Above Average *M024 scoring rubric*

Math Domain

☐ Number/Quantity	☐ Shape/Space	☐ Function/Pattern
☑ Chance/Data	☐ Arrangement	

Math Actions (possible weights: 0 through 4)

☐0☐ Modeling/Formulating	☐0☐ Manipulating/Transforming	
☐3☐ Inferring/Drawing Conclusions	☐3☐ Communicating	

Math Big Ideas

☐ Scale	☐ Reference Frame	☐ Representation
☐ Continuity	☐ Boundedness	☐ Invariance/Symmetry
☐ Equivalence	☐ General/Particular	☑ Contradiction
☐ Use of Limits	☐ Approximation	☐ Other

1. In order for the politician's statement to be mathematically correct, the assumption must be that "average performance" has been previously benchmarked, and that future students exceed these benchmarks. Everyone being above average implies that the average is some objective measure that is not the average of the referenced students.

2. If all students are performing above average, they could not all be part of the group from which the average was originally drawn. Since the average of a set of numbers is always greater than the least number, and smaller than the greatest number, it is impossible for everyone to be above average. This specific statement only makes sense if you assume that all of the students of Old Brookmill perform above the average of a larger population of students.

	partial level (1 or 2)	full level (3)
Modeling/ Formulating (weight: 0)		
Transforming/ Manipulating (weight: 0)		
Inferring/ Drawing Conclusions (weight: 3)	Student explanations for questions **1** and **2** indicate a fragile understanding of the meaning of average.	A robust and complete understanding of the meaning of average is evidenced in the student response, and different inferences are drawn about the two statements.
Communicating (weight: 3)	Prose explanations in questions **1** and **2** are unclear, incomplete, and/or do not articulate a definite distinction in the interpretation of the given statements.	All explanations are clear, complete, and use mathematical vocabulary which articulates the subtle distinction between the two given statements.