

MATHEMATICS EDUCATION (MAE)

MAE3143 INTERACTIVE MIDDLE SCHOOL MATHEMATICS PROJECTS (3.00 Credits)

This course is designed for students who are majoring in middle and secondary mathematics education and who will be obtaining teaching certification in grades 5-9 and 6-12. In this course students learn principles of effective curriculum design and assessment and apply these principles by designing and developing interactive mathematics curriculum projects for middle school students. This course is requires structured clinical placement in which students present their projects in a middle school classroom environment. This course addresses specific Sunshine State Standards, subject matter competencies, and pedagogy pertinent to the discipline and required certification. (20 school-based hours)

Total Contact Hrs: 48.00

Lecture Hrs: 48.00

Fees: LIABILITY INSURANCE \$8.15

Complete all the courses in one of the following options:

- Option 1 - Prerequisite: EDF3280 (minimum grade: C) and EDF4430 (minimum grade: C) and EDG4410 (minimum grade: C) and EEX3011 (minimum grade: C) and MAE4320 (minimum grade: C) and RED3342 (minimum grade: C) and TSL3080 (minimum grade: C), Corequisite: MAE3941
- Option 2 - Prerequisite: EDF3280 (minimum grade: C) and EDF4430 (minimum grade: C) and EDG4410 (minimum grade: C) and EEX3011 (minimum grade: C) and MAE4330 (minimum grade: C) and RED3342 (minimum grade: C) and TSL3080 (minimum grade: C), Corequisite: MAE3941

MAE3941 TEACHING MIDDLE AND SECONDARY SCHOOL MATHEMATICS (3.00 Credits)

This course will provide the student with the opportunity to observe, interact and work in the mathematics classroom. It is designed to give practical experiences to preprofessional students through school-based experiences in public and approved private school classrooms. Preprofessional students work directly with classroom teachers and have opportunity to teach both large and small group activities. This course is also designed to develop the competencies relative to program planning, instruction, daily scheduling, record keeping, evaluation, classroom management, reporting to parents, professional organizations, and teacher ethics. Students spend a minimum of 60 school-based hours in the classroom. An Extensive Writing Component in the form of a journal is required.

Total Contact Hrs: 108.00

Lecture Hrs: 48.00

Other Hrs: 60.00

Fees: EDU/ACCIDENT INSURANCE \$4.75

Complete all the courses in one of the following options:

- Option 1 - Prerequisite: MAD2104 (minimum grade: C) and MAE4320 (minimum grade: C) and MAS2103 (minimum grade: C) and MHF4404 (minimum grade: C) and MTG3212 (minimum grade: C)
- Option 2 - Prerequisite: MAD2104 (minimum grade: C) and MAE4330 (minimum grade: C) and MAS2103 (minimum grade: C) and MHF4404 (minimum grade: C) and MTG3212 (minimum grade: C)

MAE4310 METHODS OF TEACHING MATH IN ELEMENTARY SCHOOL (3.00 Credits)

This course provides content and methods designed for the development of knowledge, skills, and dispositions necessary to prepare pre-service teachers to teach elementary mathematics to students of diverse backgrounds. This course provides the pre-service teacher with an up-to-date perspective of being a professional within the field of mathematics education based on five content areas identified by the Florida's B.E.S.T. Standards for Mathematics. It is designed to involve the learner in an exploratory, hands-on/ minds-on problem solving classroom that encourages the pre-service teacher to problem solve, communicate with others about mathematics, and make mathematical connections while working individually and within groups to complete activities and assignments.

Total Contact Hrs: 63.00

Lecture Hrs: 48.00

Other Hrs: 15.00

Fees: EDU/ACCIDENT INSURANCE \$4.75

Complete all the courses in the following option:

- Pre or Corequisite: EDF3280 (minimum grade: C)

MAE4320 METHODS OF TEACHING MATHEMATICS IN MIDDLE SCHOOL (3.00 Credits)

This course is designed to introduce methods and strategies that have been proven to be effective for teaching middle school mathematics. Topics in appropriate instructional techniques and selection of appropriate resources for diverse classroom activities. Additional topics include real world applications, the use of technology, understanding the diverse learner, multiple means of assessment and learning styles. In this course, the pre-professional educator learns principles of effective curriculum design and assessment and applies these principles by designing and developing interactive mathematics curriculum projects for middle school students. This course addresses specific Sunshine State Standards subject matter competencies.

Total Contact Hrs: 63.00

Lecture Hrs: 48.00

Other Hrs: 15.00

Fees: EDU/ACCIDENT INSURANCE \$4.75, EDU/ACCIDENT INSURANCE \$4.75

Complete all the courses in the following option:

- Option 1 - Prerequisite: EDF3280 (minimum grade: C) and MAC2311 (minimum grade: C)

MAE4330 METHODS OF TEACHING MATH IN SECONDARY SCHOOL (3.00 Credits)

This course is designed to introduce methods and strategies that have been proven to be effective for teaching secondary school mathematics. Topics in appropriate instructional techniques and selection of appropriate resources for diverse classroom activities, real world applications, the use of technology, understanding the diverse learner, multiple means of assessment and learning styles. The pre-professional educator learns principles of effective curriculum design and assessment and applies these principles by designing and developing interactive mathematics curriculum projects for secondary students. This course addresses specific Floridas B.E.S.T. Standards subject matter competencies and pedagogy pertinent to the discipline. Contact instructor for details regarding 15 hours of field.

Total Contact Hrs: 48.00

Lecture Hrs: 48.00

Fees: EDU/ACCIDENT INSURANCE \$4.75

Complete all the courses in the following option:

- Option 1 - Prerequisite: EDF3280 (minimum grade: C) and MAC2311 (minimum grade: C)

MAE4944 STUDENT TEACHING IN MATHEMATICS (12.00 Credits)

This course is designed to "provide students with multiple opportunities to practice implementing the 12 Florida Educators Accomplished Practices including effective planning, instruction, management and assessment techniques in a real- world middle and high school classroom setting under the supervision of a certified teacher.

Total Contact Hrs: 562.50

Other Hrs: 562.50

Fees: EDU/ACCIDENT INSURANCE \$4.75, EDU/ACCIDENT INSURANCE \$4.75

MAE4945 STUDENT TEACHING IN MATHEMATICS (12.00 Credits)

This course is designed to "provide students with multiple opportunities to practice implementing the 12 Florida Educators Accomplished Practices including effective planning, instruction, management and assessment techniques in a real- world middle and high school classroom setting under the supervision of a certified teacher.

Total Contact Hrs: 574.50

Lecture Hrs: 12.00

Clinical Hrs: 562.50

Fees: EDU/ACCIDENT INSURANCE \$4.75