children, and adolescents with complex acute, critical, and chronic health conditions and families.
3.0: Adapt healthcare interventions
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use knowledge, innovation, creativity and cultural competence to adapt healthcare interventions based on the interrelationships among person, environment and health.

4.0: Analyze and evaluate effectiveness
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze current knowledge for acute care pediatric nurse practitioner practice, evaluate effectiveness of health care interventions, and use evidence-based care in clinical practice.

5.0: Scholarly activity
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Engage in scholarly activity to advance knowledge in pediatric acute care and collect accurate outcome and clinical practice data/statistics.

6.0: Provide leadership
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Acute Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Provide leadership in pediatric acute healthcare through active involvement in professional organizations, clinical teaching, and political awareness/involvement.
1.0: Demonstrate competence
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate competence in pediatric Nurse Practitioner primary care clinical practice as characterized by the Nurse Practitioner Core Competencies (NONFP, 2012) and Population-Focused Nurse Practitioner competencies-Pediatric Primary Care (NONFP, 2013)

2.0: Practice Collaboratively
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Practice collaboratively within the health care system while providing care to infants, children, adolescents, and families.

3.0: Adapt healthcare interventions
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use knowledge, innovation, creativity and cultural competence to adapt healthcare interventions based on the interrelationships among person, environment and health.

4.0: Analyze and evaluate health care
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze current knowledge for primary care pediatric nurse practitioner practice, evaluate effectiveness of health care interventions, and use evidence-based care in clinical practice.

5.0: Scholarly activity
Providing Department: Graduate Certificate in Pediatric Nurse Practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Engage in scholarly activity to advance knowledge in pediatric primary care and collect accurate outcome and clinical practice data/statistics.

6.0: Provide leadership
Providing Department: Graduate Certificate in Pediatric Nurse practitioner-Primary Care
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Provide leadership in pediatric primary healthcare through active involvement in professional organizations, clinical teaching, and political awareness/involvement.

Nursing - BSN

1.0: Integrates knowledge in nursing care
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Integrates knowledge of health promotion, health restoration and supportive measures in management of nursing care of individuals, families and communities in diverse populations.

2.0: Evaluates healthcare
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Systematically evaluates the processes and outcomes of healthcare using established criteria.

3.0: Critical reasoning
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Integrates critical reasoning skills in the application of theoretical knowledge and research.
evidence in professional nursing practice.

4.0: Innovations and Technology
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Utilizes innovations and technology in planning, delivering, and evaluating nursing care and nursing care outcomes.

5.0: Effective communication skills
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrates effective communication skills across the spectrum of nursing care.

6.0: Values and Ethics
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrates behaviors that reflect internalization of values and ethics of professional nursing.

7.0: Cultural Competence
Providing Department: Nursing - BSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrates cultural competence in care of diverse populations.
1.0: Disseminate scholarly work to professional and lay audiences
Providing Department: Nursing (PhD)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
By the completion of the program, PhD students will be able to write articles for publication.

Students will also disseminate scholarly work through presentations at conferences.

2.0: Demonstrate Advanced Knowledge
Providing Department: Nursing (PhD)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate advanced knowledge and skills in the design, conduct, and analysis of studies in nursing and urban health.

3.0: Research proposals
Providing Department: Nursing (PhD)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
At the completion of the PhD program, the student will be able to develop a research proposal.

4.0: Conduct Original Research
Providing Department: Nursing (PhD)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will conduct original research with an urban health focus.
1.0: Provide advance practice nursing care
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will provide advance practice nursing care to individuals, families, and/or populations that is ethical and science-based.

2.0: Develop and initiate new innovative practice approaches
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will develop and initiate new innovative practice approaches based on theories from nursing and other disciplines.

3.0: Evaluate accessibility and quality of care
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will analyze, synthesize and evaluate accessibility and quality of care across diverse, underserved and vulnerable populations.

4.0: Utilize determinants of health
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will utilize the determinants of health for individuals and/or aggregates/communities for diverse, underserved and vulnerable populations.

5.0: Appraise, disseminate, and translate science
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will critically appraise, disseminate and translate science to advance the quality
and accessibility of care.

6.0: Demonstrate advanced clinical investigative competencies to evaluate outcomes and systems.
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate advanced clinical investigative competencies to evaluate clinical outcomes and systems of care.

7.0: Use information technology
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will use information technology in design, selection, use and evaluation of programs to advance the accessibility of care.

8.0: Innovative technological advancement
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will critically appraise, disseminate and translate innovative technological advancement to improve the quality and accessibility of care.

9.0: Leadership in communication and collaboration
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will demonstrate leadership in communication and collaborative skills as agents of change that improves accessibility to quality healthcare for diverse, underserved and vulnerable populations.
10.0: Analyze clinical patterns and delivery approaches
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will analyze emerging clinical patterns and develop delivery approaches to care that deals with complex problems within the practice settings, healthcare organizations, and communities.

11.0: Shape the healthcare policy debate
Providing Department: Nursing Practice (DNP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will shape the healthcare policy debate.

Nursing Undergraduate Curriculum Committee

Integrative strategy 2: Practice with theory
Providing Department: Nursing Undergraduate Curriculum Committee
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Nursing UG curriculum integrates practice with theory.

Use integrative strategies in Essential I: Liberal education
Providing Department: Nursing Undergraduate Curriculum Committee
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Nursing UG curriculum integrates liberal education throughout its components.
1.0: Practices advanced nursing from a holistic, evidence-based perspective.
Providing Department: Nursing-MSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The graduate of the MSN Program practices advanced nursing from a holistic, evidence-based perspective that is ethically, culturally congruent and economically sound.

2.0: Develops skills for leadership and quality improvement.
Providing Department: Nursing-MSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The graduate of the MSN Program develops skills for leadership and quality improvement in complex organizational systems.

3.0: Analyzes informatics and technology
Providing Department: Nursing-MSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The graduate of the MSN Program analyzes the impact of informatics and technology on the delivery and outcomes of healthcare in diverse settings.

4.0: Healthcare policies and patient advocate
Providing Department: Nursing-MSN
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The graduate of the MSN Program implements healthcare policies and advocates for patients and the nursing profession through interaction with organizational, local, state, and/or federal-level policy makers.

5.0: Interdisciplinary advance nursing practice
Providing Department: Nursing-MSN
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
The graduate of the MSN Program, in collaboration with interdisciplinary colleagues, practices advanced nursing that focuses on health-promoting and risk-reduction interventions to achieve optimal patient and population health outcomes.

Eugene Applebaum College of Pharmacy and Health Sciences

Fundamental and Applied Sciences

Bachelor of Health Science

Learning Outcome 1: Oral Communication Skills
Providing Department: Bachelor of Health Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Bachelor of Health Sciences degree program will demonstrate effective oral communication skills necessary for future client interactions.

Learning Outcome 2: Written Communication Skills
Providing Department: Bachelor of Health Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Bachelor of Health Sciences degree program will demonstrate effective written communication skills necessary for future practice.

Learning Outcome 3: Patient Safety
Providing Department: Bachelor of Health Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understand basic principles of patient safety in the community and hospital practice setting.
Learning Outcome 4: Health Care Systems

Providing Department: Bachelor of Health Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Describe the influences and components of United States health care systems and/or discipline specific professional organizations within the health care system.

BS, Clinical Laboratory Science

1: CLS Program Learning Outcome #1

Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #1: Clinical Laboratory Science program graduates will demonstrate entry-level knowledge necessary to perform the full range of clinical laboratory testing.

2: CLS Program Learning Outcome #2

Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #2: Clinical Laboratory Science program graduates will apply principles and practices of professional conduct.

3: CLS Program Learning Outcome #3

Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #3: Clinical Laboratory Science program graduates will apply safety regulations and standards as appropriate to clinical laboratory science.
4: CLS Program Learning Outcome #4
Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #4: Clinical Laboratory Science program graduates will communicate appropriately with members of the health care team.

5: CLS Program Learning Outcome #5
Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #5: Clinical Laboratory Science program graduates will apply principles and practices of management and supervision as appropriate to clinical laboratory science.

6: CLS Program Learning Outcome #6
Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #6: Clinical Laboratory Science program graduates will utilize educational methodologies and terminology sufficient to train/educate users and providers of laboratory services.

7: CLS Program Learning Outcome #7
Providing Department: BS, Clinical Laboratory Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #7: Clinical Laboratory Science program graduates will apply principles and practices of clinical study design, implementation, and dissemination of results.
1: Funeral Arrangements
Providing Department: BS, Mortuary Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate proper practices in funeral arranging by applying knowledge of the types of ceremonies and methods of final disposition, merchandising, and trends.

2: Preparation of Remains
Providing Department: BS, Mortuary Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate an ability to prepare human remains through embalming and other preparation and presentation skills.

3: Grief Applications
Providing Department: BS, Mortuary Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Relate principles of the grief process and sociology to approaches and methods of interaction with the bereaved.

4: Legal, Ethical, & Business Standards
Providing Department: BS, Mortuary Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply legal, ethical, and business standards to funeral service practice.

BS, Pathologists Assistant

1.2: PA Learning Outcome #1
Providing Department: BS, Pathologists Assistant
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
SLO #1: Graduates of the Pathologists' Assistant program will demonstrate entry level competency in general and systemic Pathology.

2.2: PA Learning Outcome #2
Providing Department: BS, Pathologists Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #2: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in anatomic pathology techniques.

3.2: PA Learning Outcome #3
Providing Department: BS, Pathologists Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #3: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in gross and normal microscopic anatomy.

4.2: PA Learning Outcome #4
Providing Department: BS, Pathologists Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #4: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in autopsy pathology techniques.

5.2: PA Learning Outcome #5
Providing Department: BS, Pathologists Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #5: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in laboratory regulation, compliance, management and safety associated with anatomic pathology.
Learning Outcome #1 PBFI

Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: Upon completion of the PBFI program, graduates will be able to describe the legal/ethical and operational parameters of a forensic investigation specialist.

Learning Outcome #2 PBFI

Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the program, graduates will be able to describe specimen collection techniques that meet protocol specifications.

Learning Outcome #3 PBFI

Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the PBFI program, graduates will assess forensic case studies.

Learning Outcome #4 PBFI

Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the PBFI program, graduates will assess quality control measures as found in forensic laboratory compliance.

Learning Outcome #5 PBFI

Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Upon Completion of the PBFI program, graduates will design and assess functionality and responsiveness of contemporary medicolegal laboratories.

6: Learning Outcome #6 PBFI
Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the PBFI program, graduates will assist the criminal justice system with cognitive development in interview and interrogation techniques.

7: Learning Outcome #7 PBFI
Providing Department: Certificate, Post-Bachelor’s Forensic Investigation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Upon completion of the PBFI program, graduates will assist the criminal justice system in firearm evidence collection and evaluation including identification, ballistics and explosive materials.

MS in Pathologists’ Assistant

LO1: PAA Learning Outcome #1
Providing Department: MS in Pathologists’ Assistant
Start: 9/1/2017
End: 8/30/2018

Learning Outcome Description
SLO #1: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in General and Systemic Pathology.

LO2: PAA Learning Outcome #2
Providing Department: MS in Pathologists’ Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #2: Graduates of the Pathologists’ Assistant program will demonstrate entry level
competency in anatomic pathology techniques.

LO3: PAA Learning Outcome #3
Providing Department: MS in Pathologists' Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #3: Graduates of the Pathologists' Assistant program will demonstrate entry level competency in gross and normal microscopic anatomy.

LO4: PAA Learning Outcome #4
Providing Department: MS in Pathologists' Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #4: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in adult, neonatal, pediatric, and medicolegal autopsy pathology techniques.

LO5: PAA Learning Outcome #5
Providing Department: MS in Pathologists' Assistant
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SLO #5: Graduates of the Pathologists’ Assistant program will demonstrate entry level competency in laboratory regulation, compliance, management, safety, and infection control operations associated with anatomic pathology.

Health Care Sciences

BS, Radiation Therapy Technology

1: Learning Outcome 1 - Clinical Competency
Providing Department: BS, Radiation Therapy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate clinical competency.
“Equipment and treatment room activities”

“Patient alignment skills”

2: Learning Outcome 2 - Oral Communication
Providing Department: BS, Radiation Therapy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate effective oral communication skills.

3: Learning Outcome 3 - written communication
Providing Department: BS, Radiation Therapy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate effective written communication skills.

4: Learning Outcome 4 - awareness of patient needs
Providing Department: BS, Radiation Therapy Technology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate awareness of patient needs and concerns.

BS, Radiological Technological

Goal 1: Problem Solving/Critical Thinking
Providing Department: BS, Radiological Technological
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student /graduate will demonstrate problem-solving and critical thinking skills in the clinical arena.
Goal 2: Clinical Competence  
Providing Department: BS, Radiological Technological  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
The student/graduate will demonstrate clinical competence, producing image of diagnostic quality and enhancing the delivery of health care to the community.

Goal 3: Communication skills  
Providing Department: BS, Radiological Technological  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
The graduate will be able to demonstrate effective written and oral communication skills.

Goal 4: Professionalism  
Providing Department: BS, Radiological Technological  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
The student/graduate will exhibit professionalism.

DPT, Physical Therapy  
1: Communication (Verbal)  
Providing Department: DPT, Physical Therapy  
Start: 9/1/2017  
End: 8/31/2018  
Learning Outcome Description  
Graduates of the Doctor of Physical Therapy Program will be able to effectively use verbal communication while speaking in a culturally competent manner with peers and other interdisciplinary team members.
2: Physical Therapy Examination
Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will be able to examine patients/clients using culturally appropriate and age-related tests and measure.

3: Physical Therapy Interventions
Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will demonstrate the ability to appropriately select physical therapy interventions to achieve patient / client goals and outcomes and then administer these interventions in a manner that is sensitive to clients from of a variety of demographic backgrounds.

4: Safe Practice
Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will practice physical therapy in a manner that minimizes risks to patient, self, and others. Sample behaviors are as follows: demonstrates awareness of of contraindications and precautions of patient interventions, establishes and maintains a safe working environment, and uses acceptable techniques for safe handling of patients.

5: Professional Behavior
Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will practice physical therapy in a manner that demonstrates professional behavior in all situations. Sample behaviors are as follows: is punctual and dependable, demonstrates integrity in all interactions, accepts feedback without defensiveness, and values the dignity of patients as individuals.
6: Accountability

Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will practice physical therapy in a manner that is consistent with established legal and professional standards and ethical guidelines. Sample behaviors are as follows: places patient’s needs above self interests, takes steps to remedy errors in a timely fashion, maintains patient confidentiality, and adheres to legal practical standards.

7: Situational Communication

Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will practice physical therapy in a manner that demonstrates communication in ways that are congruent with situational needs. Sample behaviors are as follows: initiates communication in difficult situations, selects the most appropriate person(s) with whom to communicate, interprets and responds to the non-verbal communication of others, and adjusts style of language based upon target audience.

8: Clinical Reasoning

Providing Department: DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy Program will practice physical therapy in a manner that applies current knowledge, theory, clinical judgment, and the patient’s values and perspectives in patient management. Sample behaviors are as follows: presents a logical rationale for clinical decisions, makes a clinical decision without the context of ethical practice, demonstrates an ability to make clinical decisions in ambiguous situations, and assesses patient response to interventions using credible measures.

MOT, Occupational Therapy
1: Learning Outcome 1 - Occupational Therapy Process Knowledge  
Providing Department: MOT, Occupational Therapy  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
By the end of course work prior to Level II Fieldwork, students will demonstrate competency regarding factors that influence occupational performance with clients/patients throughout the occupational therapy process.

2: Learning Outcome 2 - Occupational Therapy Intervention Plan  
Providing Department: MOT, Occupational Therapy  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
By the end of course work prior to level II Fieldwork, students will demonstrate that they can formulate conclusions regarding client needs and priorities to develop and monitor an intervention plan throughout the occupational therapy process.

3: Learning Outcome 3 Service Learning  
Providing Department: MOT, Occupational Therapy  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Service learning—students engage in several learning assignments at various physical disability and mental health settings for level 1 fieldwork experiences to fulfill program requirements. Courses OT 3200, OT 4280, OT 4600, OT 6000

4: Learning Outcome 4 Community Engagement  
Providing Department: MOT, Occupational Therapy  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Community Engagement—students required to volunteer time in a variety of community mental health settings, clinical physical disability settings that provide services for underserved and vulnerable populations and write reflection pieces at the end of the course to enhance learning and address our urban mission. Courses OT 3200, OT 4400 and OT 5050
Learning Outcome 1: Pre-Operative Assessment

Providing Department: MS, Nurse Anesthesia
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Title: Nurse Anesthesia LO 1.0 Preparation of the Surgical Patient

Progress: In Progress

Providing Department: Nurse Anesthesia

Learning Outcome Description:
Students will accurately analyze preoperative patient data to devise a comprehensive anesthetic plan.

Assessment Method:

Data Source: A clinical instructor completes a daily, written evaluation of the student’s clinical performance using the Performance Assessment Instrument (PAI). The PAI is a specific Nurse Anesthesia clinical evaluation tool designed with different levels of performance expectations ranging from simple to complex (Practicum II-IV). The PAI has four subsections to assess clinical performance, and preparation is one of the subsections for assessment. The following assessment criteria are stated on the PAI and used to assess preparation.

Preparation

• Routine equipment for case available and functioning: Yes No
• Machine check: Yes No
• Cart stocked and table top appropriately set-up: Yes No
• Specialized equipment for case available
• Preoperative assessment / selects appropriate ASA status
• ACP: Written Verbal
• Knowledgeably discusses and provides rationale for ACP
Supporting Documentation:
Performance Assessment Instrument (Practicum II-III)
Performance Assessment Instrument (Practicum IV-VI)

Data Scoring: The PAI is composed of a numerical scale, an area for written documentation and the Evaluation Scale (measurement for Performance criteria)

3 = The student’s clinical performance exceeds the practicum objectives.
2 = The student’s clinical performance meets the practicum objectives and is commensurate with their levels in the program
1 = The student requires significant assistance in meeting the practicum objectives. Clinical performance is unsatisfactory.

The Evaluation Chair of the WSU Nurse Anesthesia Program reviews the documentation from on a weekly basis, rates the comments using the evaluation scale and uses the data from the summary evaluation prior to meeting with each student at midterm evaluation. At midterm, each student their clinical performance and areas in need of improvement prior to completion of the practicum. The Program Director reviews all the evaluations to determine the effectiveness of program.

Successful completion of the clinical practicum objectives must be demonstrated for advancement to the subsequent practicum. Students who are not successful in meeting the required clinical practicum objectives at the end of the practicum will receive an “I” (Incomplete) on their summative form with directions acceptable performance.

Supporting Documentation:
Performance Assessment Instrument (Practicum II-III)
Performance Assessment Instrument (Practicum IV-VI)

Learning Outcome 2: Technical Skills
Providing Department: MS, Nurse Anesthesia
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Number: LO 2.0

**Title:** Nurse Anesthesia LO 2.0 Technical Skills

**Progress:** In Progress

---

**Providing Department:** Nurse Anesthesia

**Learning Outcome Description:**
Students will perform technical skills with competency and utilizing appropriate standards.

---

**Learning Outcome 3: Learning Outcome 3**

**Providing Department:** MS, Nurse Anesthesia

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Identify and set up specialized anesthesia equipment according to the required surgical needs and as required for best patient outcomes.

---

**Learning Outcome 4: Patient Data**

**Providing Department:** MS, Nurse Anesthesia

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Use selective patient data to individualize and implement and anesthetic plan according to standard of care for best practice.
1: Evidence-based medicine and scientific principles
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician assistant students will use evidence-based medicine and scientific principles when making management decisions in patient care. The foundation will be taught to students in the didactic year and they will demonstrate and apply these skills in the clinical rotations during the second year of the program.

2: History, physical, and diagnostic findings to formulate differential diagnosis
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician Assistant students will be able to take a medical history, perform appropriate physical examination, and use diagnostic findings to formulate a differential diagnosis.

3: Communication with patients
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician Assistant students will develop the skills to effectively communicate with patients. The basic skills will be developed during the first year of the program. During the clinical rotations students will be able to apply these skills to patient care.

4: Interprofessional relations
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician Assistant students will work with other healthcare professionals to provide patient-centered care.

5: Compassionate care
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Physician Assistant students will demonstrate compassion and respectful behaviors with patients.

6: Professional Relationships
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician Assistant students will maintain a positive professional relationship with other professionals

7: Professional integrity
Providing Department: MS, Physician Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Physician Assistant Students will demonstrate respect, compassion and integrity while providing patient care.

MS, Radiological Assistant Studies

Learning Outcome 1: Problem Solving Skills
Providing Department: MS, Radiological Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate problem solving skills during their radiologists' assistant clinical experience.

Learning Outcome 2: Oral Communication
Providing Department: MS, Radiological Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective oral communication.
Learning Outcome 3: Patient Assessment
Providing Department: MS, Radiological Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate appropriate assessment of a patient.

Learning Outcome 4: Radiation Safety
Providing Department: MS, Radiological Assistant Studies
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate appropriate radiation safety techniques during patient exams/procedures.

Post-master certificate, Pediatric Anesthesia (Fellowship)

1: Learning Outcome 1
Providing Department: Post-master certificate, Pediatric Anesthesia (Fellowship)
Start: 5/30/2018
End: 12/28/2018

Learning Outcome Description
- Learner Outcome: LO I: Patient Care Clinical Skills
  - Integrate theoretical foundation of specific disease processes in infants and children to devise a practice care plan that will achieve the desired patient care outcomes following anesthesia for surgery
  - Evaluate patient care outcomes to determine effectiveness of the choice of anesthetic plan for the specific case

2: Learning Outcome 2
Providing Department: Post-master certificate, Pediatric Anesthesia (Fellowship)
Start: 5/30/2018
End: 12/28/2018

Learning Outcome Description
- Learner Outcome: LO II: Interpersonal and Communication Skills
  - Use specific language and or terms to facilitate clear understanding of the anesthetic
plan by the child and parent during the peri-operative period of patient assessment and preparation for surgery
  ○ Demonstrate professionalism in discussing anesthetic plans with the supervising instructor for the case

3: Learning Outcome 3
Providing Department: Post-master certificate, Pediatric Anesthesia (Fellowship)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Select and implement an anesthetic plan according to the patient disease process, and the extent of the surgical intervention.

4: Learning Outcome 4
Providing Department: Post-master certificate, Pediatric Anesthesia (Fellowship)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective listening and communication skills when interacting with age appropriate adolescent in preparation for surgical procedure.

Transitional DPT, Physical Therapy

1: Professional Duty
Providing Department: Transitional DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy transitional program will develop a self-exploration portfolio to improve the effectiveness of patient / client care.

2: Evidence-Based Practice
Providing Department: Transitional DPT, Physical Therapy
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Graduates of the Doctor of Physical Therapy transitional program will critically evaluate
sources of information related to physical therapy practice, research, or education and apply knowledge from these sources to appropriate populations. Each student will select practice, research, or education based upon their practice setting.

### 3: Clinical Reasoning Skills
**Providing Department:** Transitional DPT, Physical Therapy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Graduates of the Doctor of Physical Therapy transitional program will demonstrate clinical reasoning skills in the area of diagnostic procedures as evident in the written case study reports submitted in PT 8400 consisting of appropriate physical therapy intervention plan based on interpretation of test results.

### 4: Differential Diagnosis
**Providing Department:** Transitional DPT, Physical Therapy  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Graduates of the Doctor of Physical Therapy transitional program will demonstrate knowledge and decision making skills in the area of differential diagnosis as evident by a clinical patient case presented in PT 8300 consisting of historical and/or physical findings that implicate a systemic and neuromusculoskeletal impairment.

---

**Pharmacy**

**MS, Pharmaceutical Sciences**

### 1: Define and explain basic principles in each discipline
**Providing Department:** MS, Pharmaceutical Sciences  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Define and explain basic principles of each discipline
2: Demonstrate advanced knowledge and comprehension in major.
   Providing Department: MS, Pharmaceutical Sciences
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate advanced knowledge and comprehension in major.

3: Apply interdisciplinary knowledge from pharmacology, pharmaceutics, and medicinal chemistry to specific problems in major.
   Providing Department: MS, Pharmaceutical Sciences
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Apply interdisciplinary knowledge from 3 disciplines from pharmacology, medicinal chemistry, or pharmaceutics to specific problems in major.

4: Demonstrate technical and analytical proficiency in experimental approaches associated with the major.
   Providing Department: MS, Pharmaceutical Sciences
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Demonstrate technical and analytical proficiency in experimental approaches associated with the major.

5: Clearly articulate, communicate, summarize and present research data and concepts.
   Providing Department: MS, Pharmaceutical Sciences
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Clearly articulate, communicate, summarize and present research data and concepts.

6: Adopt and operate within a culture of safety and responsible conduct of research.
   Providing Department: MS, Pharmaceutical Sciences
   Start: 9/1/2017
   End: 8/31/2018
Learning Outcome Description
Adopt and operate within a culture of safety and responsible conduct of research.

PharmD, Pharmacy Practice

1.1: Learner
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1.1. Learner (Learner) - Attain, integrate, and apply knowledge from the foundational sciences (i.e., pharmaceutical, social/behavioral/administrative, and clinical sciences) to evaluate biomedical literature, explain drug action, solve therapeutic problems, and advance population health and patient centered care.

2.1: Patient Centered Care-Caregiver
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2.1. Patient-centered care (Caregiver) - Provide patient-centered care as the medication specialist (obtain and interpret evidence, formulate and prioritize assessments of health related problems, develop and implement care plans and recommendations, monitor and adjust care plans, and document activities)

2.2: Medication use systems management -Manager
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2.2. Medication use systems management (Manager) - Manage human, financial, technological, and physical resources to optimize the safety and efficacy of medication use systems to meet patient healthcare needs.

2.3: Health and wellness -Promoter
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
2.3. Health and wellness (Promoter) - Design prevention, intervention, and educational strategies for individuals and communities to improve health and wellness and to manage chronic disease.

2.4: Population-based care -Provider
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2.4. Population-based care (Provider) - Describe and apply principles of how population-based care influences patient centered care and influences the development of practice guidelines and evidence-based best practices

3.1: Problem Solving-Problem Solver
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.1. Problem Solving (Problem Solver) – Identify problems; explore and prioritize potential strategies; and design, implement and evaluate a viable solution.

3.2: Educator-Educator
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.2. Educator (Educator) – Educate all audiences by determining the most effective and enduring ways to impart information and assess understanding.

3.3: Patient Advocacy-Advocate
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.3. Patient Advocacy (Advocate) - Assure that patients’ best interests are represented.
3.4: Interprofessional Collaborator-Collaborator
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.4. Interprofessional collaboration (Collaborator) – Actively participate and engage as a healthcare team member by demonstrating mutual respect, understanding, and values to meet patient care needs.

3.5: Cultural sensitivity-Includer
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.5. Cultural sensitivity (Includer) - Recognize social determinants of health to diminish disparities and inequities in access to quality care.

3.6: Communicator-Communicator
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3.6. Communication (Communicator) – Effectively communicate verbally and nonverbally when interacting with an individual, group or organization.

4.1: Self-awareness-Self-aware
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4.1. Self-awareness (Self-aware) – Examine and reflect on personal knowledge, skills, abilities, beliefs, attitudes, motivation, and emotions that could enhance or limit personal and professional growth.

4.2: Leadership-Leader
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
4.2. Leadership (Leader) - Demonstrate responsibility for creating and achieving shared goals, regardless of position.

4.3: Innovation and Entrepreneurship-Innovator
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4.3. Innovation and Entrepreneurship (Innovator) - Engage in innovative activities by using creative thinking to envision better ways of accomplishing professional goals.

4.4: Professionalism-Professional
Providing Department: PharmD, Pharmacy Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4.4. Professionalism (Professional) - Exhibit behaviors and values that are consistent with the trust given to the profession by patients, other healthcare providers, and society.

PhD, Pharmaceutical Sciences

1: Define and explain basic principles in each discipline
Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Define and explain basic principles of each discipline

2: Demonstrate advanced knowledge and comprehension in major
Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate advanced knowledge and comprehension in major.
3: Apply interdisciplinary knowledge from pharmacology, pharmaceutics, and medicinal chemistry to specific problems in major.

Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply interdisciplinary knowledge from 3 disciplines of pharmacology, medicinal chemistry, or pharmaceutics to specific problems in major.

4: Demonstrate technical and analytical proficiency in experimental approaches associated with the major.

Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate technical and analytical proficiency in experimental approaches associated with the major.

5: Clearly articulate, communicate, summarize and present research data and concepts

Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Clearly articulate, communicate, summarize and present research data and concepts

6: Adopt and operate within a culture of safety and responsible conduct of research.

Providing Department: PhD, Pharmaceutical Sciences
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Adopt and operate within a culture of safety and responsible conduct of research.
LO1: Define Problem
Providing Department: Irvin D. Reid Honors College
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students shall be able to:

LO1: Define Problem

Identify and articulate problems/issues in a way that facilitates critical analysis and takes into account relevant contextual factors, i.e., its historical, ethical, social, cultural and disciplinary dimensions.

LO2: Analyze Issues Critically and Comprehensively
Providing Department: Irvin D. Reid Honors College
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2: Analyze Issues Critically and Comprehensively

Efficiently gather and critically analyze information necessary to identify and/or develop actual and potential solutions to the problem in a manner consistent with the problem/issue statement.

LO3: Evaluate Proposed Solutions to Problems
Providing Department: Irvin D. Reid Honors College
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO3: Evaluate Proposed Solutions to Problems

Develop and/or evaluate potential and actual solutions with detailed consideration given to relevant contextual factors, feasibility, and effects/impacts, and recommend or offer conclusions based on same.
LO4: Compose Effective Written Arguments

Providing Department: Irvin D. Reid Honors College
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO4: Compose Effective Written Arguments
Compose written arguments that are responsive to the question, analytical (incorporates LO1, LO2, LO3), organized, substantiated and clear.

Law School

J.D.

1: Learning outcome 1
Providing Department: J.D.
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify and apply basic concepts, theories, and rules of law necessary to effectively and responsibly participate in the legal profession or related professions.

2: Learning outcome 2
Providing Department: J.D.
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to perform legal analysis and reasoning and problem-solving.

3: Learning outcome 3
Providing Department: J.D.
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate effectively orally in the legal context.
4: Learning outcome 4  
Providing Department: J.D.  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to communicate effectively in writing in the legal context.

5: Learning outcome 5  
Providing Department: J.D.  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to locate, organize, and evaluate legal sources and materials, and distinguish between the types and relevance of legal authorities.

6: Learning outcome 6  
Providing Department: J.D.  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to display proficiency in other professional skills that are integral to effective legal practice.

7: Learning outcome 7  
Providing Department: J.D.  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to understand and live up to the proper professional and ethical responsibilities to clients, colleagues, and the legal system required of members of the legal profession.

LL.M. in Corporate & Finance Law
1: Learning outcome 1
Providing Department: LL.M. in Corporate & Finance Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to advise clients with respect to the formation of corporate entities and the various methods of financing their activities.

2: Learning outcome 2
Providing Department: LL.M. in Corporate & Finance Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to understand and analyze key legal issues involved in regulating corporate behavior.

3: Learning outcome 3
Providing Department: LL.M. in Corporate & Finance Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate effectively with experienced corporate and tax lawyers on issues of vital concerns of clients.

4: Learning outcome 4
Providing Department: LL.M. in Corporate & Finance Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to recognize and apply proper professional rules and ethical principles that arise in connection with client representation in this field.

LL.M. in Labor & Employment Law
1: Learning outcome 1
Providing Department: LL.M. in Labor & Employment Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to initiate or defend litigation challenging an employment-related decisions under federal or state law.

2: Learning outcome 2
Providing Department: LL.M. in Labor & Employment Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to draft or analyze key provisions of an employment manual or other documents common in the United States workplace.

3: Learning outcome 3
Providing Department: LL.M. in Labor & Employment Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to negotiate employment contracts and severance packages.

4: Learning Outcome 4
Providing Department: LL.M. in Labor & Employment Law
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate effectively with experienced labor and employment lawyers on issues of vital concerns of clients.

5: Learning outcome 5
Providing Department: LL.M. in Labor & Employment Law
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will be able to recognize and apply professional rules and ethical principles that arise in connection with client representation in this field.

LL.M. in Taxation

1: Learning outcome 1
Providing Department: LL.M. in Taxation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to assist in the preparation of basic individual tax returns.

2: Learning outcome 2
Providing Department: LL.M. in Taxation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to perform legal research needed to complete more complicated tax returns, provide tax planning advice to clients, or formulate arguments and positions in a legislative context.

3: Learning outcome 3
Providing Department: LL.M. in Taxation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to understand and analyze the tax implications of various structures for corporate transactions.

4: Learning outcome 4
Providing Department: LL.M. in Taxation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to initiate litigation in the U.S. Tax Court and other forums on behalf of tax payers.
5: Learning outcome 5  
Providing Department: LL.M. in Taxation  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to communicate effectively with experienced tax lawyers on issues of vital concerns of clients.

6: Learning outcome 6  
Providing Department: LL.M. in Taxation  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to recognize and apply professional rules and ethical principles that arise in connection with client representation in this field.

LL.M. in United States Law

1: Learning outcome 1  
Providing Department: LL.M. in United States Law  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to identify and apply basic concepts, theories, and rules of law as they are applied in the United States.

2: Learning outcome 2  
Providing Department: LL.M. in United States Law  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to perform legal analysis and reasoning related to United States law.
3: Learning outcome 3  
Providing Department: LL.M. in United States Law  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to communicate effectively in writing in the legal context.

4: Learning outcome 4  
Providing Department: LL.M. in United States Law  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to locate, organize, and evaluate legal sources and materials, and distinguish between the types and relevance of legal authorities in United States law.

Mike Ilitch School of Business  
Certificate Programs  
Graduate Certificate in Business  

1.: Critical thinking  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Critical thinking—students show a clear, comprehensive understanding of the case/problem; they effectively use both analysis and synthesis to identify relevant issues and formulate feasible solutions.

2.: Environmental analysis  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Environmental analysis—students are able to identify key elements in the operating and strategic environments, make reasonable assumptions, and recognize and cope effectively with environmental uncertainty; students are able to develop insightful and compelling alternatives that address uncertainty.
3.: Global analysis  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Global analysis—students demonstrate an understanding of the global dimensions of business and formulate insightful recommendations to address global challenges and opportunities.

4.: Leading and managing human resources  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Leading and managing human resources—students can identify the critical dimensions of interpersonal and task requirements necessary to lead and manage people and excel at using these skills in group settings.

5.: Collaborative skills/teamwork  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Collaborative skills/teamwork—students collaborate effectively in team environments; team projects demonstrate students’ ability to integrate diverse perspectives.

6.: Ethical analysis  
Providing Department: Graduate Certificate in Business  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Ethical analysis—students demonstrate the ability to identify multiple dimensions of ethical issues and incorporate their understanding of these issues into their decisions.
7.: Integrative problem solving
   Providing Department: Graduate Certificate in Business
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Integrative problem solving—students can identify cross-disciplinary/cross-functional
   perspectives of a business problem and demonstrate the ability to synthesize these
   perspectives in feasible, insightful solutions

---

Graduate Certification in Entrepreneurship and Innovation

1: Distinguish between types of entrepreneurship and innovation
   Providing Department: Graduate Certification in Entrepreneurship and Innovation
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   - Understand that there are many types of innovations and entrepreneurial thinking
toward start up action plan programming
   - Understand points of comparison

---

2.: Demonstrate knowledge of the stages of new ventures creations
   Providing Department: Graduate Certification in Entrepreneurship and Innovation
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   * understand that there are many types of innovation and entrepreneurial thinking and
   action
   * demonstrate knowledge of sources, methods and processes for:
     * Discovering, creating refining ideas
     * Interacting with stakeholders
     * finding viable and sustaining and growing a new venture
     * building, testing, evaluating a business model/product/service
     * launching, sustaining new ventures
     * acquiring and managing operations
3: Describe the common factors for entrepreneurship and new venture success
Providing Department: Graduate Certification in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Work effectively within interdisciplinary teams to achieve success
- Identify what it takes to be successful and the common pitfalls facing entrepreneurs and new ventures

4: Compose and plan for the next steps for the journey of discovery, experimentation and action.
Providing Department: Graduate Certification in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Map and effectively plan to position the offering in the ecosystem/industry of choice against key competitors

Post-Bachelor Certificate in Accounting

1.: Written Communication
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:
• Communicate effectively in writing
• Express thoughts in writing using an appropriate format that includes proper grammar, punctuation, spelling, and sentence construction
• Understand what written format is suitable for a specific task
• Express thoughts concisely

2.: Oral communication
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will:
• Communicate effectively in oral presentations
• Organize ideas, communicate messages appropriate to listeners and situations
• Use appropriate presentation style, including use of visual aids and handout materials

3.: Ethical Analysis
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will: • Demonstrate an understanding of ethical issues in contemporary business practice • Demonstrate objectivity, integrity, and ethical behavior • Understand ethical codes relevant to accounting practice, such as those promulgated by AICPA, IMA, and IAA

4.: Collaborative Skills/Teamwork
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will: • Demonstrate effective interaction with others in team settings • Work productively with other individuals in diverse roles and with varying degrees of interest in the outcome • Influence, inspire, and motivate others to achieve results • Resolve conflicts within the group

5.: Information Literacy/Research Skills
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will: • Demonstrate an ability to identify, find, interpret, evaluate, and use information appropriately

6.: Technical Mastery of Accounting
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will: • Demonstrate an understanding of the common body of accounting knowledge, including both theory/concepts and real-world applications • Demonstrate the ability to perform accounting work and interpret accounting reports

7.: Decision Making in Complex Environments
Providing Department: Post-Bachelor Certificate in Accounting
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will: • Recognize and analyze problems, their key causes, and their possible solutions • Critically analyze, evaluate, and synthesize information as a guide to action • Work within ambiguous or unstructured situations and make appropriate decisions • Understand the purposes and limitations of narrow, technical solutions within a broader business context • Apply technical rules, critical reasoning, and sound judgment to solve real-world accounting and tax problems

Post-Bachelor Certificate in Information Systems Management

1.: Critical Thinking
Providing Department: Post-Bachelor Certificate in Information Systems Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate critical thinking abilities including the ability to apply appropriate information to solve the problem, make recommendations, and draw logical conclusions.

2.: Communication skills-written
Providing Department: Post-Bachelor Certificate in Information Systems Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective written communication skills, so that the message is understood by individuals with diverse backgrounds, capabilities, and interests.
3.: Technical/Computer Applications for Management Decision Support

Providing Department: Post-Bachelor Certificate in Information Systems Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective use of workplace productivity technology such as spreadsheet, word processing, presentation, and database software, as well as electronic communication technology tools such as email, Internet, instant messenger, discussion groups and other Blackboard tools.

4.: Ethics

Providing Department: Post-Bachelor Certificate in Information Systems Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understand and identify ethical issues in contemporary business practice, and analyze, evaluate and take a position on an ethical issue in contemporary business practice.

5.: Decision Making in Complex Environments

Providing Department: Post-Bachelor Certificate in Information Systems Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze a business problem within complex environments affected by multiple facts, external influences, and multiple stakeholders with varying interests/agendas.

UGC in Entrepreneurship and Innovation

1.: Distinguish between types of entrepreneurship and innovation

Providing Department: UGC in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Understand that there are many types of innovations and entrepreneurial thinking toward start up action plan programming
- Understand points of comparison
2: 2. Demonstrate knowledge of the stages of new ventures creations

Providing Department: UGC in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
* understand that there are many types of innovation and entrepreneurial thinking and action
* demonstrate knowledge of sources, methods and processes for:
  * Discovering, creating refining ideas
  * Interacting with stakeholders
  * finding viable and sustaining and growing a new venture
  * building, testing, evaluating a business model/product/service
  * launching, sustaining new ventures
  * acquiring and managing operations

3: 3. Describe the common factors for entrepreneurship and new venture

Providing Department: UGC in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Work effectively within interdisciplinary teams to achieve success
- Identify what it takes to be successful and the common pitfalls facing entrepreneurs and ne


Providing Department: UGC in Entrepreneurship and Innovation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Map and effectively plan to position the offering in the ecosystem/industry of choice against key competitors
Doctoral Program

Doctor of Philosophy in Business Administration (Ph.D.)

1.: The Acquisition of Advanced Knowledge in Areas of Specialization
Providing Department: Doctor of Philosophy in Business Administration (Ph.D.)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The student will obtain a grade of B or better in each doctoral major course, The student will demonstrate an understanding of the global dimensions of the selected field of knowledge. The acquisition of this understanding will be demonstrated in the student’s evaluation in an appropriate course or Ph.D. level Directed Study incorporating a global perspective. The student will pass written and oral comprehensive examinations addressing the area of specialization.

2.: The Development of Advanced Research Skills for the Areas of Specialization
Providing Department: Doctor of Philosophy in Business Administration (Ph.D.)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• The student will successfully complete at least 11 hours of statistics and quantitative methods classes, as prescribed in his or her plan of work.

• The student must utilize the advanced research skills in: 1) a paper presented at the Fall Ph.D. Research Conference, described below, and 2) an original paper submitted to an academic conference or an academic journal; or its equivalent.

3.: Development of research papers in the student’s area of specialization that demonstrate the ability to make significant independent, original intellectual contributions that will advance the field’s knowledge
Providing Department: Doctor of Philosophy in Business Administration (Ph.D.)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Every fall term, there will be a Ph.D. Research Conference, where doctoral students who have not defended their dissertation proposal will make a formal presentation on (theoretical or empirical) research they have conducted during the prior year. The student must be the lead author on the paper.

• The student will work with appropriate faculty members with the objective of developing papers for academic conferences and academic journals.
• At least one paper written by the student will be empirical analysis of data and its interpretation rooted in discipline-specific theory.

• The student should submit an original paper at an academic conference, or have a research paper under submission to an academic journal or its equivalent, prior to graduation.

4.: Preparation for teaching responsibilities in higher education

Providing Department: Doctor of Philosophy in Business Administration (Ph.D.)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• The student will teach at least one course prior to candidacy, and

• The student will be evaluated by students using Wayne State’s Student Evaluation of Instruction surveys, and

• The student will be observed teaching by a faculty member in the area of specialization.

• If the student’s evaluation of teaching is poor (average evaluation score less than 3.0 and/or the faculty evaluator deems the student teaching as unacceptable) then the student will be enrolled in a program for improved teaching at the Wayne State Office of Teaching and Learning and/or other programs to help improve teaching.

5.: Student dissertations demonstrating personal integration of, and original intellectual contribution to, the selected field of knowledge

Providing Department: Doctor of Philosophy in Business Administration (Ph.D.)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• The student must conduct original research and defend a dissertation.

Masters Programs

Master of Business Administration (MBA)

1.: Critical thinking

Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students show a clear, comprehensive understanding of the case/problem; they effectively use both analysis and synthesis to identify relevant issues and formulate feasible solutions.

2.: Environmental analysis
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students are able to identify key elements in the operating and strategic environments, make reasonable assumptions, and recognize and cope effectively with environmental uncertainty; students are able to develop insightful and compelling alternatives that address uncertainty.

3.: Global analysis
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate an understanding of the global dimensions of business and formulate insightful recommendations to address global challenges and opportunities.

4.: Leading and managing human resources
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can identify the critical dimensions of interpersonal and task requirements necessary to lead and manage people and excel at using these skills in group settings.

5.: Collaborative skills/teamwork
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students collaborate effectively in team environments; team projects demonstrate students’ ability to integrate diverse perspectives.

6.: Ethical analysis
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students demonstrate the ability to identify multiple dimensions of ethical issues and incorporate their understanding of these issues into their decisions.

7.: Integrative problem solving
Providing Department: Master of Business Administration (MBA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students can identify cross-disciplinary/cross-functional perspectives of a business problem and demonstrate the ability to synthesize these perspectives in feasible, insightful solutions.

Master of Science in Accounting (MSA)

1.: Written Communication
Providing Department: Master of Science in Accounting (MSA)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- communicate effectively in writing.
- express thoughts in writing using an appropriate format that includes proper grammar, punctuation, spelling, and sentence construction.
- understand what written format is suitable for a specific task.
- express thoughts concisely.
2. **Oral communication**

**Providing Department:** Master of Science in Accounting (MSA)

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will:

- communicate effectively in oral presentations.
- organize ideas, communicate messages appropriate to listeners and situations;
- use appropriate presentation style, including use of visual aids and handout materials.

3. **Ethical Analysis.**

**Providing Department:** Master of Science in Accounting (MSA)

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will:

- demonstrate an understanding of ethical issues in contemporary business practice.
- demonstrate objectivity, integrity, and ethical behavior.
- Understand ethical codes relevant to accounting practice, such as those promulgated by AICPA, IMA, and IAA

4. **Collaborative Skills/Teamwork**

**Providing Department:** Master of Science in Accounting (MSA)

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will:

- demonstrate effective interaction with others in team settings.
- work productively with other individuals in diverse roles and with varying degrees of interest in the outcome.
- influence, inspire, and motivate others to achieve results.
- resolve conflicts within the group.
5.: Information Literacy/Research Skills  
Providing Department: Master of Science in Accounting (MSA)  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will:  

- demonstrate an ability to identify, find, interpret, evaluate, and use information appropriately.

6.: Technical Mastery of Accounting  
Providing Department: Master of Science in Accounting (MSA)  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will:  

- demonstrate an understanding of the common body of accounting knowledge, including both theory/concepts and real-world applications.  
- demonstrate the ability to perform accounting work and interpret accounting reports.

7.: Decision Making in Complex Environments  
Providing Department: Master of Science in Accounting (MSA)  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will:  

- recognize and analyze problems, their key causes, and their possible solutions.  
- critically analyze, evaluate, and synthesize information as a guide to action.  
- work within ambiguous or unstructured situations and make appropriate decisions.  
- understand the purposes and limitations of narrow, technical solutions within a broader business context.  
- apply technical rules, critical reasoning, and sound judgment to solve real-world accounting and tax problems.
1.: Written Communication
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- communicate effectively in writing.
- express thoughts in writing using an appropriate format that includes proper
grammar, punctuation, spelling, and sentence construction.
- understand what written format is suitable for a specific task.
- express thoughts concisely.

2.: Oral communication
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- communicate effectively in oral presentations.
- organize ideas, communicate messages appropriate to listeners and situations;
- use appropriate presentation style, including use of visual aids and handout
materials.

3.: Ethical Analysis
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- demonstrate an understanding of ethical issues in contemporary business practice.
- demonstrate objectivity, integrity, and ethical behavior.
- Understand ethical codes relevant to accounting practice, such as those promulgated
by AICPA, IMA, and IAA

4.: Collaborative Skills/Teamwork
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students will:

- demonstrate effective interaction with others in team settings.
- work productively with other individuals in diverse roles and with varying degrees of interest in the outcome.
- influence, inspire, and motivate others to achieve results.
- resolve conflicts within the group.

5.: Information Literacy/Research Skills
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- demonstrate an ability to identify, find, interpret, evaluate, and use information appropriately.

6.: Technical Mastery of Accounting
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- demonstrate an understanding of the common body of accounting knowledge, including both theory/concepts and real-world applications.
- demonstrate the ability to perform accounting work and interpret accounting reports.

7.: Decision Making in Complex Environments
Providing Department: Master of Science in Taxation (MST)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will:

- recognize and analyze problems, their key causes, and their possible solutions.
- critically analyze, evaluate, and synthesize information as a guide to action.
- work within ambiguous or unstructured situations and make appropriate decisions.
- understand the purposes and limitations of narrow, technical solutions within a
broader business context.

- apply technical rules, critical reasoning, and sound judgment to solve real-world accounting and tax problems.

MS in Data Science and Business Analytics

PLO1: Critical Thinking
Providing Department: MS in Data Science and Business Analytics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to produce accurate and timely insights from large quantities of data using data science and analytics techniques.

PLO2: Communication
Providing Department: MS in Data Science and Business Analytics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to communicate analytics problems, methods, and findings effectively after considering the relevant audience (technical vs. non-technical stakeholders), situation, and purpose of the communication.

PLO3: Technical Skills
Providing Department: MS in Data Science and Business Analytics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to use technical skills in predictive and prescriptive modeling to support/drive decision-making.

PLO4: Data Analysis Life Cycle
Providing Department: MS in Data Science and Business Analytics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to employ the data analysis life cycle to find effective solutions to
computing challenges in analytical projects.

**PLOS: Teamwork & Collaboration**

**Providing Department:** MS in Data Science and Business Analytics  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students collaborate productively with others to accomplish established goals.

---

**MS in Finance**

**1: Assess a firm’s financial condition**

**Providing Department:** MS in Finance  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
- **LO 1.1:** Demonstrate knowledge of theories and models relevant to the field of finance.
- **LO 1.2:** Formulate and evaluate investment and financial decisions of a corporation.
- **LO 1.3:** Interpret and synthesize data used in investment analysis.
- **LO 1.4:** Identify, evaluate, and explain the investment and financial decisions of corporations utilizing financial theory and decision-making tools.

---

**2: Demonstrate technical proficiency/skills used in the application of financial information technology**

**Providing Department:** MS in Finance  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
- **LO2.1:** Apply standard quantitative techniques and financial analysis to corporate financial decisions.
- **LO2.2:** Apply standard quantitative techniques and financial analysis to the valuation of basic financial securities including equities, fixed income, futures and options.
- **LO 2.3:** Communicate effectively and professionally both in writing and by means of presentations using appropriate technical language.
- **LO2.4:** Integrate complex financial information and analysis into a written report in a well-organized and easy to understand manner.
3: Evaluate choices between competing resource needs
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO 3.1: Select among and apply capital budgeting techniques
LO 3.2: Evaluate investments in working capital and long-term assets.
LO 3.3: Understand how to maximize shareholder wealth, or capital markets
LO 3.4: Understand the trade-off between risk and return

4: Determine a firm’s funding needs
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO 4.1: Design and analyze pro forma statements
LO 4.2: Determine composition of short and long term funds
LO 4.3: Identify and evaluate financing choices

5: Value a firm and its assets
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO 5.1: Select among and apply valuation techniques
LO 5.2: Apply the contingent claims approach to valuation
LO 5.3: Apply valuation models to estimate the value of financial assets and securities

6: Understand the portfolio management processes
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
LO 6.1: Evaluate securities and manage portfolios.
LO 6.2: Apply models for pricing stocks, bonds, and derivative instruments
LO 6.3: Construct optimal portfolios
LO 6.4: Design hedging strategies to manage market risks

7: Evaluate the industry environment in which firms operate
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO 7.1: Perform competitive and comparative analyses of industries
LO 7.2: Describe global capital markets

8: Entrepreneurial Finance and Venture Capital
Providing Department: MS in Finance
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO 8.1: Understand entrepreneurial financing techniques
LO 8.2: Understand entrepreneurial financing techniques

Undergraduate Programs

Bachelor of Arts (B.A.) in Business Administration

1.: Critical Thinking
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate critical thinking abilities including the ability to apply appropriate information to solve the problem, make recommendations, and draw logical conclusions.
2.: Written Communication
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective written communication skills, so that the message is understood by individuals with diverse backgrounds, capabilities, and interests.

3.: Oral Communication
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use proper delivery tools, techniques and mechanics in oral presentations.

4.: Professional Behavior
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understand and display characteristics and behaviors of a professional within the standards of the business community and norms of the environment in which they interact.

5.: Collaborative Skills/ Teamwork
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Collaborate with persons from a variety of backgrounds, interests, and roles, while fostering an atmosphere of tolerance and fairness, and demonstrate effective work in teams in order to accomplish business related goals and objectives.
6. : Technical/ Computer Skills
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate effective use of workplace productivity technology such as spreadsheet, word processing, presentation, and database software, as well as electronic communication technology tools such as email, Internet, instant messenger, discussion groups and other Blackboard tools.

7.: Ethics
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understand and identify ethical issues in contemporary business practice, and analyze, evaluate and take a position on an ethical issue in contemporary business practice.

8.: Decision Making in Complex Environments
Providing Department: Bachelor of Arts (B.A.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze a business problem within complex environments affected by multiple facts, external influences, and multiple stakeholders with varying interests/agendas.

Bachelor of Science (B.S.) in Business Administration

1.: Critical Thinking
Providing Department: Bachelor of Science (B.S.) in Business Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate critical thinking abilities including the ability to apply appropriate information to solve the problem, make recommendations, and draw logical conclusions.
2.: Written Communication  
**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Demonstrate effective written communication skills, so that the message is understood by individuals with diverse backgrounds, capabilities, and interests.

3.: Oral Communication  
**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Use proper delivery tools, techniques and mechanics in oral presentations.

4.: Professional Behavior  
**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Understand and display characteristics and behaviors of a professional within the standards of the business community and norms of the environment in which they interact.

5.: Collaborative Skills/Teamwork  
**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018  

**Learning Outcome Description**  
Collaborate with persons from a variety of backgrounds, interests, and roles, while fostering an atmosphere of tolerance and fairness, and demonstrate effective work in teams in order to accomplish business related goals and objectives.

6.: Technical/Computer Skills  
**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018
**Learning Outcome Description**
Demonstrate effective use of workplace productivity technology such as spreadsheet, word processing, presentation, and database software, as well as electronic communication technology tools such as email, Internet, instant messenger, discussion groups and other Blackboard tools.

---

### 7.: Ethics

**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Understand and identify ethical issues in contemporary business practice, and analyze, evaluate and take a position on an ethical issue in contemporary business practice.

---

### 8.: Decision Making in Complex Environments

**Providing Department:** Bachelor of Science (B.S.) in Business Administration  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Analyze a business problem within complex environments affected by multiple facts, external influences, and multiple stakeholders with varying interests/agendas.

---

**School of Information Science**

**Grad Cert in Library and Information Science**

### 1: LO

**Providing Department:** Grad Cert in Library and Information Science  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
1. Demonstrate competence in a specialized area of librarianship or information studies.
2: LO
Providing Department: Grad Cert in Library and Information Science  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
Demonstrate up-to-date knowledge in the rapidly-changing field of librarianship and information studies: chiefly the organization, storage, retrieval, and dissemination of the human record.

3: LO
Providing Department: Grad Cert in Library and Information Science  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
Use problem-solving and decision-making skills to plan, implement, and evaluate specialized library or information services.

4: LO
Providing Department: Grad Cert in Library and Information Science  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
Develop a specialized competence responsive to the changing economic, technological, or social climate.

Graduate Certificate in Archival Administration

1: GCAA Student Learning Outcome 1
Providing Department: Graduate Certificate in Archival Administration  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description
- Describe the history, intent, challenges, and issues of archival management as a profession.
2: GCAA Student Learning Outcome 2
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Develop the ability to preserve, organize and create access for the historic record.

3: GCAA Student Learning Outcome 3
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Recognize professional processes to identify, conserve, store, and re-format various informational forms from historic to current.

4: GCAA Student Learning Outcome 4
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Analyze the intellectual content of archival material to create optimal access (i.e., archival description) and designate long-term historic importance (i.e., archival appraisal).

5: GCAA Student Learning Outcome 5
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Translate archival theory into professional engagement to better their communities.

6: GCAA Student Learning Outcome 6
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Determine the best uses of technology for archives and their communities.

7: GCAA Student Learning Outcome 7
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Support and respect a diverse user base through research, communication skills, and collections.

8: GCAA Student Learning Outcome 8
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Recognize the importance of advocacy, outreach, education, ethics, and professional values for an archive.

9: GCAA Student Learning Outcome 9
Providing Department: Graduate Certificate in Archival Administration
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply leadership and best practices to manage, budget, and implement projects.

Graduate Certificate in Information Management

1: GCIM Learning Outcome 1
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Utilize and assess technologies for the creation, production, manipulation, modeling, mining, analysis, control, distribution, access, and use of information.
2: GCIM Learning Outcome 2
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Leverage databases and large datasets to uncover and present insights that drive decision-making.

3: GCIM Learning Outcome 3
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Collaborate with organizations to present their products and services to their users and customers in the most accessible and useful manner.

4: GCIM Learning Outcome 4
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Apply usability principles and methods in assessing and designing information services and products for better user experiences.

5: GCIM Learning Outcome 5
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Analyze how information policies affect information creation, production, control, protection, distribution, access, use and evaluation in different socio-technical contexts.
6: GCIM Learning Outcome 6
Providing Department: Graduate Certificate in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Develop independent learning skills and appreciate the need for lifelong learning of information technologies.

Graduate Certificate in Public Library Services to Children and Young Adults

1: PLSC&YA Student Learning Outcome 1
Providing Department: Graduate Certificate in Public Library Services to Children and Young Adults
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Develop effective programs and outreach services for children and young adults in public libraries.

2: PLSC&YA Student Learning Outcome 2
Providing Department: Graduate Certificate in Public Library Services to Children and Young Adults
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Create appropriate collections, both print and electronic, for children and young adults in public libraries.

3: PLSC&YA Student Learning Outcome 3
Providing Department: Graduate Certificate in Public Library Services to Children and Young Adults
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
• Collaborate with community agencies, such as schools, social services and health organizations, to provide needed instruction and support for children and young adults.
4: PLSC&YA Student Learning Outcome 4
Providing Department: Graduate Certificate in Public Library Services to Children and Young Adults
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply leadership principles to creating environments for children and young adults that respond to diversity and cultural needs of the community.

Master of Library and Information Science

1: MLIS Learning Outcome 1
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Critically evaluate, synthesize, and disseminate information.

2: MLIS Learning Outcome 2
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Understand how complex interactions between diverse users, societal factors, and information environments affect professional situations.

3: MLIS Learning Outcome 3
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Facilitate access to, and use of, information resources between users and communities.
4: MLIS Learning Outcome 4
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply multiple and emerging approaches to the organization of knowledge for varied literatures, records, and historical documents.

5: MLIS Learning Outcome 5
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Articulate and advocate for the foundations of the profession and its basic values and ethics such as intellectual freedom, information access and dissemination, and apply these principles to the advancement of the profession.

6: MLIS Learning Outcome 6
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Determine the significance of intellectual property, security, and privacy issues.

7: MLIS Learning Outcome 7
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assess, adopt, and utilize the most relevant information technologies.

8: MLIS Learning Outcome 8
Providing Department: Master of Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Utilize current management and leadership theories and practices in the workplace.

### 9: MLIS Learning Outcome 9
**Providing Department:** Master of Library and Information Science  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Evaluate and apply library and information science research to problems of professional practice by employing theories, best practices, and assessment strategies to the range of information functions.

### 10: MLIS Learning Outcome 10
**Providing Department:** Master of Library and Information Science  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Practice professional engagement through leadership, service work, lifelong learning and community involvement.

---

### MS in Information Management

#### 1: Learning outcome 1
**Providing Department:** MS in Information Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Utilize and assess technologies for the creation, production, manipulation, modeling, mining, analysis, control, distribution, access, and use of information.

#### 2: Learning outcome 2
**Providing Department:** MS in Information Management  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
Leverage databases and datasets to uncover and present insights that drive decision-making.
3: Learning outcome 3
Providing Department: MS in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Apply principles and methods towards assessing and designing information services and products for better user experiences.

4: Learning outcome 4
Providing Department: MS in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Analyze how information policies affect information creation, production, control, protection, distribution, access, use and evaluation in different socio-technical contexts.

5: Learning Outcome 5
Providing Department: MS in Information Management
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop independent learning skills and appreciate the need for lifelong learning of information technologies.

Specialist Certificate in Library and Information Science

1: Specialist Certificate: Learning Outcome 1
Providing Department: Specialist Certificate in Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate advanced or extended competence in areas of specialization in a particular area of librarianship or information studies begun during the first professional degree program (MLIS).
2: Specialist Certificate: Learning Outcome 2
Providing Department: Specialist Certificate in Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Demonstrate up-to-date knowledge in the rapidly-changing field of librarianship and information management: the organization, storage, retrieval, and dissemination of the human record.

3: Specialist Certificate: Learning Outcome 3
Providing Department: Specialist Certificate in Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Use investigative methods in problem-solving and in the planning and evaluation of library and information services.

4: Specialist Certificate: Learning Outcome 4
Providing Department: Specialist Certificate in Library and Information Science
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop a new specialized competence responsive to the changing economic, technological, or social climate or to changing conditions in the life of the individual information professional.

School of Medicine
Anatomy & Cell Biology/ANA
MS- Anatomy & Cell Biology

LO1: Mastery of Subject Material
Providing Department: MS- Anatomy & Cell Biology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: The student will demonstrate mastery of all subject material related to the program curriculum and thesis project.
LO2: Technical Skill Development  
Providing Department: MS- Anatomy & Cell Biology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO2: The student will develop technical skills to conduct research in an ethical and professional manner.

LO3: Ethical Conduct in Science  
Providing Department: MS- Anatomy & Cell Biology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO3: The student will learn to conduct scholarly activities in an ethical manner, following the principles of the scientific process.

LO4: Effective Communication  
Providing Department: MS- Anatomy & Cell Biology  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
The student will learn to effectively communicate scientific material publically in both written and oral formats.

PhD-Anatomy & Cell Biology/ANA  
LO1: Contribute to Scientific Knowledge  
Providing Department: PhD-Anatomy & Cell Biology/ANA  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
LO1- The student will be expected to produce and defend an original significant contribution to scientific knowledge.
**LO2: Mastery of Subject Material**

**Providing Department:** PhD-Anatomy & Cell Biology/ANA  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
LO2: The student will demonstrate mastery of all subject material related to program curriculum and dissertation project.

---

**LO3: Ethical Conduct in Science**

**Providing Department:** PhD-Anatomy & Cell Biology/ANA  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
LO3: The student will learn to conduct scholarly activities in an ethical manner, following the principles of the scientific process.

---

**LO4: Effective Communication**

**Providing Department:** PhD-Anatomy & Cell Biology/ANA  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
LO4: The student will learn to effectively communicate scientific material publically in both written and oral formats.

---

**Associated WSU GRADUATE SCHOOL (GS) academic units**

**Center for Molecular Medicine & Genetics/ING**

**MS-Genetic Counseling/GCO**

**Outcome 1.1 Domain I : Genetics Expertise and Analysis: Family History**

**Providing Department:** MS-Genetic Counseling/GCO  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

From the Accreditation Council of Genetic Counseling Practice-Based Competencies, required of genetic counseling graduate students.
Through coursework and robust clinical experiences, demonstrate a depth and breadth of genomics knowledge through the ability to construct relevant, targeted, and comprehensive personal and family medical histories and pedigrees.

Outcome 1.2 Domain I: Genetics Expertise and Analysis: Genetic Risk Assessment
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling Practice Based Competencies*

Through coursework and robust clinical experiences, demonstrate a depth and breadth of genomics knowledge through the ability to assess individuals' and their relatives' probability of conditions with a genetic component or carrier status based on pedigree, test result(s), and other pertinent information.

Outcome 1.3 Domain I: Genetics Expertise and Analysis: Genetic Testing
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling Practice-Based Competencies*

Through coursework and robust clinical experiences, demonstrate a depth and breadth of genomics knowledge through the ability to identify, assess, and facilitate genomic testing.

Outcome 1.4 Domain I: Genetics Expertise and Analysis: Case Management
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling Practice-Based Competencies*

Through coursework and robust clinical experiences, demonstrate a depth and breadth of genomics knowledge through the ability to execute successful case...
Outcome 2.1 Domain II: Interpersonal, Psychosocial, and Counseling Skills: Contracting

Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice Based Competencies

Demonstrate the ability to contract- to establish rapport, develop a mutually agreed upon genetic counseling agenda and to modify the agenda as needed to address emerging concerns.

Outcome 2.2 Domain II: Interpersonal, Psychosocial and Counseling Skills: Active Listening and Interviewing

Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice Based Competencies

Employ active listening skills and interviewing skills to identify, assess, and empathically respond to stated and emerging concerns.

Outcome 2.3 Domain II: Interpersonal, Psychosocial and Counseling Skills: Decision Making and Adaptation

Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice-Based Competencies

Use a range of genetic counseling skills and models of practice to facilitate informed decision making and adaptation to risk.
Outcome 3.1 Domain III: Education: Patient Education
Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice-Based Competencies

Effectively educate clients about a wide range of genetics and genomics information based on their needs, their characteristics, and the circumstances of the encounter.

Outcome 3.2 Domain III: Education: Written Documentation of the Genetic Counseling Encounter
Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice-Based Competencies

Compose clear, comprehensive and accurate written clinical summaries that are tailored to the health literacy of the intended audience and comply with medical documentation and confidentiality requirements.

Outcome 3.3 Domain III: Education: Presentation Skills
Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
From the Accreditation Council of Genetic Counseling Practice-Based Competencies

Design and deliver presentations on genetics, genomics, and genetic counseling issues that demonstrate core components of effective presentations and are tailored to the intended audience.

Outcome 4.1 Domain IV: Professional Development and Practice: Ethical, Legal, and Philosophical Principles and Values
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling Practice Based Competencies.*

Act in accordance with ethical, legal, and philosophical principles and values of the genetic counseling profession and the policies of one's institution or organization.

---

Outcome 4.2 Domain IV: Professional Development and Practice: Self-Reflective Practice  
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling's Practice-Based Competencies*  

Demonstrate a self-reflective approach to genetic counseling practice through recognizing one's limitations and capabilities in the context of genetic counseling practice, seeking feedback and responding to performance critique, and accepting responsibility for one's physical and emotional health as it impacts performance.

---

Outcome 4.3 Domain IV: Professional Development and Practice: Evidence-Based Practice  
Providing Department: MS-Genetic Counseling/GCO  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
*From the Accreditation Council of Genetic Counseling Practice-Based Competencies*  

Demonstrate an evidence-based and current approach to genetic counseling practice with a concomitant commitment to lifelong learning.
Outcome 5 Research : Genetic Counseling Research
Providing Department: MS-Genetic Counseling/GCO
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Produce an original contribution to the genetic counseling literature through secondary data analysis or original study.

Students achieve this objective through a Plan B project. The Graduate School defines the Plan B requirement as an essay that “shows evidence of scholarly study and writing and be related to the student’s major.” The genetic counseling program stipulates that the project should also involve formulating and testing a research question or hypothesis (modified Plan B). Examples of student projects might include the following: a report on a small series of cases which illustrates a novel concept or answers a specific question; the evaluation of an innovative educational tool, screening tool, or counseling strategy; analysis and interpretation of data from an existing research project or database to answer a new question; or generation of new data followed by analysis and interpretation to answer an original question. A comprehensive literature review might also be appropriate if it hypothesis driven (such as a meta-analysis of existing research on a topic).

MS-Molecular Genetics and Genomics

1: Learning Outcome No.: 1
Providing Department: MS-Molecular Genetics and Genomics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate a working knowledge of biomedical research as it pertains to human genetic diseases, molecular genetics, genomics and computational biology.

2: Learning Outcome No.: 2
Providing Department: MS-Molecular Genetics and Genomics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will plan and execute experiments that test an original hypothesis.
3: Learning Outcome No.: 3  
Providing Department: MS-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will assist in writing manuscripts that include their research for publication in peer-reviewed scientific journals.

4: Learning Outcome No.: 4  
Providing Department: MS-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will organize and present their research to an audience.

PhD-Molecular Genetics and Genomics

1: Learning Outcome No.: 1  
Providing Department: PhD-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will demonstrate a comprehensive knowledge of human genetic diseases, molecular genetics, genomics and computational biology.

2: Learning Outcome No.: 2  
Providing Department: PhD-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
To develop within each student the approach to scientific thinking and exploration needed for original research as an independent investigator in molecular genetics and genomics.
3: Learning Outcome No.: 3  
Providing Department: PhD-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Prepare students for research careers in academia, industry or government.

4: Learning Outcome No.: 4  
Providing Department: PhD-Molecular Genetics and Genomics  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will plan and execute experiments that test an original hypothesis formulated by them.

Dean/MDD  
GC-Clinical & Translational Science/CTS  

1.0: Graduate Certificate in Clinical and Trans. Sci. /Bridge Program Learning Objectives  
Providing Department: GC-Clinical & Translational Science/CTS  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
1. Students will apply their basic science knowledge and clinical medicine skills to the design and execution of responsible clinical trials and the delivery of modern medicine.

2a.: Graduate Certificate in Clinical and Trans. Sci. /Bridge Program Learning Objectives  
Providing Department: GC-Clinical & Translational Science/CTS  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
1. Students will apply their basic science knowledge and clinical medicine skills to the design and execution of responsible clinical trials and the delivery of modern medicine.
Learning Outcome Description
Physician scientists will apply their detailed understanding of pathological mechanisms to develop and apply novel/effective diagnoses, treatments, and trials for human disease.

Learning Outcome Description
Specific learning objectives from medical and graduate programs will apply as students progress through the respective training venues.

MD/PHD-Dual Degree Program

1: MD/PHD-Dual Degree Program Learning Objective 1
Providing Department: MD/PHD-Dual Degree Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students will demonstrate an understanding of basic medical science knowledge acquired during the first two years of medical school.

2: MD/PHD Dual Degree Program Learning Objective 2
Providing Department: MD/PHD-Dual Degree Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students will participate in at least two research rotations during the first two years of medical school and select a mentor and laboratory for their doctoral research training.
3: MD/PHD Dual Degree Program Learning Objective 3

Providing Department: MD/PHD-Dual Degree Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

During their first two graduate training years each student will plan and execute a series of experiments that will test an original hypothesis and that will serve as the foundation for a submitted fellowship application.

4: MD/PHD Dual Degree Program Learning Objective 4

Providing Department: MD/PHD-Dual Degree Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

During their final years of graduate training each student will present their peer reviewed scientific findings at a regional, national or international conference. Each student will prepare one or more manuscripts, based on their research, for publication in peer reviewed journals of impact in their area of research prior to their dissertation defense.

MD-Medical Doctor

AB01: The ability to apply humanistic values in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

AB01: The ability to apply humanistic values in the delivery of health care.

AB02: The ability to work cooperatively with other health care workers in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

AB2: The ability to work cooperatively with other health care workers in the delivery of health care.
AB03: The ability to respect the patients’ dignity, privacy, and confidentiality in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
AB3: The ability to respect the patients’ dignity, privacy, and confidentiality in the delivery of health care.

---

AB04: The ability to effectively interact with patients, peers and other healthcare workers from diverse cultural backgrounds.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
AB4: The ability to effectively interact with patients, peers and other healthcare workers from diverse cultural backgrounds.

---

AB05: Recognize the need to engage in lifelong learning to stay abreast of relevant scientific advances.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
AB5: Recognize the need to engage in lifelong learning to stay abreast of relevant scientific advances.

---

AB06: The ability to recognize personal educational needs and to select and utilize appropriate learning resources.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
AB6: The ability to recognize personal educational needs and to select and utilize appropriate learning resources.
K01: Knowledge of the normal structure of the human body (cell tissues and organs).
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K1: Knowledge of the normal structure of the human body (cell tissues and organs).

K02: Knowledge of the normal function of the human body (cell tissues and organs).
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K2: Knowledge of the normal function of the human body (cell tissues and organs).

K03: Knowledge of the nature of agents and mechanisms that produce alterations in structure and function of the body.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K3: Knowledge of the nature of agents and mechanisms that produce alterations in structure and function of the body.

K04: Knowledge of the nature and course of alterations in function produced by etiological agents and mechanisms (Pathophysiology) of the body.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K4: Knowledge of the nature and course of alterations in function produced by etiological agents and mechanisms (Pathophysiology) of the body.

K05: Knowledge of the nature and course of alterations in function produced by etiological agents and mechanisms (Pathophysiology) of the body.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
K5: Knowledge of the nature and course of alterations in function produced by etiological agents and mechanisms (Pathophysiology) of the body.

K06: Knowledge of the appropriate use of laboratory techniques in identifying diseases or health problems.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K6: Knowledge of the appropriate use of laboratory techniques in identifying diseases or health problems.

K07: Knowledge of the action, metabolism, and toxic effects of drugs.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K6: Knowledge of the action, metabolism, and toxic effects of drugs.

K08: Knowledge of the therapeutic use of drugs.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K8: Knowledge of the therapeutic use of drugs.

K09: Knowledge of normal growth and development.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
K9: Knowledge of normal growth and development.
K10: Knowledge of the principles and concepts underlying normal behavior and mental illness.

**Providing Department:** MD-Medical Doctor  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
K10 Knowledge of the principles and concepts underlying normal behavior and mental illness.

---

K11: Knowledge of the aging process.

**Providing Department:** MD-Medical Doctor  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
K11 Knowledge of the aging process.

---

K12: Knowledge about relieving pain and ameliorating the suffering of patients.

**Providing Department:** MD-Medical Doctor  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
K12 Knowledge about relieving pain and ameliorating the suffering of patients.

---

K13: Knowledge of the health care delivery systems including social, economic and political dimensions.

**Providing Department:** MD-Medical Doctor  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**  
K13 Knowledge of the health care delivery systems including social, economic and political dimensions.

---

K14: An understanding of the need and value of consultations and referrals in the delivery of health care.

**Providing Department:** MD-Medical Doctor  
**Start:** 9/1/2017  
**End:** 8/31/2018
Learning Outcome Description
K14: An understanding of the need and value of consultations and referrals in the delivery of health care.

S01: The ability to perform a satisfactory physical exam.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S1: The ability to perform a satisfactory physical exam.

S02: The ability to take a satisfactory medical history including psychosocial, nutritional, occupational and sexual dimensions.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S2: The ability to take a satisfactory medical history including psychosocial, nutritional, occupational and sexual dimensions.

S03: The ability to utilize data from the history, physical exam and laboratory evaluations to identify the health problem.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S3: The ability to utilize data from the history, physical exam and laboratory evaluations to identify the health problem.

S04: The ability to formulate an appropriate differential diagnosis.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S4: The ability to formulate an appropriate differential diagnosis.
S05: The ability to formulate effective management plans (diagnostic, treatment, and prevention strategies) for diseases and other health problems.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S5: The ability to formulate effective management plans (diagnostic, treatment, and prevention strategies) for diseases and other health problems.

S06: The ability to monitor the course of illnesses and to appropriately revise the management plan.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S6: The ability to monitor the course of illnesses and to appropriately revise the management plan.

S07: The ability to perform routine technical procedures specified by the medical school and clerkship.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S7: The ability to perform routine technical procedures specified by the medical school and clerkship.

S08: The ability to document the clinical encounter.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S8: The ability to document the clinical encounter.

S09: The ability to apply the principles and concepts underlying normal behavior and mental illness.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
S9: The ability to apply the principles and concepts underlying normal behavior and mental illness.

S10: The ability to diagnose and participate in the management of mental illnesses.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S10: The ability to diagnose and participate in the management of mental illnesses.

S11: The ability to apply the therapeutic use of drugs in patient care.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S11: The ability to apply the therapeutic use of drugs in patient care.

S12: The ability to recognize normal growth and development.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S12: The ability to recognize normal growth and development.

S13: The ability to recognize the relationship between health and illness, the patient and the patient’s environment.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S13:

The ability to recognize the relationship between health and illness, the patient and the patient’s environment.
S14: The ability to apply psychosocial principles and concepts in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S14: The ability to apply psychosocial principles and concepts in the delivery of health care.

S15: The ability to apply preventive and health maintenance principles and techniques in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S15: The ability to apply preventive and health maintenance principles and techniques in the delivery of health care.

S16: The ability to apply the appropriate use of laboratory methods in identifying diseases or health problems.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S16: The ability to apply the appropriate use of laboratory methods in identifying diseases or health problems.

S17: The ability to recognize patients with immediately life threatening conditions.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S17: The ability to recognize patients with immediately life threatening conditions.

S18: The ability to apply Translational Medicine principles to clinical decision making.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
S18: The ability to apply Translational Medicine principles to clinical decision making.

S19: The ability to demonstrate effective physician-patient interaction skills.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S19:
The ability to demonstrate effective physician-patient interaction skills.

S20: The ability to utilize appropriate communication skills to obtain a history, diagnosis, and deliver an effective treatment plan to patients.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S20: The ability to utilize appropriate communication skills to obtain a history, diagnosis, and deliver an effective treatment plan to patients.

S21: The ability to effectively communicate with peers and members of the healthcare team in the care of patients and their families.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S21: The ability to effectively communicate with peers and members of the healthcare team in the care of patients and their families.

S22: The ability to apply the concepts and principles of primary care and Family Medicine in the delivery of health care.
Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S22: The ability to apply the concepts and principles of primary care and Family Medicine in the delivery of health care.
S23: The ability to apply cost containment principles and techniques in the delivery of health care.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S23: The ability to apply cost containment principles and techniques in the delivery of health care.

S24: The ability to critically appraise the medical literature.

Providing Department: MD-Medical Doctor
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
S24: The ability to critically appraise the medical literature.

MS-Basic Medical Sciences/BMS

1: Learning Outcome #1: Core Curriculum Learning

Providing Department: MS-Basic Medical Sciences/BMS
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master the fundamentals of graduate level training in core areas of specialization, including biochemistry, physiology, immunology, toxicology and pharmacology.

2: Learning Outcome #2: Area of Specialization

Providing Department: MS-Basic Medical Sciences/BMS
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master the fundamentals of graduate level training in academic concentrations of their choice.
3: Learning Outcome #3: Communication Skills
Providing Department: MS-Basic Medical Sciences/BMS
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will become proficient in communicating scientific concepts appropriate for scientific reports and manuscripts.

4: Learning Outcome #4: Biomedical Literature Review
Providing Department: MS-Basic Medical Sciences/BMS
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master the skills of searching the literature on a biomedical topic of their choice, studying the information obtained and preparing a written review of the topic summarizing the state of the art.

MS-Medical Research/MEDR

1: Learning Outcome 1: Mastery in Area of Specialization
Providing Department: MS-Medical Research/MEDR
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will master an area of specialization related to their areas of research interests.

2: Learning Outcome 2 - Writing Skills
Providing Department: MS-Medical Research/MEDR
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students will become proficient in communicating scientific concepts appropriate for grant writing and manuscript preparation.
3: Learning Outcome 3 - Ethics  
Providing Department: MS-Medical Research/MEDR  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
To understand ethical principles underlying scholarly work.

4: Learning Outcome 4 - Research Skills  
Providing Department: MS-Medical Research/MEDR  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Students will be able to design, execute and interpret state-of-the-art experiments in their discipline.

Family Medicine & Public Health Sciences/FMPH  
BGC-Public Health Practice /PHP  

1.: Program Outcome #1: Public Health Knowledge: Environmental Health  
Providing Department: BGC-Public Health Practice /PHP  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Program Outcome # 1.0 Public Health Knowledge. Environmental Health: Apply evidence-based knowledge from environmental health to improving the health of the public.

2.: Program Outcome #2: Scholarly Research and Analysis  
Providing Department: BGC-Public Health Practice /PHP  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Program Outcome #2. Scholarly Research & Analysis: Uses appropriate research and analytical strategies to describe and address public health issues.

3a: Program Outcome #3a. Communicates public health principles and findings in oral presentations.
Providing Department: BGC-Public Health Practice /PHP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Program Outcome 3a. Competency in Verbal Communication: Case Study Role Play as evidence of public health communication to public audiences

3b.: Program Outcome #3.b. Communicates public health principles and findings in writing.
Providing Department: BGC-Public Health Practice /PHP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Program Outcome 3.b. Communicates public health principles and findings in writing to professional and community audiences in a Briefing Paper.

MPH-Public Health/PH

1.0: #1.0. Public Health Knowledge
Providing Department: MPH-Public Health/PH
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
#1.0. Apply evidence-based knowledge from the following public health domains to understanding and improving the health of the public: epidemiology, biostatistics, social and behavioral health, environmental health, healthcare organization and administration.

2.0: #2. Scholarly Research and Analysis
Providing Department: MPH-Public Health/PH
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
#2.0. Uses appropriate research and analytical strategies to address public health issues.

3a: #3a. Scholarly Communication. Verbal
Providing Department: MPH-Public Health/PH
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
#3 Scholarly Communication: Communicates public health principles and findings in writing to professional and community audiences using a variety of media and methodologies.

3b: #3b. Scholarly Communication. Written
Providing Department: MPH-Public Health/PH
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcome #3b Verbal Communication: Communicate public health principles and findings to professional and community audiences verbally using a variety of media and methodologies.

Microbiology, Immunology, and Biochemistry

MS- Biochemistry & Molecular Biology/BMB

LO1: MS-BMB-didactic goals
Providing Department: MS- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1

- To learn core concepts in biochemistry, including protein, nucleic acid and membrane structure and function, intermediary metabolism and the signal transduction pathways that regulate and coordinate cellular function.
- To learn core concepts molecular biology including recombinant DNA methods, DNA replication and repair, RNA synthesis and processing and the regulation of gene expression.
- Performance on exams in the required course, writing and problem solving assignments, writing a research plan for the thesis research, oral presentations at the ends of each semester to a thesis committee, writing and orally defending the final thesis to a thesis committee.

LO2: MS-BMB-Critical thinking and learning tools goals
Providing Department: MS- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description

LO2

- To learn how to access and critically evaluate the scientific literature, online resources and data bases.
- Performance of annual Journal Club presentations, participation in discussions of these presentations, written thesis research plan, writing and defending the thesis.
- To integrate the knowledge obtained through course work and the literature with critical thinking to solve problems.
- Adviser and thesis committee assessments of performance in the independent studies and dissertation research.
- To develop oral communication skills.
- Journal club presentations, presentation of the research in thesis committee presentations each semester and at the final defense, and presentation of posters at local or national scientific meetings.
- To develop written communication skills.
- Writing the research plan and the final thesis, and writing scientific publications with the adviser.

LO3: MS-BMB-technical expertise goals

Providing Department: MS- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

LO3

- To develop an understanding of the scientific method and research skills by conducting original research.
- A methods-oriented introductory required course rotations, which includes hands-on lab exercises and demonstrations, and the major program requirement of original research for the thesis.

LO4: MS-BMB-scientific presentations skills goals

Providing Department: MS- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

To assess the student's ability to present original research material, published in the literature or from his/her own work, in a clear and coherent manner, to demonstrate understanding of the concepts of the experiments, and to be able to discuss and ask questions upon hearing materials presented by others.
1: Fundamental Principles - M.S. in Immunology and Microbiology
Providing Department: MS- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will understand the fundamental principles of immunology, microbiology and virology and will be able to read and evaluate the current scientific literature in these disciplines.

2: Research Skills - M.S. in Immunology and Microbiology
Providing Department: MS- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to design, execute and interpret state-of-the-art experiments in their discipline.

3: Research Ethics - M.S. in Immunology and Microbiology
Providing Department: MS- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be familiar with principles and guidelines for ethical conduct of biomedical research, and competent in their application to research in their discipline.

4: Scientific Communication - M.S.
Providing Department: MS- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop skills at oral, graphic, and written communication of scientific ideas and data to audiences that range from scientifically naïve to specialists in the areas of the student’s research.
LO1: Knowledge of biochemistry & molecular biology and cellular biology.
Providing Department: PhD- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO1: To ensure that the student will have an advanced, up to date knowledge of biochemistry, molecular and cellular biology upon completion of the Ph.D. degree.

LO2: Ability to evaluate scientific literature
Providing Department: PhD- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO2: To learn how to access and critically evaluate the scientific literature, online resources and databases.

LO3: Learn and apply the scientific method
Providing Department: PhD- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO3: To learn the scientific method include experiment design, execution and interpretation by conduction original research.

LO4: Learn and demonstrate effective oral communication skills
Providing Department: PhD- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO4: To learn effective oral communication skills in order to effectively report research results to students and other scientists.
LO5: Learn and demonstrate effective written communication skills
Providing Department: PhD- Biochemistry & Molecular Biology/BMB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
LO5: To learn effective written communication skills for the preparation of manuscripts, grants and other reports.

PhD- Immunology & Microbiology/IMM

1: Fundamental Principles - Ph.D. in Immunology and Microbiology
Providing Department: PhD- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will understand the fundamental principles of immunology, microbiology and virology and will be able to read and evaluate the current scientific literature in these disciplines.

2: Research Skills - Ph.D. in Immunology and Microbiology
Providing Department: PhD- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to design, execute and interpret state-of-the-art experiments in their discipline.

3: Research Ethics - Ph.D. in Immunology and Microbiology
Providing Department: PhD- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be familiar with principles and guidelines for ethical conduct of biomedical research, and competent in their application to research in their discipline.
4: Scientific Communication - Ph.D.
Providing Department: PhD- Immunology & Microbiology/IMM
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop skills at oral, graphic, and written communication of scientific ideas and data to audiences that range from scientifically naïve to specialists in the areas of the student’s research.

Oncology/ONC

MS-Cancer Biology/CB

1: Learning outcome 1 - Original Research
Providing Department: MS-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To produce evidence of scholarship in cancer biology.

2: Learning Outcome 2 - Mastery in Specialization
Providing Department: MS-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To demonstrate mastery of cancer biology in relation to an area of specialization.

3: Learning Outcome 3 - Ethics
Providing Department: MS-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To conduct original scholarly research in cancer biology in an ethical manner.
4: Learning Outcome 4 - Clinical Relevance
Providing Department: MS-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To understand how the cancer biology discipline relates to the clinical experience of cancer patients.

PhD-Cancer Biology/CB

1: Learning Outcome 1 - Original Research
Providing Department: PhD-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To generate and defend a significant body of original research in cancer biology.

2: Learning Outcome 2 - Mastery in Specialization
Providing Department: PhD-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To master cancer biology in relation to an area of specialization

3: Learning Outcome 3 - Ethics
Providing Department: PhD-Cancer Biology/CB
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
To conduct original scholarly research in cancer biology in an ethical manner
4: Learning Outcome 4 - Clinical Relevance  
**Providing Department:** PhD-Cancer Biology/CB  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
To relate the cancer biology discipline to the clinical experience of cancer patients.

---

Pathology/PTH

PhD-Pathology/PATH

1: Knowledge base and practical skill set  
**Providing Department:** PhD-Pathology/PATH  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Develop a strong and up to date knowledge-base in basic mechanisms of disease, and master basic methodological skills required to carry out basic research investigations into mechanisms of disease.

---

2: Writing Skills  
**Providing Department:** PhD-Pathology/PATH  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will learn the writing skills necessary to effectively communicate experimental ideas and scientific findings. This will be accomplished in the context of two specific writing tasks: grant proposals, and peer reviewed research papers and/or review articles.

---

3: Oral Communication Skills  
**Providing Department:** PhD-Pathology/PATH  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Students will learn how to present an engaging and effective seminar on their own research projects and on published research findings (e.g. in a journal club format). This will include the ability to describe and present relevant background information, a project’s rationale and experimental design, as well as the findings & their significance. In addition, the student will learn how to design and construct presentation materials to clearly and effectively communicate their own data.
4: Critical analysis
Providing Department: PhD-Pathology/PATH
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learn how to evaluate, analyze and critically discuss experimental data. This includes analysis of findings from the published literature as well as scientific results presented in oral format, in the context of seminars and public presentations.

Pharmacology/PHC
PhD-Pharmacology/PHA

1.: general education
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
PROGRAM LEARNING GOALS

The students shall demonstrate an understanding of biomedical research and a thorough knowledge of basic pharmacology.

2.: literature
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

The students shall be aware of the current literature in pharmacology and related sciences.

3.: research
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description

The students shall plan and execute a series of experiments that will test an original hypothesis.

4.: oral communication
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

The students shall be able to present their research to an audience of professionals.

5.: written communication: grants
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

The students shall be able to write grants to support their research.

6.: written communication: manuscripts
Providing Department: PhD-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

The students shall be able write manuscripts based on their research for publication in well-recognized journals

MS-Pharmacology/PHA
1.: education
Providing Department: MS-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students shall demonstrate an understanding of biomedical research and a thorough knowledge of basic pharmacology.

2.: literature
Providing Department: MS-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students shall be aware of the current literature in pharmacology and related sciences.

3.: research
Providing Department: MS-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students shall plan and execute a series of experiments that will test an original hypothesis.

4.: oral communication
Providing Department: MS-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students shall be able to present their research to an audience of professionals.

5.: written communication
Providing Department: MS-Pharmacology/PHA
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The students shall contribute to manuscripts involving their research for publication in
well-recognized journals.

Physiology/PSL

MS-Physiology/PHL

1.0: Learning Outcome - Knowledge of Physiologic Principles

Providing Department: MS-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students will be familiar with core concepts in cell & organ systems physiology.

Assessment Method

1. Data Source: Students are given 3 exams in PSL7010 and PSL7030. Each exam covers approximately one-third of the Course material. Students are given 2 hours to complete each exam. Exams are taken in a lecture hall in Scott Hall, along with about 75 other students. This multiple choice exam is intended to test students' knowledge of core Physiology concepts.

2. Timeline: PSL7010 is offered in Fall-16 semester and PSL7030 in Winter-2017 semester.

3. Data scoring: Exams are written by Physiology Faculty, and student responses are scored using a scantron-style system, carried out by the University Scoring Service.

4. Scale: Students are scored as part of the entire PSL7010 or PSL7030 students. Averages scores are determined over the 3 exams for each course. Letter grades are assigned as follows: A: 90-100; A-: 85-90; B+: 80-85, B: under 80. Letter grade cutoffs corresponding to numerical scores can be “curved” in a given semester. The decision can be made by the Course Directors, but agreement by Course Faculty is encouraged. Reasons for curving scores will include percentages of students receiving letter grades, as compared with norms for past years, changes in Course curriculum, lectures, or Faculty. Cutoffs may be affected by performance of a few students near the interface of letter grade cutoffs, including a student who displays exceptional improvement over the course of the semester, or large numbers of students with identical numerical averages, whereby percentages may be inordinately skewed depending upon the letter grade cutoff.

5. Acceptable performance: Students must achieve a letter grade of B or better.

6. Review: Course Directors for PSL7010 and PSL7030 will present students scores to the Graduate Committee at the end of these courses to discuss unacceptable performance. Faculty members of the Graduate Committee will review all student performance on a
yearly basis.

2.0: Learning Outcome - Identify and critically assess literature

Providing Department: MS-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify and critically access the literature in their field of study.

3.0: Learning Outcome - Hypothesis formulation and experimental design

Providing Department: MS-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate that they are capable of formulating testable hypotheses in molecular, cellular, or organ systems physiology.

4.0: Learning Outcome - Laboratory techniques expertise

Providing Department: MS-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be introduced to the experimental approaches used in cell, molecular, and organ systems physiology.

5.0: Learning Outcome - Oral and written communication skills

Providing Department: MS-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to effectively present their work orally and in written form to scientists.
1.0: Learning Outcome - Understand physiological principles and mechanisms
Providing Department: PhD-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Learning Outcomes and Assessment

Students will understand core concepts in cell & organ systems physiology, and be able to clearly summarize in writing, basic physiological mechanisms and core concepts.

2.0: Learning Outcome - Critical assessment of literature
Providing Department: PhD-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to evaluate current literature, and formulate a critical review of relevant physiological concepts.

3.0: Learning Outcome - Hypotheses formulation and experimental design
Providing Department: PhD-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate that they are capable of formulating testable hypotheses in molecular, cellular, or organ systems physiology.

4.0: Learning Outcome - Expertise in experimental approaches
Providing Department: PhD-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will attain expertise in laboratory techniques relevant to the field of cell, molecular, and organ systems physiology. Students will generate unbiased data that test scientific hypotheses.

5.0: Learning Outcome - Oral and written presentation of scientific concepts, and experimental data
Providing Department: PhD-Physiology/PHL
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students should be able to orally communicate their work in physiology to the educated lay public. They will also be able to tailor their presentation, both written and oral, to a broader scientific audience, and to trained scientists in the field.

Psychiatry & Behavioral Neurosciences/PBN

PhD-Translational Neurosciences/TNP

Learning Outcome 1: Didactic Curriculum
Providing Department: PhD-Translational Neurosciences/TNP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Through a diverse didactic curriculum, students will gain knowledge and understanding of basic sciences related to the neurobiology of the nervous system, brain disorders, diseases and injuries, the fundamentals of neuroimaging techniques, and statistical approaches to modeling research data.

Learning Outcome 2: Skills at Communicating and Critiquing Science
Providing Department: PhD-Translational Neurosciences/TNP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will learn and develop the skills in communicating orally and in writing, critiquing and challenging basic and clinical research results through journal club and seminar participation, and oral and poster presentation of research (e.g., at local, national and international scientific meetings, and TNP seminars).

Learning Outcome 3: Advanced Proficiency in Knowledge in a Research Area of Interest
Providing Department: PhD-Translational Neurosciences/TNP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will gain advanced knowledge in basic, translational and clinical neuroscience as well as gain expertise in a particular research area of interest. With guidance from advisor and advisory committee, students will design, develop and write a dissertation research prospectus in the form of a research grant proposal with testable hypotheses and experimental approach.
Learning Outcome 4: Dissertation Research Project

Providing Department: PhD-Translational Neurosciences/TNP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
With guidance from advisor and advisory committee, students are expected to conduct graduate-level research and exhibit advanced knowledge and mastery within their chosen research interest.

Radiation Oncology

Graduate Certificate in Medical Physics

1: Understanding of the Fundamentals of Radiological Physics

Providing Department: Graduate Certificate in Medical Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the fundamentals of radiological physics, along with the underlying physics and mathematical principles, as well as an understanding of how these fundamental principles are related to the practical application of radiological principles in medicine.

2: Understanding the Clinical Application of Medical Physics Principles

Providing Department: Graduate Certificate in Medical Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the practice of clinical medical physics within Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine as well as how fundamental physics principles are applied to these clinical practices.

3: Opportunities for Hands-On Practical Experience

Providing Department: Graduate Certificate in Medical Physics
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
We intend to provide students with opportunities for hands-on practical experience in Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine physics.

4: Education and Training in Hospital Environment
Providing Department: Graduate Certificate in Medical Physics
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with education and training in the fundamentals and practical application of radiation protection and safety in a hospital environment.

Medical Physics Masters/RADP

1: Understanding of the Fundamentals of Radiological Physics
Providing Department: Medical Physics Masters/RADP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the fundamentals of radiological physics, along with the underlying physics and mathematical principles, as well as an understanding of how these fundamental principles are related to the practical application of radiological principles in medicine.

2: Understanding the Clinical Application of Medical Physics Principles
Providing Department: Medical Physics Masters/RADP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the practice of clinical medical physics within Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine as well as how fundamental physics principles are applied to these clinical practices.

3: Opportunities for Hands-On Practical Experience
Providing Department: Medical Physics Masters/RADP
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
We intend to provide students with opportunities for hands-on practical experience in Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine physics.

4: Education and Training in a Hospital Environment
Providing Department: Medical Physics Masters/RADP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with education and training in the fundamentals and practical application of radiation protection and safety in a hospital environment.

PhD-Medical Physics/MP

1: Understanding of the Fundamentals of Radiological Physics
Providing Department: PhD-Medical Physics/MP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the fundamentals of radiological physics, along with the underlying physics and mathematical principles, as well as an understanding of how these fundamental principles are related to the practical application of radiological principles in medicine.

2: Understanding the Clinical Application of Medical Physics Principles
Providing Department: PhD-Medical Physics/MP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with a thorough understanding of the practice of clinical medical physics within Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine as well as how fundamental physics principles are applied to these clinical practices.

3: Opportunities for Hands-On Practical Experience
Providing Department: PhD-Medical Physics/MP
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
We intend to provide students with opportunities for hands‐on practical experience in Radiation Oncology, Diagnostic Imaging, and Nuclear Medicine physics.

4: Education and Training in a Hospital Environment
Providing Department: PhD‐Medical Physics/MP
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
We intend to provide students with education and training in the fundamentals and practical application of radiation protection and safety in a hospital environment.

School of Social Work

Bachelors

Bachelors of Social Work

1: Ethical and Professional Behavior
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 1: Demonstrate ethical and professional behavior.

2: Diversity in Practice
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 2: Engage diversity and difference in practice.

3: Human Rights and Justice
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Competency 3: Advance human rights and social, economic, and environmental justice.

4: Informed Practice and Research
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 4: Engage in practice-informed research and research-informed practice.

5: Policy Practice
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 5: Engage in policy practice.

6: Engage with Clients
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 6: Engage with individuals, families, groups, organizations, and communities.

7: Assess Clients
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 7: Assess individuals, families, groups, organizations, and communities.

8: Intervene with Clients
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Competency 8: Intervene with individuals, families, groups, organizations, and communities.

9: Evaluate Practice with Clients
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 9: Evaluate practice with individual, families, groups, organizations, and communities.

10: Analyze Impact of Urban Context
Providing Department: Bachelors of Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 10: Analyze the impact of the urban context on a range of client systems including practice implications.

Bachelors of Social Work – Where Online Works (WOW)!

1: Ethical and Professional Behavior
Providing Department: Bachelors of Social Work – Where Online Works (WOW)!
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 1: Demonstrate ethical and professional behavior.

2: Diversity in Practice
Providing Department: Bachelors of Social Work – Where Online Works (WOW)!
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 2: Engage diversity and difference in practice.
3: Human Rights and Justice
Providing Department: Bachelors of Social Work – Where Online Works (WOW!)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 3: Advance human rights and social, economic, and environmental justice.

4: Informed Practice and Research
Providing Department: Bachelors of Social Work – Where Online Works (WOW!)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 4: Engage in practice-informed research and research-informed practice.

5: Policy Practice
Providing Department: Bachelors of Social Work – Where Online Works (WOW!)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 5: Engage in policy practice.

6: Engage with Clients
Providing Department: Bachelors of Social Work – Where Online Works (WOW!)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 6: Engage with individuals, families, groups, organizations, and communities.

7: Assess Clients
Providing Department: Bachelors of Social Work – Where Online Works (WOW!)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 7: Assess individuals, families, groups, organizations, and communities.
8: Intervene with Clients
Providing Department: Bachelors of Social Work – Where Online Works (WOW)!
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 8: Intervene with individuals, families, groups, organizations, and communities.

9: Evaluate Practice with Clients
Providing Department: Bachelors of Social Work – Where Online Works (WOW)!
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 9: Evaluate practice with individuals, families, groups, organizations, and communities.

10: Analyze Impact of Urban Context
Providing Department: Bachelors of Social Work – Where Online Works (WOW)!
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency 11: Analyze the impact of the urban context on a range of client systems including practice implications.

Doctorate
Clinical Scholarship Track (Ph.D. in Social Work)

1: Theory
Providing Department: Clinical Scholarship Track (Ph.D. in Social Work)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Describe and appraise essential concepts in key bodies of advanced clinical social work theory.
2: Social Work Practice
Providing Department: Clinical Scholarship Track (Ph.D. in Social Work)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Demonstrate advanced competencies in application of advanced clinical social work practice principles to student's own clinical case material.

3: Advanced competencies in clinical social work practice
Providing Department: Clinical Scholarship Track (Ph.D. in Social Work)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Demonstrate advanced competencies in advanced clinical social work practice.

4: Assess theory
Providing Department: Clinical Scholarship Track (Ph.D. in Social Work)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Assess the value of major theories in understanding social work practice, social problems, human systems, human behavior

5: Apply theoretical frameworks
Providing Department: Clinical Scholarship Track (Ph.D. in Social Work)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Apply relevant theoretical frameworks to a domain of knowledge in social work
1: Describe theory
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Describe and appraise essential concepts in key theories across micro, mezzo and macro levels of practice and research.

2: Assess theory
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Assess the value of major theories in understanding social work practice, social problems, human systems, human behavior.

3: Apply theory
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Understand and apply theory for research design and social work practice.

4: Qualitative/quantitative research
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Employ mastery of qualitative/quantitative and mixed methods research designs, including scientific theory supporting the design, to be ready to conduct research using these designs.

5: Observational vs. intervention research
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Distinguish between observational vs. intervention/evaluation research
6: Ethical issues related to research
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 6: Critique the ethical issues related to all designs and their application in urban practice and communities.

7: Apply data analysis
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 7: Students will apply the appropriate statistical tests and interpretation of results.

8: Qualitative data analysis
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 8: Appraise types of qualitative data analysis and be prepared to apply to appropriate research situations.

9: Computer applications for data analysis
Providing Department: Doctor of Philosophy in Social Work
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 9: Demonstrate proficiency in computer applications for data analysis.
10: **Synthesis of research and practice literature**

**Providing Department:** Doctor of Philosophy in Social Work

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
**Outcome 10:** Review and synthesize research and practice literature that is relevant to a social work domain of knowledge.

---

11: **Historical changes in practice**

**Providing Department:** Doctor of Philosophy in Social Work

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
**Outcome 11:** Identify historical changes in practice and policy for a social work field, including the trends in the fit with social work ethics and values.

---

12: **Apply theoretical frameworks**

**Providing Department:** Doctor of Philosophy in Social Work

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
**Outcome 12:** Apply relevant theoretical frameworks to a domain of knowledge in social work.

---

**Dual Title in Social Work and Infant Mental Health (Ph.D.)**

1: **Theory and research**

**Providing Department:** Dual Title in Social Work and Infant Mental Health (Ph.D.)

**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
**Outcome 1:** Synthesize knowledge about theories and research relevant to infant mental health practice, including pregnancy and early parenting, infant development, relationship-based practice, attachment, and disorders of infancy and early childhood.
2: IMH service delivery
   Providing Department: Dual Title in Social Work and Infant Mental Health (Ph.D.)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Outcome 2: Demonstrate expertise related to the Infant Mental Health service delivery model and its use in clinical and classroom-based intervention and research.

3: Practice interventions
   Providing Department: Dual Title in Social Work and Infant Mental Health (Ph.D.)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Outcome 3: Develop knowledge and skills in the provision of attachment-based and evidence-informed practice to families and their infants who are experiencing complex risks.

4: Observation and assessment
   Providing Department: Dual Title in Social Work and Infant Mental Health (Ph.D.)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Outcome 4: Demonstrate expertise in observation and assessment of infants/young children, caregivers, and caregiver-infant/young child relationships to identify capacities, risks, and relationship disturbances.

5: Research design
   Providing Department: Dual Title in Social Work and Infant Mental Health (Ph.D.)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Outcome 5: Demonstrate competence in research design and methods relevant to the field of infant mental health.

Graduate Certificates

Certificate in Alcohol and Drug Abuse Studies (CADAS)
1: Substance use impact on society
Providing Department: Certificate in Alcohol and Drug Abuse Studies (CADAS)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Apply social work ethical principles to guide professional practice.

2: Engage Diversity
Providing Department: Certificate in Alcohol and Drug Abuse Studies (CADAS)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2:
Engage diversity and difference in substance abuse practice- Research and apply knowledge of diverse populations (e.g., youth, women, older adults, racial and ethnic minorities, people of diverse sexual orientation, and individuals with co-occurring problems) to enhance client's well-being.

3: Assess and intervene
Providing Department: Certificate in Alcohol and Drug Abuse Studies (CADAS)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Assess and intervene with individuals with substance abuse disorders. Demonstrate the use of appropriate clinical strategies for a range of concerns identified in the assessment.

4: Biological impact substance use
Providing Department: Certificate in Alcohol and Drug Abuse Studies (CADAS)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Explain the biological impact of substances on the human body.
1: Definition of "disability"

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1. Describe current definitions of “disability” and their implications.

2: urban setting

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2. Identify issues unique to disabilities in the urban setting.

3: Effects of poverty

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
3. Describe the effects of poverty in disabilities.

4: Historical perspective

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
4. Define the importance of the historical perspective of disability on current practice.

5: Resources

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
5. Identify various resources to those living with disabilities.
6: Risks factors

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
6. Understand specific risks posed to persons with disabilities living in an urban setting.

7: Policy

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
7. Critically appraise how current policy, and legislation impacts persons with disabilities.

8: Quality of life

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
8. Define the importance of quality of life issues related to living with disabilities.

9: Current issues

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
9. Identify current issues and methods for research related to persons with disabilities.

10: Cultural self-awareness

Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
10. Increase cultural self-awareness and intercultural sensitivity and its relationship to disability
11: Biases
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
11. Examine the nature of biases, prejudices, discrimination, and other behaviors that are detrimental to the growth of the human spirit, mind, or body.

12: Theory
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
12. Integrate theoretical, practical and research based knowledge to address a challenge experienced by individuals with disabilities.

13: Intervention
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
13. Design an intervention, project or product that enhances the lives of individuals with disabilities.

14: Evidence-based programs
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
14. Define the characteristics of evidence based programs for persons with disabilities.

15: Program implementation
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
15. Increase understanding of how finance and budgetary guidelines influence program
16: Work environment support
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
16. Increase student’s opportunity to work with and support individual’s with disabilities in a work environment

17: Service provision
Providing Department: Developmental Disabilities
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
17. Define likely role(s) of the (home) discipline in interdisciplinary team approaches to service provision

GC in Social Welfare Research and Evaluation

1: Quantitative Research Design
Providing Department: GC in Social Welfare Research and Evaluation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Students will be able to select and implement quantitative research designs that are appropriate and adequate for answering contemporary social work practice and social welfare policy research questions.

2: Research Methods
Providing Department: GC in Social Welfare Research and Evaluation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Students will be able to implement research methods including problem formulation, literature review, sample selection, sampling technique, formulation of
design, development of instruments, data analysis, interpretation of results, and writing a research report.

3: Qualitative Research Design
Providing Department: GC in Social Welfare Research and Evaluation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Students will be able to select and implement qualitative research designs that are appropriate and adequate for answering contemporary social work practice and social welfare policy research questions.

4: Theory
Providing Department: GC in Social Welfare Research and Evaluation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student Learning Outcome #4: Student will be able to select, describe and apply social work relevant theories to research and evaluation.

Gerontology

1: Biological theory
Providing Department: Gerontology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Relate biological theory and science to understanding senescence, longevity and variation in aging

2: Psychological theories
Providing Department: Gerontology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Relate psychological theories and science to understanding adaptation, stability and change in aging.
3: Gerontological perspective
Providing Department: Gerontology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Develop a gerontological perspective through knowledge and self-reflection.

4: Promote strengths
Providing Department: Gerontology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Promote strengths to maximize well-being, health and mental health.

5: Policies
Providing Department: Gerontology
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Identify, formulate & analyze policies that influence services for older adults

Grad Cert in Clinical Social Work Theory and Practice

1: Compare and contrasts theoretical systems
Providing Department: Grad Cert in Clinical Social Work Theory and Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop the capacity to articulate, compare, and contrast two or more theoretical systems associated with contemporary clinical social work practice, especially psychodynamic and cognitive-behavioral theories, thus broadening students’ understanding of the ways in which multiple theories conceptualize development, personality, behavior, and psychopathology.
2: Critique clinical practice literature
Providing Department: Grad Cert in Clinical Social Work Theory and Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will develop the capacity to critique existing empirical literature of various theoretical models associated with clinical practice, paying special attention to whether the research can be generalized to include the unique populations served by clinical social workers.

3: Enhance understanding/proficiency in clinical social work techniques, approaches, and treatment issues
Providing Department: Grad Cert in Clinical Social Work Theory and Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will enhance their understanding and proficiency in the techniques, approaches, and common treatment issues surrounding clinical social work practice.

4: Critically examine clinical issues related to diagnostic classifications in the biopsychosocial context
Providing Department: Grad Cert in Clinical Social Work Theory and Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will enhance their competencies in the critically examination of clinical issues associated with specific diagnostic classifications such as mood disorders, anxiety disorders, trauma, personality disorders, and substance abuse, with special attention to their origins, how the symptoms are manifested in the biopsychosocial context.

5: Identify the role of oppression, socio-political context, and environmental considerations in their relationship to social work treatment issues.
Providing Department: Grad Cert in Clinical Social Work Theory and Practice
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify the role of oppression, socio-political context, and environmental considerations in therapeutic and/or supervisory relationships and ways in which these issues shape the development of clinical social work treatment relationships.
Social Work Practice with Families and Couples

1: Identify as a professional social worker
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Identify as a professional social worker and conduct oneself accordingly.

2: Apply social work principles
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Apply social work ethical principles to guide professional practice.

3: Critical thinking
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Apply critical thinking to inform and communicate professional judgments.

4: Research
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Engage in research-informed practice and practice-informed research.

5: Human behavior and social environment
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Outcome 5: Apply knowledge of human behavior and the social environment- Utilize concepts and theories that explain a variety of family structures.

6: Respond to contexts
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 6: Respond to contexts that shape practice.

7: Engage, assess, intervene, and evaluate
Providing Department: Social Work Practice with Families and Couples
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 7: Engage, assess, intervene, and evaluate with individuals, families, groups, organizations, and communities- Develop practice skills to intervene with multi-problem families.

Temporary Approval for Michigan School Social Workers (Certificate)

1: Theoretical foundations
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Knowledge of theoretical foundations and history of the school social work profession and service delivery.

2: Legal and ethical standards
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Knowledge of legal and ethical standards necessary for social work practice
3: Special education law

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Knowledge of federal and state special education laws and other legal aspects of the role of school social worker.

4: Organization and structural components

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Knowledge of organization components and structural dynamic of public school agencies at local, state, and national levels, as well as identification of methods useful to analyze and influence these in order to maximize student success.

5: Collaboration

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Knowledge of other professional educational roles to promote successful collaboration.

6: Influences of student learning

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 6: Knowledge of a broad range of experiences, personal characteristics, and background variables that influence student learning and development, including
reciprocal and diverse influences of home, school and community.

7: Educational factors

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 7: Knowledge and skills for identifying factors that enhance strengths, resilience, and protection from adversity, and that diminish educational and developmental risks.

8: Crisis management

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 8: Knowledge and skills to provide crisis prevention, planning, and interventions services, and the impact of trauma on development, learning, and school performance.

9: Positive behavior supports

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 9: Knowledge and skills to promote positive behavior supports for individuals and school wide programs.

10: Behavior intervention plans

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 10: Knowledge and skills in development of behavior intervention plans collaboratively with family members, educational staff, and outside resources, personal,
11: Problem-solving
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 11: Knowledge and skills in mediation, conflict resolution, and collaborative problem-solving models.

12: Assessment
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 12: Knowledge and skills in comprehensive and systematic assessment and evaluation.

13: Service delivery
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 13: Knowledge and skills in effective written communication of the assessment and evaluation results that include educationally relevant recommendations and, where appropriate, measurable goals, and anticipated outcomes from service delivery.

14: Normative developmental expectations
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 14: Knowledge of normative expectations for infant, child, adolescent, and young adult emotional, behavioral, social, cultural, communicative, cognitive, learning,
15: Clinical and educational differences

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 15: Knowledge regarding similarities and differences between clinically-based definition of psychiatric disorders and educational disabilities.

16: Evaluation

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 16: Knowledge and skills to evaluate effectiveness of programs and services and modify these based upon individual student need.

17: Empirically-supported intervention methods

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 17: Knowledge and skills for locating, selecting, and applying empirically-supported, evidence-based prevention and intervention methods appropriate for use with individual s, groups, families, school personnel, and communities to enhance student learning, development, and school success.

18: Facilitate student access

Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 18: Knowledge and skills to facilitate and coordinate student access to medical, health, mental health, social services, and other community resources, and to
promote collaboration among school personnel and other community agencies.

19: Verbal communication
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 19: Ability to verbally communicate in terms understandable to students, parents, school staff, and agencies.

20: Awareness
Providing Department: Temporary Approval for Michigan School Social Workers (Certificate
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 20: Awareness of curriculum, teaching theories, and methodologies.

Masters

Dual Title in Social Work and Infant Mental Health (MSW)

1: Theory and research
Providing Department: Dual Title in Social Work and Infant Mental Health (MSW)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 1: Synthesize knowledge about theories and research relevant to infant mental health practice, including pregnancy and early parenting, infant development, relationship-based practice, attachment, and disorders of infancy and early childhood.

2: IMH service delivery model
Providing Department: Dual Title in Social Work and Infant Mental Health (MSW)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 2: Demonstrate expertise related to the IMH service delivery model and its use
3: attachment-based, evidence-informed practice
Providing Department: Dual Title in Social Work and Infant Mental Health (MSW)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 3: Develop knowledge and skills in the provision of attachment-based and evidence-informed practice to families and their infants who are experiencing complex risks. Provide evidence-based practice interventions to families and their infants who are experiencing complex risks.

4: Observation and assessment
Providing Department: Dual Title in Social Work and Infant Mental Health (MSW)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 4: Demonstrate expertise in observation and assessment of infants/young children, caregivers, and caregiver-infant/young child relationships to identify capacities, risks and relationship disturbances.

5: Reflective practice
Providing Department: Dual Title in Social Work and Infant Mental Health (MSW)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Outcome 5: Engage in reflective practice consistent with the field of IMH.

Innovation in Community, Policy and Leadership (I-CPL)

1: Ethical and Professional Behavior
Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency ICPL1: Demonstrate ethical and professional behavior.

2: Diversity in Practice
   Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Competency ICPL2: Engage diversity and difference in practice.

3: Human Rights and Justice
   Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Competency ICPL3: Advance human rights and social, economic, and environmental justice.

4: Informed Practice and Research
   Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Competency ICPL4: Engage in practice-informed research and research-informed practice.

5: Policy Practice
   Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
   Start: 9/1/2017
   End: 8/31/2018

   Learning Outcome Description
   Competency ICPL5: Engage in policy practice.

6: Engage with Clients
   Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
   Start: 9/1/2017
   End: 8/31/2018
Learning Outcome Description
Competency ICPL6: Engage with individuals, families, groups, organizations, and communities.

7: Assess Clients
Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency ICPL7: Assess individuals, families, groups, organizations, and communities.

8: Intervene with Clients
Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency ICPL8: Intervene with individuals, families, groups, organizations, and communities.

9: Evaluate Practice with Clients
Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency ICPL9: Evaluate practice with individuals, families, groups, organizations, and communities.

10: Analyze Impact of Urban Context
Providing Department: Innovation in Community, Policy and Leadership (I-CPL)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency ICPL11: Analyze the impact of the urban context on a range of client systems, including practice implications.
Interpersonal Concentration (IP)

1: Ethical and Professional Behavior
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP1: Demonstrate ethical and professional behavior.

2: Diversity in Practice
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP2: Engage diversity and difference in practice.

3: Human Rights and Justice
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP3: Advance human rights and social, economic, and environmental justice.

4: Informed Practice and Research
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP4: Engage in practice-informed research and research-informed practice.

5: Policy Practice
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Competency IP5: Engage in policy practice.

6: Engage with Clients
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP6: Engage with individuals, families, groups, organizations, and communities.

7: Assess Clients
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP7: Assess individuals, families, groups, organizations, and communities.

8: Intervene with Clients
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP8: Intervene with individuals, families, groups, organizations, and communities.

9: Evaluate Practice with Clients
Providing Department: Interpersonal Concentration (IP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Competency IP9: Evaluate practice with individuals, families, groups, organizations, and communities.
10: Analyze Impact of Urban Context

**Providing Department:** Interpersonal Concentration (IP)
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Competency IP11: Analyze the impact of the urban context on a range of client systems, including practice implications.

---

**General Education Program**

**Competency LO1: Written communication**

**Providing Department:** General Education Program
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Students communicate effectively in writing with general and professional audiences.

---

**Competency LO2: Mathematics**

**Providing Department:** General Education Program
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Students accurately utilize underlying mathematical concepts and skills.

---

**Competency LO3: Oral communication**

**Providing Department:** General Education Program
**Start:** 9/1/2017
**End:** 8/31/2018

**Learning Outcome Description**
Oral communication: Students display formal public speaking skills.

---

**Competency LO4: Critical/analytical thinking**

**Providing Department:** General Education Program
**Start:** 9/1/2017
**End:** 8/31/2018
**Learning Outcome Description**
Students reason critically and analyze information.

---

**Group LO6: Natural sciences**
Providing Department: General Education Program
Start: 9/1/2017
End: 8/31/2018

**Learning Outcome Description**
Students recognize the nature, applications, processes, limitations, and capabilities of scientific knowledge.

---

**Group LO7: Humanities**
Providing Department: General Education Program
Start: 9/1/2017
End: 8/31/2018

**Learning Outcome Description**
Students describe concepts, ideas, and interpretations from disciplines that provide insight into the human experience (e.g., the arts, history, language, literature, music, philosophy, politics, religion).

---

**Group LO8: Society and Institutions**
Providing Department: General Education Program
Start: 9/1/2017
End: 8/31/2018

**Learning Outcome Description**
Students describe the development, behaviors, or products of diverse human cultures, events, institutions, and civic roles using analytical methods from historical, humanistic, or social science approaches.

---

**High Impact Experiences**

**Learning Communities**

**1: Learning Outcome 1**
Providing Department: Learning Communities
Start: 9/1/2017
End: 8/31/2018

**Learning Outcome Description**
Learning Communities will create a community of learners, where, students have a strong sense of membership in a diverse community, whose purpose they understand and value, and with whom they engage.

2: Learning Outcome 2  
Providing Department: Learning Communities  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Learning Communities will develop three specific learning outcomes, experiences designed to meet the learning outcomes, and an assessment plan to measure student success.

3: Learning Outcome 3  
Providing Department: Learning Communities  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Learning Communities will incorporate characteristics of High Impact Practices (HIPs), as outlined by the AAC&U, for improved student success. They will offer students opportunities to increased connection to the subject matter; provide students with both independence and support; and they will provide opportunities for students, faculty, advisers, and peer mentors to interact together.

4: Learning Outcome 4  
Providing Department: Learning Communities  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Learning Communities will train responsible peer mentors to lead academic study sessions, demonstrate effective study methods to LC students, appropriately respond to challenges, and build a sense of community among participants.
1: LO1: Presentation of Research
Providing Department: Undergraduate Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Through opportunities provided by the Undergraduate Research and Opportunities program undergraduates will be able to clearly communicate research or creative project results to a general audience.

2: LO2: Retention
Providing Department: Undergraduate Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Undergraduate students who receive a UROP award will be retained at higher levels than those who do not receive a UROP award.

3: LO3: Research or Creative Question
Providing Department: Undergraduate Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
After students participate in the UROP program they will be able to articulate and refine a research question and gather evidence appropriate to the question by using credible sources that provide and enable comprehensive analysis and/or synthesis.

4: LO4: Critical Assessment of Assumptions
Providing Department: Undergraduate Research
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
After students participate in the UROP program they will be able to assess the validity of key assumptions and critically question viewpoints of previous scholarship.

Student Services

Academic Pathways to Excellence Program
1: Advisor Meeting Compliance
Providing Department: Academic Pathways to Excellence Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
APEX students will receive Advising from APEX Advisors by attending Advising appointments bi-weekly (or weekly for students on probation).

2: Academic Progress
Providing Department: Academic Pathways to Excellence Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The APEX Learning Communities (LC) assist first and second year APEX students with structured academic support led by peer tutors. The structured engagement and support work to promote a seamless and academically-enriched adjustment to college life. Students also enroll in two freshman level year courses which help them develop sound study habits, understand their academic responsibilities, and improve decision-making skills.

- Students will earn grades of "C" or better (or "S" in S/U courses) in each course each semester
  End of Semester grade report-% of students earning grades of C or better

3: Study Hour Compliance
Providing Department: Academic Pathways to Excellence Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will attend 8 hours of study on campus per week.

4: Group Study Sessions
Providing Department: Academic Pathways to Excellence Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
APEX Instructional Support staff will schedule and assign weekly study sessions for the purpose of guiding course-related activity and behaviors.
1.1: ASC Outcome FYS - Self as Learner
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Through seminar discussions, activities and a common reading experience, FYS 1010 students will develop a greater awareness of themselves as learners.

1.2: ASC Outcome FYS - Skills and Habits
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Through seminar discussions, activities and a common reading experience, FYS 1010 students will know the habits necessary for success in college.

2.0: ASC Outcome - Supplemental Instruction
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Through Supplemental Instruction, students will learn to integrate course content with study skills in order to enhance understanding of material.

3.1: ASC Outcome Comerica Scholars Learning Community - Sense of Belonging
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Active Comerica Scholars (those who meet with Project Manager twice per semester, communicate weekly with Peer Mentor and attend class sessions for FYS 1010, PS 1010 and COM 1010) will develop sense of belonging within the WSU community.
3.2: ASC Outcome Comerica Scholars Learning Community - Positive Experiences
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Active Comerica Scholars will have positive academic experiences.

3.3: ASC Outcome Comerica Scholars Learning Community - Resources
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Active Comerica Scholars will understand and take advantage of campus resources.

3.4: ASC Outcome Comerica Scholars Learning Community - Portfolios
Providing Department: Academic Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Active Comerica Scholars will build portfolios reflecting development of personal, academic and professional growth.

Career Services

1: Cooperative Education
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Expose students to the application and practice of concepts learned in their academic curriculum/major through a paid, supervised, and academically related work environment.

1: On-Campus Student Employment - Invest in Student Success
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Assist students with using critical thinking skills to form opinions and solve problems through their on-campus student employment experience.

2: Cooperative Education
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Expose students to oral and written communication practices/concepts through a paid, academically related, and supervised work environment.

2: On-Campus Student Employment - Invest in Student Success
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students with the development of effective time management skills through their on-campus student employment experience.

3: Cooperative Education
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students in gaining a meaningful educational experience through their Cooperative Education experience.

3: On-Campus Student Employment - Invest in Student Success
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students with oral communication skills through their on-campus student employment experience.
4: Cooperative Education
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students with better understanding of their chosen career path and academic objectives through their Cooperative Education experience.

4: On-Campus Student Employment - Invest in Student Success
Providing Department: Career Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students in working effectively with individuals from a variety of backgrounds, experiences, and cultures through their on-campus student employment experience.

Counseling and Psychological Services

1: Motivation for Self-Improvement/Personal Responsibility
Providing Department: Counseling and Psychological Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Our clients will demonstrate motivation for self-improvement and personal responsibility.

2: Client-reported improvement
Providing Department: Counseling and Psychological Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Our clients' mental health will improve (e.g., they will exhibit stronger coping skills).

3: Better Academic Performance
Providing Department: Counseling and Psychological Services
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Our clients' academic performance will be enhanced.

4: Outreach Learning
Providing Department: Counseling and Psychological Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
CAPS provides a number of different outreach presentations to the campus community. Attendees will report on a brief evaluation that they learned skills or acquired information that would be of use to them. With some outreach presentation formats, attendees will be able demonstrate skills.

Dean of Students

1: Learning Outcomes for Student Organizations Services Area
Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Student Organizations Services Area’s learning outcomes will enable student organization leaders to:

- Recognize and identify student organization resources, policies, and funding opportunities;
- Employ organizational management practices that support positive organizational sustainability;
- Develop strategies to recruit, retain, and continually motivate contributing members to the organization;
- Develop collaborative relationships with student organizations and university departments; and
- Provide student involvement opportunities that supports the Dean of Students Office embracement of Astin’s Theory of Involvement that leads to academic success.
- Learn how to navigate university resources so as to have successful organization operations and events.
- Begin to understand the connection of student organization involvement to academic success and student retention.

2: Learning Outcomes for Conduct and Care Area
Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
The Conduct and Care Area’s learning outcomes are to:

- Develop online resources to support students, faculty, and staffs reporting of student conduct issues;
- Establish students awareness of appropriate behavior;
- Provide informational programs designed to educate students on acceptable behavior with self and others.
- Enable faculty and staff to employ useful strategies to manage disruptive individuals;
- Encourage faculty and staff to utilize online conduct and care forms and resources to report disruptive students; and
- Intervene effectively when behavior violates the Code of Conduct.
- Implement processes that effectively administer federal compliance with Title IX as it relates to sexual misconduct on college campuses.
- Work to ensure entire campus community is aware of resources related to student conduct and Title IX.

---

**3: Learning Outcomes for Student and Campus Activities Area**

**Providing Department:** Dean of Students  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
The Student and Campus Activities Area's learning outcomes are to enable students to:

- Identify a variety of social and cultural activities and events on campus;
- Feel connected to student activities whether they live on campus or commute from off campus residences
- Discover the benefits of attending campus social and cultural events; and
- Describe the importance of learning and engaging with others different from themselves through these activities.
- Recognize and employ leadership opportunities within campus programming and cultural events.
- Provide students with leadership learning opportunities.

---

**4: Learning Outcomes for Fraternity and Sorority Affairs Area**

**Providing Department:** Dean of Students  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
The Fraternity and Sorority Affairs Area's learning outcomes will empower and educate students to:

- Learn and implement leadership and organizational management skills;
- Learn the importance of social responsibility;
- Illustrate the importance of collaboration within the academic fabric of the university
through programs focused on academic success; and

- Implement social and activities programming that directly supports academic success and community involvement.
- Understand importance of organization's mission being in line with, and supportive of, university mission.

5: Learning Outcomes for Gay, Lesbian, Bisexual, Transgender, Queer/Questioning, and Allies (GLBTQA) Area

Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Gay, Lesbian, Bisexual, Transgender, Queer/Questioning, and Allies Area’s learning outcomes will help campus community members:

- Recognize GLBTQA services available on-campus;
- Participate in campus activities focused on GLBTQA awareness; and
- Become trained as allies to GLBTQA students, faculty, and staff.
- Successfully transition this student life program to Office of Multicultural Student Engagement.

6: Learning Outcomes for Student Community Service Area

Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Student Community Service Area’s learning outcomes will help students:

- Identify opportunities to become involved in community service activities;
- Analyze and evaluate current community needs;
- Articulate an understanding of various ways to contribute to social change; and
- Describe knowledge and skills gained as a result of participation in community service activities.
- Identify how community service involvement supports students’ academic success and retention.
- Identify how community service involvement connects students’ to institutional affinity.

7: Learning Outcomes for Legacy and Affinity Programs Area

Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
The Legacy and Affinity Programs Area’s learning outcomes will embrace students in:

- Participating in student activities focused on school spirit and pride; and
- Joining student organizations whose mission is to promote a respect and allegiance for Wayne State’s history and harnesses the energy of “school spirited” student leaders.
- Transition this area to Warrior Pride area.

8: Learning Outcomes for Parent and Family Programs Area
Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Parent and Family Program Area’s learning outcomes will allow parents and family members to:

- Identify campus resources available to students and how to use them;
- Apply knowledge of campus resources by referring their students to them; and
- Be aware of student transitional issues.
- Identify parents and family members’ feeling of trust and connectedness to Wayne State.

9: Learning Outcomes for Marketing and Online Services Area
Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Marketing and Online Services Area’s learning outcomes will enable current students to:

- Identify the Dean of Students Office as the university department to contact to learn how to get involved on-campus;
- Identify the Dean of Students Office as the university department to contact for assistance in promoting events, programs, activities, and opportunities;
- Recognize opportunities for attendance at and involvement in student and campus activities;
- In support of Astin’s involvement theory, students will feel “connected” to Wayne State because they will immediately know how to get involved on-campus and in the community; and
- Engagement outside the classroom will motivate students to utilize university resources to reach personal and organizational goals.
- Educating faculty and staff on student affairs issues and activities, and identifying the Dean of Students Office as the WSU student affairs office.
10: Learning Outcomes for Warrior Pride

Providing Department: Dean of Students
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

The Warrior Pride’s learning outcomes will enable students to:

- Become involved in school spirit activities revolving around Wayne State athletics.
- Have a feeling of being “connected” to Wayne State.
- Learn ways to get involved on campus by joining student organizations, like the student cheering section—the Warrior Zone.
- Have a sense of school pride, called the Warrior Pride.
- Identify how school pride connects to the student's academic success and retention.

Educational Outreach

Extension Centers

1-1: Offer the “right” on-site services to increase student satisfaction.

Providing Department: Extension Centers
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Offer the “right” on-site services to increase student satisfaction.

- Evaluate current on-site services and programs at centers (add, eliminate or alter).
- Measure number of visits from academic and student support departments to centers.
- Design, integrate and communicate student programs.
- Review peak hours at the centers (maximize exposure).
- Conduct end of semester (fall and winter) surveys to all extension center students
- Compile and analyze end of semester survey results.

2-1: Increase participation of “quality” on-site student services, programs and activities.

Providing Department: Extension Centers
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Increase participation of “quality” on-site student services, programs and activities.
- Evaluate current on-site services and programs at centers (*add, eliminate or alter*).
- Evaluate and refine the centers communication to students.
- Evaluate on-site promotion/marketing at the centers (i.e. wayfinding, signage, etc.)
- Measure attendance rates of services, programs and activities.
- Conduct end of semester (fall and winter) surveys to all extension center students.
- Compile and analyze end of semester survey results.

---

**3-1: Increase the number of courses offered at centers.**

*Providing Department:* Extension Centers  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**

Wayne State University serves the higher education needs of the state, its communities, and its diverse peoples through five extension center sites in the metro Detroit area. Over 30 convenient areas of study can lead to endorsements; undergraduate and graduate certificates; baccalaureate, and graduate degrees in a rich, diverse, and inclusive environment.

- Measure the number of courses offered at the centers.
- Measure course enrollment trends at the centers.
- Measure the average class size at the centers.
- Identify needed courses to complete academic program(s) offered at the centers.
- Conduct end of the semester (fall and winter) survey asking for additional course suggestions.
- Design other collection methods to identify additional course offerings at the centers.

---

**4-1: Increase the number of “complete” academic programs at centers.**

*Providing Department:* Extension Centers  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**

Increase the number of “complete” academic programs at centers.

- Identify the current academic offerings at the centers.
- Measure the average class size for courses in the academic programs offered at the centers.
- Identify the missing courses for academic programs offered at the centers.
- Measure the current enrollments at the centers.
- Conduct end of the semester (fall and winter) survey asking for additional academic
• Design other collection methods to identify additional academic programming suggestions.
• Recommend additional academic programming at the centers.

5-1: Maximize resources to improve the centers learning environment and management.
Providing Department: Extension Centers
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Maximize resources to improve the centers learning environment and management.

• Conduct a building/center classroom audit.
• Increase classroom space (Oakland and Schoolcraft Centers)
• Complete ATEC room improvements (battery lab, teaching lab and Cyber Range).
• Evaluate current facilities (i.e. WSU buildings) plan in collaboration with FP&M.
• Recommend additional classroom technology improvements.

6-1: Offer State-of-the-Art Facilities
Providing Department: Extension Centers
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students enrolled in a range of subjects can pursue their classes using state-of-the-art classrooms and learning facilities at five extension center sites. The numerous sites feature laboratories and advanced classroom settings. Programming is specifically selected to complement fast-growing industries that play key roles in the economy, and will help ensure that employers have a well-prepared, educated workforce.

Transfer Student Success Center

1.0: Build Engagement with Community College Partners
Providing Department: Transfer Student Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Continual proactive communication with community college partners to create opportunities for engagement and to develop strategic partnerships. The Center provides excellent customer service to our community college partners.
2.0: Create Opportunities for Transfer Students to Engage
Providing Department: Transfer Student Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Create and develop opportunities for transfer students to personally engage with Wayne State. These include in-person communication opportunities, electronic communications, events and other engagement activities.

3.0: Increase Number of Direct Student Contacts
Providing Department: Transfer Student Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Increase number of students who contact the TSSC for information. Students may use multiple communication channels, including in-person, e-mail, and telephone, and the TSSC is prepared to respond.

4.0: Evaluate Customer Service Satisfaction
Providing Department: Transfer Student Success Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The TSSC will provide excellent customer service to fulfill its mission. Service will be excellent across all communication channels used by students.

Housing and Residential Life

1: Resident Assistants inform residents of campus resources relevant to their needs.
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Resident Advisors inform residents of campus resources that are relevant to their needs.
2: Resident Assistants build rapport with their residents.
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Resident advisors build rapport with their residents.

3: Student participation in housing programs increases persistence.
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student participation in housing programs increases persistence.

4: Judicial process is an educational process
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Judicial process changes resident behavior.

5: FTIAC residents perform well academically
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Residents who are FTIACs living in the residence halls outperform their counterparts who do not live in the residence halls.

6: Guests who visit the residence halls and apartments are predominately Wayne State University students.
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Guests who visit the residence halls and apartments are predominately Wayne State University students.
7: Resident Advisors talk with their residents about their academics.
Providing Department: Housing and Residential Life
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Resident Advisors talk with their residents about their academics.

Office of Financial Aid

L01: Administrative Capability
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Wayne State University can demonstrate to the U.S. Department of Education (ED) that it is capable of adequately administering the Title IV programs, using the standards established in 34 CFR 668.16 as a guide.

L02: Default Rates
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Wayne State University takes steps to avoid excessive default rates in accordance with Subpart N of Section 668 of the Code of Federal Regulations (CFR).

L03: Satisfactory academic progress
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Satisfactory Academic Progress Policy is readily available to students, satisfies state or federal requirements and is being appropriately applied in individual student situations.
L04: Financial aid disclosures
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Wayne State University completes Title IV responsibilities that include the legal obligation to disclose financial assistance information for students and to the public as outlined in 34 CFR 668.42 and 34 CFR 601.21.

LO1: Administrative Capability
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Wayne State University can demonstrate to the U.S. Department of Education (ED) that it is capable of adequately administering the Title IV programs, using the standards established in 34 CFR 668.16 as a guide.

LO2: Default Rates
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Wayne State University takes steps to avoid excessive default rates in accordance with Subpart N of Section 668 of the Code of Federal Regulations (CFR).

LO3: Satisfactory academic progress
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Satisfactory Academic Progress Policy is readily available to students, satisfies state or federal requirements and is being appropriately applied in individual student situations.

LO4: Financial aid disclosures
Providing Department: Office of Financial Aid
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Wayne State University completes Title IV responsibilities that include the legal obligation to disclose financial assistance information for students and to the public as outlined in 34 CFR 668.42 and 34 CFR 601.21.

Office of International Programs (OIP)

1.0: Increase and diversity our international student body
Providing Department: Office of International Programs (OIP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
1.1. Increase international enrollments to at least 3000 students (at least 10% of student body)

1.2. Grow our undergraduate international enrollment numbers to 40% of total international student body

1.3. Develop a cohesive and comprehensive tuition and scholarship model for recruiting international student

1.4. Increase the number of sponsored students

2.0: Internationalize the curriculum
Providing Department: Office of International Programs (OIP)
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
2.1. Work with schools and colleges to ensure that internationalization is part of their strategic plans

2.2. Facilitate the development of global pathways within academic departments that provide students with the opportunity to gain global competencies regardless of their major

2.3. Ensure global competencies are embedded in the university’s general education requirements and support student success.

2.4. Develop opportunities for students to engage in global experiences locally and abroad
3.0: Increase student and faculty global mobility

Providing Department: Office of International Programs (OIP)

Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

3.1. Double and diversify the number of WSU students studying abroad

3.2. Increase the number of faculty engaged in teaching, researching or consulting abroad

3.3. Increase the number of Fulbright (student and faculty) and other national and international fellowship awards

3.4. Increase the number and diversity the study abroad experiences (by country and discipline) available to students

3.5. In collaboration with the University Development, launch a campaign to secure funding support for study abroad

3.6. Create resources for students and faculty to identify international opportunities

4.0: Enhance WSU’s global Profile

Providing Department: Office of International Programs (OIP)

Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

4.1. Continue to invest in developing strategic education and research partnerships with prominent international institutions across the globe

4.2. Cultivate our network of international alumni

4.3. Create opportunities for faculty to teach, conduct research, or consult at partner institutions across the globe

4.4. Highlight and promote the work WSU Faculty are doing around the world

4.5. Develop competitive awards to foster faculty’s global engagement and participation

English Language Institute

1.1: Speaking Proficiency Outcome

Providing Department: English Language Institute

Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**

Students present oral speeches and interact in extended discussions on general topics in informal and formal contexts appropriate for entering the university.

---

**1.2: Listening Proficiency Outcome**

**Providing Department:** English Language Institute  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students listen to standard spoken language and sustained speech (such as in academic lectures), live or broadcast, on both familiar and unfamiliar topics normally encountered in personal, social, academic or vocational life.

---

**1.3: Writing Proficiency Outcome**

**Providing Department:** English Language Institute  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will be able to write a well-developed academic essay related to the topics in an academic reading.

---

**1.4: Reading Proficiency Outcome**

**Providing Department:** English Language Institute  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will be able to summarize, analyze, and synthesize information from academic texts.

---

**1.5: Grammar Proficiency Outcome**

**Providing Department:** English Language Institute  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**

Students will be able to communicate effectively on academic topics with minimal
grammatical errors that do not interfere with meaning.

OISS

**LO1: Advising Appointments**

**Providing Department:** OISS  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
- Students advising concerns are addressed and met in the fewest number of visits
- Students are able to meet with an advisor during walk-in advising hours within 30 minutes of their arrival

**LO2: Completeness of documents**

**Providing Department:** OISS  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
- Student documents are timely and accurately prepared

**LO3: Provide accurate information about university and federal requirements, policies, and procedures**

**Providing Department:** OISS  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
- Advisors will stay up to date with, and effectively communicate university and federal requirements, policies and procedures.
- Advisors will have easy access to changes in information relevant to the advising process.
- Advisors will regularly review their advising resources to ensure that they are accurate and accessible.
LO4: Student access and understanding of requirements
Providing Department: OISS
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will know how to access accurate information about requirements, policies and procedures.
- Students will be knowledgeable about academic regulations, policies and procedures.

Study Abroad

LO1: Foster Personal Growth - Program Impact
Providing Department: Study Abroad
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will develop an understanding of different cultures
- Students will gain self-awareness, maturity and self-confidence

LO2: Develop Deeper Knowledge and Understanding of Cultures through Intercultural Engagement
Providing Department: Study Abroad
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will evaluate their preconceptions and stereotypes about other cultures
- Students will be able to express the type and degree of engagement of their immersion into local culture

LO3: Academic Development and Intellectual Growth
Providing Department: Study Abroad
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
- Students will gain a better understanding of the program goals and objectives
- Students will be exposed to academic content not available on-campus
- Students will improve their independent learning
LO4: Alignment of program and student goals  
Providing Department: Study Abroad  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
- Do students know and understand the goals and objectives of the program they are participating in?  
- What is the degree of integration of intercultural experience into academic courses?

Office of Military and Veterans Academic Excellence  

1415-2.1: Early VA Certification  
Providing Department: Office of Military and Veterans Academic Excellence  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Our goal is to reduce the last minute certifications by 15% through increased awareness and by instilling a sense of urgency in our student veterans using multiple mediums to get the word out.

Early registration and VA certification aids in avoiding future pay problems with the VA and is the first step in academic success for a student veteran. Currently 37% of our student veterans certify within 30 days prior to the start of the semester and another 18% of our student veterans certify after the semester has begun. Waiting until the last minute creates opportunities for mistakes by the VA School Certifying Official due to the volume of requests that have to be completed at the last minute and demonstrates a lack of training or planning by the student.

1415-3.1: Student Veteran Resource Center Usage  
Providing Department: Office of Military and Veterans Academic Excellence  
Start: 9/1/2017  
End: 8/31/2018  

Learning Outcome Description  
Our goal is to increase the monthly usage by at least 10% for AY2016-2017.
Our Student Veteran Resource Center (SVRC) has grown from ~240 monthly users when we first opened the doors in SY 2011 to ~560 monthly users in SY13-14. The SVRC is the central point on campus where veterans/military can go to find out about the comprehensive support service that our department offers. In order to better serve our cohorts needs in the future, we must first get them to use the existing resources.

---

**1516-1.1: Plan of Work Compliance**

*Providing Department:* Office of Military and Veterans Academic Excellence  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**

**Plan of Work Compliance:** It is our goal to be 100% in compliance and maintain this for all future semesters as new student veterans are in processed.

**ABC Structure of Program Outcome:** By informing and enforcing standards, 100% of VA Educational Benefit recipients will have a Plan of Work signed by their Academic Advisor on file in OMVAE before VASCO processes request for certification.

**Why:** Having a Plan of Work (POW) signed by an Academic Advisor (AA) is not only an excellent way to ensure academic success but it is also a requirement if you are using VA Educational benefits. Most have a POW on file but for those that do not, we have been using the STARS Degree Audit and AA experience to verify that registered classes are eligible for certification. This method had worked thus far but it is not efficient and, more importantly, errors could affect student success and put us out of compliance with Federal regulations.

---

**1617-4.1: Academic Advising Compliance**

*Providing Department:* Office of Military and Veterans Academic Excellence  
*Start:* 9/1/2017  
*End:* 8/31/2018

**Learning Outcome Description**

**Academic Advising Compliance:** Our goal is to encourage benefit recipients to meet their primary academic advisor at least once each semester.

**ABCD Structure of Program Outcome:** Benefit recipients will meet with their primary academic advisor twice per academic year.

**Why:** Academic advising is an essential element of academic success.
1: Information and Referral
Providing Department: Ombudsperson
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Ombuds Office provides relevant information, and/or or referral, to all who contact it.

2: Confidential Forum for Academic Concerns and Resolutions
Providing Department: Ombudsperson
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Ombuds Office provides a confidential forum where students can express their feelings and examine their concerns regarding academic issues, such as class and teacher problems, with a neutral party, and explore potential solutions. Faculty contact the Ombuds Office regarding problems with students as well.

3: Financial and Student Service Intervention and Learning
Providing Department: Ombudsperson
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Assist students with financial and other student service issues that interfere with academic goal completion. Report systemic processing issues to appropriate departments.

4: Tuition and Fee Appeals
Providing Department: Ombudsperson
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Tuition and Fee Appeals Board (TFAB) is chaired by the Ombudsperson. The TFAB considers withdrawals and tuition cancellation requests from students due to medical issues and extenuating circumstances. It is the final arbiter of tuition and fee cancellation matters at the University, and, in many cases, a positive decision from the Board is the only way a student can financially continue toward graduation. The Ombuds staff assists the affected students in packet completion, and the Ombudsperson presents the appeal to the Board. For exception requests based on student error, trends are reported to the Registrar and other units for consideration of measures to mitigate factors that might contribute to such mistakes.
1: Improve Degree Reporting Times
Providing Department: Registrar
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Degrees are certified by departments and schools/colleges, and then reported to the Registrar. The Registrar, in turn, reports degrees to National Student Loan Clearinghouse. Federal law requires this be done within 30 days of the end of term in which student is completing. This is a completion date we need to meet. In addition, there are numerous university processes which wait for timely degree posting such as graduation rate calculations, and alumni development activities.

2: Reduce Course Withdrawal Rates
Providing Department: Registrar
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Course withdrawal rates have been historically high at WSU. This negatively impacts student success. Launch the “Smart Check” process for 2013-2014, to provide active intervention when students request course withdrawal. Intervention will include advising students of impact of course withdrawal on academic progress, time to degree, financial aid eligibility and student loan repayment status.

3: Reduce Contacts in the Student Services Center
Providing Department: Registrar
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students visit the Student Services Center to request information and services for the Registrar's Office. Through improvements in business processes and proactive communications, reduce the number of students who contact the SSC for our information and services.
4: Reduce Number of Missing Grades After Final Exam Period
Providing Department: Registrar
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Missing grades after the final exam period has historically been a problem at WSU, requiring much effort to collect. The Registrar reaches out to faculty, chairs, deans, and then finally the Provost's Office to get missing grades posted. Missing grades impacts our ability to certify students for graduation, process repeated coursework, run financial aid satisfactory academic progress processes, as well as notify students whether or not they are in academic difficulty. By reducing the number of missing grades, we can speed up other end of term processes and better serve students.

Student Disability Services

1: SDS LEARNING OUTCOME 1 Registration
Providing Department: Student Disability Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description

Students with disabilities will choose to register with SDS.

2: SDS LEARNING OUTCOME 2 TESTING
Providing Department: Student Disability Services
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
Students with disabilities approved for testing accommodations will make requests for testing accommodations using the online student request process.

3: SDS LEARNING OUTCOME 3 ACCOMMODATIONS THAT ENHANCE STUDENT SUCCESS
Providing Department: Student Disability Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students registered with Student Disability Services will use accommodations that support their academic success.

4: SDS LEARNING OUTCOME 4 RESOURCE AND INFORMATION NEEDS
Providing Department: Student Disability Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Student Disability Services will identify resource and information needs that will enhance student satisfaction with SDS support services and effectiveness of its resources and services.
1.0: Provide Excellent Customer Service
Providing Department: Student Services Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Student Service Center will provide excellent customer service to make students feel welcome and appreciated by the University.

2.0: Provide First Contact Resolution
Providing Department: Student Services Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Student Service Center will provide accurate and timely information to students to help them make well-informed decisions that support their educational success. We will answer questions and resolve issues at the first point of contact with a student, parent, or community member.

3.0: Subject Matter Expert
Providing Department: Student Services Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will recognize enrollment service specialists as an expert source of information about financial aid, undergraduate admissions, records and registration, and student accounts receivable.

4.0: Knowledgebase Development
Providing Department: Student Services Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Create a searchable intranet version of our training that employees find easy to use and informative, which will eventually be available for students also.
1: SET Goal

Providing Department: Testing, Evaluation and Research Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will increase their participation in SET.

1: Testing Goal

Providing Department: Testing, Evaluation and Research Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Efforts at providing online registration for tests will be appreciated. Students will share their tips for ways to improve the program.

2: SET Goal

Providing Department: Testing, Evaluation and Research Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
SET will decrease turnaround time for faculty reporting.

2: Testing Goal

Providing Department: Testing, Evaluation and Research Services
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will describe their experience registering for tests as convenient, respectful, and professional.

TRIO/Access Program

1: McNair Scholars perceive to have enhanced research skills.

Providing Department: TRIO/Access Program
Start: 9/1/2017
End: 8/31/2018
Learning Outcome Description
In order to ensure that McNair Scholars are prepared for graduate school it is important that a faculty-mentored research experience takes place. The research methods course is designed to provide an orientation to qualitative and quantitative research techniques. Additionally, these experiences should increase the scholars' perceived research skills.

1: McNair scholars have enhanced research skills.
Providing Department: TRIO/Access Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
In order to ensure that McNair Scholars are prepared for graduate school it is important that a faculty-mentored research experience takes place. Additionally, these experiences should increase the scholars' perceived research skills.

2: McNair Scholars will have increased persistence in their proposed science major.
Providing Department: TRIO/Access Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Participants in the program should continue matriculation in their respective major. The program should support completion of the degree, especially those pursuing STEM degrees. Students should have increased confidence in ability to complete the Bachelors' degree.

3: McNair Scholars will enroll in post baccalaureate programs immediately following degree completion.
Providing Department: TRIO/Access Program
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Per McNair Scholars program requirements from the Department of Education it is important that majority of the student enter graduate school immediately following completion of the undergraduate degree.

4: Increased attainment of PhDs among underrepresented populations.
Providing Department: TRIO/Access Program
Start: 9/1/2017
End: 8/31/2018
**Learning Outcome Description**
The program supports underserved populations at the university, namely first generation, low-income or minority students. These populations are least likely to pursue a doctoral degree, so the program provides academic services to these students to make graduate education to the PhD level can be more readily completed.

---

5: Scholars have high levels of self-confidence and motivation to pursue post baccalaureate degree.

**Providing Department:** TRIO/Access Program  
**Start:** 9/1/2017  
**End:** 8/31/2018

---

6: McNair scholars feel a sense of community and build professional networks among themselves.

**Providing Department:** TRIO/Access Program  
**Start:** 9/1/2017  
**End:** 8/31/2018

---

**Undergraduate Admissions**

1: Strategically Recruit New Students

**Providing Department:** Undergraduate Admissions  
**Start:** 9/1/2017  
**End:** 8/31/2018

**Learning Outcome Description**
Our office will provide admissions programs and services to students, parents, and counselors to support the college enrollment process. Provide educational programs, events and services to prospective students, their families, and school counselors to support higher education attainment. Utilize data and participant survey results to improve and enhance programs to respond to the needs of prospective and admitted students. Collaborate with community based organizations to provide effective and needed programming for first generation, low-income and Pell eligible students to remove barriers to access higher education. Review programs on an annual basis to measure effectiveness.
2.: New Student Yield Events and Activities
Providing Department: Undergraduate Admissions
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Office of Undergraduate Admissions collaborates with Wayne State's Schools/Colleges and Student Support Services offices to implement several events and activities to increase new student enrollment. The Fall Open House, Spring Open House, Warrior Preview Days, Admitted Student Day, Transfer Open House, Scholars Day, Individual Campus Tours and Group Campus Tours are implemented to provide students and their parents information about Wayne State's academic programs, financial aid, scholarships, housing, campus life and student support services. The information provided during the events are necessary in order to help meet enrollment goals.

3.: Technology Usage for Recruitment
Providing Department: Undergraduate Admissions
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Enhance the Office of Undergraduate Admissions strategic recruitment efforts by leveraging technology to utilize data sources, needed to measure recruitment outcomes. UGA has implemented an artificial intelligence chat bot to meet students where they are on their mobile devices to provide assistance with the enrollment process on a 24/7 basis. The use of the chat bot helps reduce summer melt and increase enrollment by providing relevant nudges and targeted messaging to specific audiences to complete important next steps for enrollment. FTIAC enrollment increased by 14.5% for fall 2018.

4.: Strategic Communication with Targeted Populations
Providing Department: Undergraduate Admissions
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
The Office of Undergraduate Admissions engages prospective students, parents and school counselors through mailings, emails, phone calls, newsletters and other communication campaigns to strategically increase new student enrollment. Communication messages are targeted to specific audiences and provide a call to action for the various audiences in the admissions/enrollment process.
UAC LO 1.1: Progress Towards Degree
Providing Department: University Advising Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will demonstrate progress towards degree by enrolling in classes and completing classes with appropriate grades.

UAC LO 2.1: Basic Composition
Providing Department: University Advising Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will complete the Basic Composition requirement during the first 30 credit hours.

UAC LO 3-1: Exploratory Student Program
Providing Department: University Advising Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will identify and declare a major or commit to a professional program by 30 credit hours.

UAC LO 4.1: Pre-Professional Student Program
Providing Department: University Advising Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Pre-professional students will enroll in the appropriate courses and maintain competitive gpa to be admissible to their respective professional programs.

UAC LO 5.1: Pre-Med Health Science Center
Providing Department: University Advising Center
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students pursuing Medicine, Dental Education, Physician Assistant Studies, and Veterinary Medicine will effectively utilize appropriate Pre-Med and Health Science Center services to support their coursework in meeting the goal of
admission to their desired program.

New Student Orientation

1.0: NSO_LO 1.0
Providing Department: New Student Orientation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will be able to identify at least three resources on campus that they plan to utilize to support their success in college.

2.0: NSO_LO 2.0
Providing Department: New Student Orientation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will identify at least one peer and one WSU faculty or staff member during orientation.

3.0: NSO_LO 3.0
Providing Department: New Student Orientation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will describe the financial responsibility of earning a Wayne State degree.

4.0: NSO_LO 4.0
Providing Department: New Student Orientation
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
Students will illustrate the value of the advising process and the importance of communicating with an advisor.
WSU Assessment

**LO1: Identify the assessment cycle**
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs identify the program assessment cycle’s stages, purposes, and benefits.

**LO2: Compose mission statements**
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs compose mission statements that reflect best practices.

**LO3: Compose learning outcomes**
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs compose learning outcomes that reflect best practices.

**LO4: Select sustainable assessments**
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs select sustainable assessments that provide useful data for understanding whether their stakeholders are achieving their program's learning outcomes.
LO5: Use data for decision-making
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs use their assessment data to make logical decisions about what to retain or change in their program.

LO6: Carry out action plan
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs carry out their data-driven decisions to improve their program.

LO7: Close the loop
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty and staff from academic and co-curricular programs close the loop by re-assessing whether their improvements efforts had the desired effect.

PG10: Believe efforts are valued
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty, staff, and administrators from academic and co-curricular programs believe that program assessment efforts are valued.

PG8: Meet documentation requirements
Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty, staff, and administrators from academic and co-curricular programs meet annual
PG9: Expand participation

Providing Department: WSU Assessment
Start: 9/1/2017
End: 8/31/2018

Learning Outcome Description
WSU faculty, staff, and administrators from academic and co-curricular programs expand the number of individuals engaging in program assessment.