

Problem Solving Rubric

Category	1	2	3	4
Understand	Missing more than 3 key details of the problem (or more than 3 errors found in the key information listed).	Missing 2 to 3 key details essential to the problem (or 2 to 3 errors found in the key information listed).	Section is not labeled or missing one important detail from the problem statement.	Section is labeled and all of the important details from the problem are listed.
Estimate	Student provides estimate of the solution, but either no justification is provided or the reasoning is not mathematically sound.	Student estimates the solution to the problem and provides solid mathematical reasoning to justify the estimate.		
Plan	Plan is not relevant to the problem and lacks detail on strategy and operations.	Plan is vague and addresses only a strategy or an operation to use, but not both.	Student plans how to solve the problem but is missing details with either the operations or strategy, or does not label the section. The student did not adjust or add to the plan as needed.	Section is labeled and the student writes a detailed plan, including strategies and operations, and adjusts the plan as needed.
Solve	Student shows little to no work and does not appear to follow any plan.	Student shows work but is disorganized and makes little progress towards solving the problem.	Student follows his or her plan and shows many steps of work, but either does not come to a solution or the work does not fully support the solution.	Student follows his or her plan, and shows all work needed to solve the problem in an organized manner. A solution is clearly identified.
Check	Student checks his or her answer but does not address all of the key criteria from the "Understand" portion, and/or provides minimal reasoning regarding the correctness of the solution.	Student checks his or her answer against all of the criteria in the "Understand" portion and explains why the solution meets or does not meet each detail.		
Solution	Solution is correct but the appropriate units are missing.	Solution is correct, including units (as needed).		
Reflection	Only 1 sentence reflecting on the problem solving process or multiple sentences that lack insight.	At least 2 to 3 sentence of insightful reflection on the problem solving process.		
* If the solution is incorrect, a score of 0 is earned for that category. * If any category is missing, a score of 0 is automatically earned for that category.			Total Score	/ 20