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| **Consideration of Characteristics of Tasks Lending Themselves to Mathematical Argumentation** |
| **Press** | **Possible Task Modification** | **Sample Questions** |
| Amount of writing space | 1. Think about the appropriate amount of lines for students to respond to the question, and then give them this amount of space.
* A longer argument is not always a better argument but you need a sufficient amount of space
* Students should not use the amount of space as an indicator of a good argument
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| Press for the inclusion of a specific writing feature | 1. Add in a writing support specific to argumentation.
* “Write a mathematical argument to answer the following question”
* “Write your claim”
* “Include evidence”
* “Consider your warrants”
* “Convince a classmate”
* Add in a frame (e.g., “I think \_\_\_ because\_\_\_)
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| Press for a type for writing | 1. Press students to explain why.
* Do not use simply “explain”
* Add: “Explain why”
* Start the prompt with “why”
* Use “explain your thinking”
* Ask,
	+ - “Do you agree? Why?”
		- “Do you agree or disagree? Why or why not?
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| Press to write about procedures or concepts | 1. Skip procedural questions and eliminate the repetitive question
* Not: “Solve the problem. Explain.”
* Instead: “How do you know your thinking is correct?”
1. Push past procedural explanations
* Present a part of a procedure and have students explain why
* “What have you learned in class to defend your reasoning?”
* “How will you use \_\_\_ to explain how to solve \_\_\_?”
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| Press for writing about their own or others’ solutions | 1. Present one possible solution.
* “A student thinks \_\_\_. Do agree or disagree? Why?”
* *Make sure the student sometimes is right, sometimes is wrong*
1. Present two possible solutions.
* “Student A thinks this. Student B thinks that. Who do you agree with? Why?”
* *Make sure Student A sometimes is wrong, sometimes is right*
* *Make sure Student B sometimes is wrong, sometimes is right*
* *Make sure Students A and B sometimes are both right*
* *Make sure Students A and B sometimes are both wrong*
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