



QEP Pre-Activity Report

Name: Ellen Matheny Course/Section to be Assessed: Math 1530 P07

Semester Implemented: Fall 2014 Control Course/Section (if applicable): _____

1. What is the desired learning outcome? (*What do you want the students to be able to do better at the end of the lesson and to what degree?*)

Students will apply their knowledge of simple probability to determine the fairness of a game.

2. What activity/lesson will be implemented to increase mastery of the desired learning outcome?

Students will be given rules for a game involving dice. Students will play the game in partner groups and decide whether or not the game is fair. Students will use probability to justify their decision.

3. How will you measure whether the activity improved mastery of the targeted outcome?

Students will be asked to change the rules of the game or to create a new game with rules that would be fair. Students will explain why the new game is fair using probability.
Students will also be given a formal assessment at the end of the unit to assess mastery.

Name: Ellen Matheny Course/Section Assessed: MATH 1530Semester Implemented: Fall 2014 Number of students participating: 26**1. What were the results of your assessment of student improvement regarding the targeted learning outcome?**

(Based on the assessment, to what degree was the learning outcome achieved? What information was collected to measure the effectiveness of the activity on the learning outcome? Did any unforeseen factors emerge influencing the activity or outcome assessment results?)

Before the students played the game, the majority of them had the misconception of believing the rules to the game would be fair. After playing the game and collecting data, they began to realize that something was amiss. All students agreed that the game was not fair after playing the game and assessing groups' results.

2. Based on the results of the learning outcome assessment and semantic differential:A. Did the students find the activity engaging? YES NO

Explain:

Explain: All student responses were between the middle of the spectrum and the left extreme (engaging).

B. Did the activity achieve the desired learning outcome? YES NO

(Include and discuss any assessment tools used as well as any qualitative or quantitative results.)

Working in groups, all students figured out the probabilities that Player A (2/3) and Player B (1/3) would win. Working independently, about 85% (22 out of 26) were able to create rules for a fair game by altering the rules from the original game.

C. Will you use the activity again? YES NO

What changes (if any) might be made to either the activity or the measurement of its impact on the learning outcome?

Next time, I would like to allow each group to play the new games each group member created to "test" the fairness.

Please record the results of the Sematic Differential:

engaging	5	:	11	:	7	:	3	:		:		:		boring
useless		:	1	:	1	:	1	:	9	:	7	:	7	beneficial
easy	11	:	5	:	2	:	6	:		:	2	:		difficult
dull		:		:	3	:	5	:	14	:	1	:	2	exciting
valuable	7	:	7	:	9	:	1	:	2	:		:		worthless
complex	1	:	1	:		:	6	:	3	:	5	:	10	simple

Include relevant student comments (if any) provided on the semantic differential:

The game idea helped more than the lecturing. It was a great idea to do. We should do things hands-on more often.

Perfect amount of lecture and work time. I enjoy hands-on activities because they help me to understand much better.

I really like when we do hands-on activities. I think this helps us comprehend what we are studying. I think it would be interesting to survey each other and put together some data.

Felt a little unexplained, but still helpful.

SUBMIT