## **COURSE SLO REPORT - MATHEMATICAL SCIENCES DIVISION**

COURSE SLO STATEMENTS - MATH (PROSPECTIVE ELEMENTARY SCHOOL TEACHERS)

	COURSES	LO STATEMENTS - MATH (PROSP	ECTIVE ELEMENTARY SCHOOL TEACHERS)
Course ID	Course Name	Course SLO Title	Course SLO Statement
ECC: MATH 110	Structures/Concepts in Math	SLO #1 Perform and Interpret Basic Operations	Students will be able to demonstrate/perform the four basic operations with real numbers and interpret the results.
		SLO #2 Explain Mathematical Concepts	Students will be able to explain the underlying mathematical concepts of the binary operations using written and oral means.
		SLO #3 Solve Application Problems	Students will be able to solve an application problem and design an application when parameters are given.
	Math for Elem School Teachers Geom, Prob, and Stats	SLO #1 Compute Probability	Students will be able to compute the probability of an event.
		SLO #2 Analyze Statistical Graphs	Students will be able to draw and interpret statistical graphs.
		SLO #3 Central Tendency and Dispersion	Students will be able to compute and interpret measures of central tendency and dispersion.
		SLO #4 Solving Congruence Problems	Students will be able to solve problems involving congruence and similarity of geometric figures.
		SLO #5 Converting Measurements	Students will be able to convert between American and metric units of measurement.
ECC: MATH 115	Prob/Stats-Elem School Tchrs	SLO #1 Research Study	Students will be able to design a research study, develop an appropriate assessment instrument, collect and analyze data using appropriate methods, and draw statistical inferences from the data in written form.
		SLO #2 Analyze Statistical Procedure	Given a particular set of data, students will be able to determine the appropriate statistical procedures to analyze and display the data, complete the statistical methods, and explain the mathematical concepts in written and oral forms.
		SLO #3 Explain Statistics and Probability Concepts	Given a particular set of data, students will be able to explain statistics and probability concepts and use appropriate methodologies for elementary or middle school teachers.
		SLO #4 Solve and Interpret Experimental and Mathematical Probability	Students will be able to solve, explain, and interpret informal, experimental, and mathematical probability concepts and application problems both in written and oral forms.
ECC: MATH 116	Geom/Msurement-Elem Schl Tchrs	SLO #1 Identify Geometric Shapes	Students will identify two- and three-dimensional geometric shapes, explain their attributes and discuss the relationships among the geometric shapes.
		SLO #2 Use Geometric Tools	Students will use geometric tools (compass, protractor, straightedge, and dynamic geometry software) to construct geometric figures.
		SLO #3 Solve and Interpret Geometric Application Problems	Students will use the concepts of measurement to solve geometric application problems, determine the appropriateness of a solution, and if errors are made, explain the misconceptions or errors made and how to solve the problem correctly using written or oral means.
		SLO #4 Explain Geometric Formulas	Students will use words and diagrams to explain the derivation of geometric formulas.
Distinct Count:4			Distinct Count:16