

Three Act Tasks in Primary

Presented by Jen Barker

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Originating from Dan Meyers for Secondary School Math classes, this whole class problem based approach is an excellent way to develop students' ability to question, engage in problem solving, develop a range of strategies, and mathematically model. Every child has an entry point into the activity and can work to their potential. More recently, Graham Fletcher has created many 'Three Act Tasks' for Elementary aged students. I highly recommend checking out his site or Kendra Lomax who has created some tasks for early primary students (see links below).

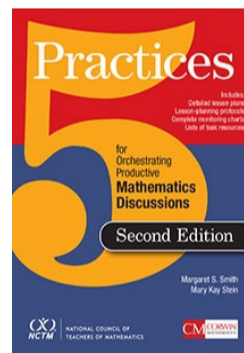
The Three Acts:

This activity is made up of three parts or "acts;" 1) The Question, 2) Gathering Information, and 3) The Reveal. The entire activity typically takes a full math period or the acts can be split up and worked on across multiple days. The goal of the activity is to engage children in asking mathematical questions, identifying information that will allow them to answer the question, developing a mathematical model of the situation, and revising their models to more closely reflect the real world.

The Planning Process:

5 Practices for Orchestrating Mathematical Discussions

1. ANTICIPATE
 - Do the problem yourself
 - What strategies are your students likely to use
2. MONITOR
 - Circulate, observe, listen
 - Identify and keep track of the strategies used
 - Ask questions to discover and nudge thinking
3. SELECT
 - Crucial Step - what do you want to highlight? The content focus!
 - Purposely select those that will advance mathematical ideas
4. SEQUENCE
 - In what order do you want to present the student work samples?
 - Do you want the most common/accessible? Perhaps misconceptions first? Build in sophistication? Concrete to abstract?
5. CONNECT
 - Craft questions to make the mathematics visible.
 - Compare/contrast 2 or 3 students' work - what are the mathematical relationships?



Resources:

- Graham Fletcher's Google Spreadsheet of tasks <http://bit.ly/ThreeActs>
- Kendra Lomax also has some great tasks <https://learningfromchildren.org/3-act-tasks/>
- Tedd.org has some outstanding resources they have created to support teachers with this approach. You will need to register but it is free.
- Some of the Three Act Tasks I've created, as well as photo of student work <http://bit.ly/MoreThreeActs>

NOTES: