MATHEMATICS (MATH)

MATH 815 – Topics in Discrete Mathematics for the Secondary School Teacher 3 credit hours

This course will provide an introduction to combinatorics and graph theory, with an emphasis on applications, as well as preparing materials and lesson plans that can be brought into the middle and secondary math classroom.

Prerequisite: MATH 250 or other proof based mathematics course

MATH 862 - Mathematical Analysis for Teachers 3 credit hours

A study of sequences, series, limits, continuity, differentiation, and integration from an instructional perspective.

Prerequisite: Two semesters of Calculus or MATH 202.

MATH 864 - Geometry for Teachers 3 credit hours

This course helps students improve their understanding of plane geometry as commonly taught in high school. It focuses on Euclidean geometry through an axiomatic approach, with a brief exploration to neutral geometry as well. It also includes a technology component using an interactive computer program (e.g., GeoGebra) to enhance learning geometry.

Prerequisite: Admission into Science/Math Education Program

MATH 871 - Topics in Math 3 credit hours

Recent trends in the content of the math curriculum and procedures for the improvement of teaching mathematics in the high school. Department Consent Required Total Credits Allowed: 12.00

MATH 895 - Independent Study in Mathematics 1-3 credit hours

Individual studies and research under the guidance of a faculty member. May be taken twice for two separate studies. Department Consent Required Total Credits Allowed: 6.00

MATH 896P - Mathematics Seminar 1 credit hour

Topics not included in the normal mathematics offerings are presented by the students.

Department Consent Required

Prerequisite: MATH 260 and permission of instructor