

October 2, 2018

Dear MS 890 Families,

As students are reflecting on their work so far in math class, I would like to review and share our expectations and rubrics.

The expectation for completed work is that students are using models, representations, justifications and explanations in each assignment. Directions will ask students to explain why or how they know or determined their answer and there should be enough evidence on the work to show their thinking and understanding. Students may be required to answer problems by writing complete sentences and including examples.

Assessments, performance tasks, projects, and quizzes are all based on the Mathematical Practices. Each practice area is annotated by a two-letter symbol. A plus (+) sign means that practice area is correct and a minus (-) sign means that it is incorrect or missing. Each problem assesses different skills therefore varies in the quantity of points per practice. A sample rubric is on the back of this letter. In the recently returned quiz, rubric marks for each practice area assessed have been made. (+PS, -PS, +MR, -MR, etc)

Overview of each practice area:

<b>Problem Solving PS</b>	<b>Model &amp; Represent MR</b>	<b>Reasoning &amp; Proof RP</b>	<b>Communication COM</b>	<b>Attend to Precision AP</b>
Gets correct answer using most efficient strategy and checks answer	Shows multiple representations and understanding of how they relate.	Justifies answer or strategy using mathematical ideas.	Explains what was done and gives mathematical reasons why they chose that strategy.	Uses vocabulary words, labels, units and symbols relevant to solving problem.

Opportunities for extra credit will be given each unit. These assignments must be completely accurate for credit. Extra credit may be given as extension problems for quizzes, tests, or projects. There will also be 1 extra classwork assignment credit opportunity per unit.

It is essential that students take ownership of their learning by participating in class actively and completing their homework each night. Students will be graded on their participation and the classwork they complete in class, and they are expected to bring in their homework, textbooks, and any given handouts to every class. Rubrics for the classwork and homework are in the Student Handbook.

If students need any extra support on their math work, they may sign up for lunch extra help / tutoring held in my classroom every Tuesday and Friday. You can also contact me at my email address: [yoobin@ms890.org](mailto:yoobin@ms890.org).

Sincerely,

Ms. Noh

Mathematical Practices	Exceeds Standards	Meets Standards	Approaches Standards	Falls Below Standards
<b>Problem Solving</b>  <b>PS</b>	Gets correct answer using most efficient strategy and solves correctly with no errors. Checks answer for accuracy and number sense.	Gets answer correct using valid mathematical strategies and solves with a minor computational error. Checks answer for accuracy and number sense.	Gets answer partially correct or has minor mistakes in the set up of the strategy and completes the strategy with inaccurate values. Check is unclear.	Answer is mostly or completely incorrect with no mathematical reasoning evident. No check is made.
<b>Model &amp; Represent</b>  <b>MR</b>  Use appropriate tools strategically	Uses multiple models, diagrams with accurate labels, equations, tables, symbolic representations and demonstrates an understanding of both and how they relate.	Uses appropriate models, diagrams with accurate labels, equations, tables, or symbolic representations and also demonstrates an understanding of both and how they relate.	Use models and symbols to represent and solve a problem, or explain the solution representation but may not be appropriate.	Does not use models to represent and solve a problem, and has missing, unlabeled or inaccurate mathematical symbols.
<b>Reasoning &amp; Proof</b>  <b>RP</b>  Look for and make use of structures.	Makes a conjecture and justifies by using mathematical valid reasoning. Is able to prove or disprove with examples and counterexamples. Draws on patterns, structure, generalizations or rules.	Makes a conjecture and justifies by using mathematical valid reasoning. Is able to prove or disprove with/without examples and counterexamples. Draws on patterns, structure, generalizations or rules.	Justifies by reasoning through the process, showing that the math relates to the given problem. The reasoning used is supported by mathematical concepts.	Some mathematical ideas are used to justify strategy or answer.
<b>Communication</b>  <b>COM</b>  Construct viable arguments and critique others	Effectively explain, and demonstrate clearly how they arrived at their solution. Shows how the math relates to the given problem, and gives reasons why they chose the strategy. Be able to critique the reasoning of others.	Effectively explain, and demonstrate how they arrived at their solution. Shows how the math relates to the given problem, and gives reasons why they chose the strategy. Be able to critique the reasoning of others.	Explain and demonstrate their thought processes through reasoning and examples. Begins to critique the argument of others.	Explain their thought processes through reasoning. May or may not be accurate.
<b>Attend to Precision</b>  <b>AP</b>	Accurately uses appropriate vocabulary, symbols, labels and units in the context of the problem.	Uses appropriate vocabulary, symbols, labels and units in the context of the problem.	Uses vocabulary, symbols, labels and units related to the topic but not specific in the context of the problem. Some may not be accurate.	Uses little or no vocabulary, labels or units related to the problem and does not include appropriate symbols.
<b>SELF ASSESSMENT</b>	Exceeds Standards	Meets Standards	Approaching Standards	Falls Below Standards
<b>FINAL SCORE</b>	Exceeds Standards	Meets Standards	Approaching Standards	Falls Below Standards
Parent Signature:				