Program Learning Outcome Summary Report

Year	2019 - 2020	Period	Last 3 Years
Department	Mathematics	Discip	MATH

Program Learning Outcomes

		# of Students Meeting SLO Rubric				# 3 or	% 3 or
# Program Le	Program Learning Outcome Statement	1	2	3	4	higher	higher
1	Develop a positive attitude or improve their attitude toward mathematics.	23	37	98	112	210	77.78%
2	Recognize, define, and use formal mathematic notation as appropriate to the course outline.	120	76	206	303	509	72.20%
3	Successfully perform mathematical calculations and applications required for the subsequent course in mathematics.	387	308	763	783	1546	68.99%
4	Apply mathematical reasoning to a variety of real-life situations	131	118	292	228	520	67.62%
5	N/A	2	4	4	13	17	73.91%

39 Reflection(s)

- Keep monitoring fast track classes, they seem to do very well. (MATH-095-24 for 2017FA)
- These SLO results will be discussed during a Math Department meeting. (MATH-095-10 for 2017FA)
- Making this a 5 unit course. (MATH-102-30 for 2017FA)
- It will help when this class becomes a 5 unit course. Very hard for students as fast track class. (MATH-102-24 for 2017FA)
- This class is going to be changed to a 5 unit course. (MATH-102-25 for 2017FA)
- No actions to report (MATH-110-50 for 2017FA)
- No action required. (MATH-090-60 for 2017FA)
- Understand the basic concepts of statistics using two way tables, mean, standard deviation. Know the order of operations to evaluate equations and formulas. (MATH-085-35 for 2017FA)
- Introduce the definition of a limit earlier in the course so that student can see relate graphs and functions to limits and why they are a concept.

(MATH-160-55 for 2017FA) Continue working with students not scoring with a 3 or higher in the rubric to get them to see the value of practicing course content in order to be successful in any course. (MATH-090-55 for 2017FA) Continue working with students to help them be successful in any course they take (MATH-095-45 for 2017FA) We are starting to see lower success rates due to the new placement procedures just implemented. The mathematics department will discuss this as a collective whole. (MATH-095-10 for 2018SP) Nothing to propose. 2 Section(s) Co-requisite labs have been created to help student success. 3 Section(s) Making the class more geared for Calculus. (MATH-160-55 for 2018SP) To report about different kinds of problems separately: percent problems, geometry problems.... (MATH-962-35 for 2018SP) To be discussed in a departmental meeting. (MATH-095-01 for 2018SM) • Results will be discussed in a department meeting. 4 Section(s) Nothing was changed. (MATH-095-61 for 2018FA) n/a (MATH-250-20 for 2018FA) To improve SLO # 2: Incorporate, reinforce, and assess the use of the six trigonometric functions with commonly-used angles. To improve SLO # 3: Expand the activities and class time spent on solving trigonometric equations and proving identities. (MATH-103-60 for 2018FA) • Expand activities and class time spent on central tendency, dispersion, box plots, and correlation. (MATH-110-40 for 2018FA) Students will be able to identify various types of algebraic expressions/equations, and apply the appropriate strategy to solve various type of math problems. (MATH-095-15 for 2018FA) • The students should be able to identify and solve various types of expressions/equations. (MATH-095-15 for 2018SP) • The student will be able to identify and solve different types of algebraic expressions and equations. (MATH-095-25 for 2018SP) The student should be able to determine the difference between expression/equations and be able to to apply appropriate strategy to solve. (MATH-995-15 for 2018FA)

• Continue to work on students' perseverance when the course content gets more complex. (MATH-090-35 for 2018SP)

• Continue to work with students' belief in themselves as well as pushing them to persevere when the course content becomes complex.

8 Section(s)

- Proper action to be taken will be discussed in the department meetings. (MATH-102-02 for 2019SP)
- The proper actions to be taken will be discussed in a departmental meeting. (MATH-095-20 for 2019SP)
- The department will discuss proper actions in a departmental meeting. (MATH-102-05 for 2019SP)
- Proper action will be discussed in a departmental meeting. (MATH-095-26 for 2019SP)
- More practice solving problems for testing hypotheses, evaluating formulas. (MATH-110-55 for 2019SP)
- Nothing to add. (MATH-995-61 for 2019SP)
- Nothing to propose other than we need to keep the class alive. Let them have fun. (MATH-095-61 for 2019SP)
- Chapter 4 and some of 6 is still a problem. Due to Chapter 4 and 6 being the most theoretical, it is understandable for their issues with these chapters. (MATH-265-40 for 2019SP)
- Power Series summation for differential equations a problem--changing index AND starting pint of summation.. Spend more time on the following semester. (MATH-266-57 for 2019SP)
- Not having a lab is problem for entering students who are not up to this level of rigor. Many students not looking for or don't want tutoring...not sure why. Many no shows after the last day to drop class with W which skews statistics. 2/3 of the class should have been in Math 085 not 095. (MATH-095-45 for 2019SP)
- Chapter 14 is a problem due to being theoretical and the last chapter before the final exam. Not a lot of problems dealing with Curl F, Stokes theorem, and Greens Theorem. Most students having hard time visualizing or don't want to visualize what is going on. Book also does not help in visualizing what is going on with the 3D problems (especially in Chapter 11). Most students just want to work out the problem and move on.

(MATH-252-50 for 2019SP)

52 Section(s) Reporting

476 Section(s) Not Reporting