Flipping Out Over Math

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TYPICAL CLASS PERIOD

Tuesday

• Students arrive and get settled into class.

• Teacher answers questions or provides a quick overview of the previous video.

• Students engage in guided, independent, or cooperative learning activities.

Early finishers?

• Allow them to be helpers for students with questions.
• Allow them to watch the video for the next section.
• Provide them with an enrichment activity.
• **Traditional Flip:** Watch the videos at home and do practice in class. The teacher controls the pace of the class. All students work on the same lesson.

• **In-Class Flip:** Watch the videos in class before starting the practice in class.

• **Flip Mastery:** Similar to traditional flipping, but students go at their own pace and have to show mastery of the topic before moving on.
... for the **STUDENT**:

- He can focus on the lesson without classroom distractions.
- He can view the instruction at his own pace (pause/rewind).
- He can’t get the homework wrong!
- He has access to the teacher if he has questions during practice time.
- He can catch up quickly in case of absence.
... for the **PARENTS**:

- They don’t have the stress of trying to help their child who is struggling with homework.

- They may choose to watch the lessons to offer academic support if needed.
... for SUPPORT FACULTY:

- Resource teachers can review the videos with their small group class, pausing throughout to check for understanding.
- Detention monitors can allow students to view lessons that were missed in class due to discipline.
- Great for homebound students!
- Other teachers could use your videos as sub plans or for absent students.
... for the **TEACHER**:

- She can monitor students as they practice and then address their questions promptly and individually. No excuses of “I didn’t understand” or “I didn’t have a calculator.”
- She has more contact time with the students—performance tasks, remediation, improved relationships.
- She doesn’t have to re-teach lessons due to student absence.
- She can assign lessons in advance for anticipated snow days!
#1 It takes time to record and edit lessons!

- **Start Small.** Try flipping a few lessons over several weeks’ time. You can record your own lessons or find ones on the web (i.e. Khan Academy). See how it works for your students, and then decide if it’s worth your time investment.

- **Take Tech Baby Steps.** Don’t expect to have error-free recordings. Maybe you can record your first lessons using a flip camera and dry erase boards with pre-written examples. It helps to have a written script of what you want to say.

- **Split the Flip.** Share the recording and editing tasks with other grade level team members that are interested in this teaching model.
Every student needs to have access to the videos.

- **Web-Enabled Device:** Upload your lessons to a video sharing website (i.e. Vimeo or YouTube) and provide direct links for students to these lessons via your class website or LMS (such as Moodle).

- **Computer with No Internet:** Put your lesson files on a flash drive or burn them as a data disc. These will even play on some video gaming systems!

- **No Device:** Write a grant, ask around for refurbished devices, or burn your lessons as a playable DVD for viewing in a home DVD player. This will likely span multiple discs.

- **When All Else Fails:** Students can watch lessons at school (lab time, Power 30, resource, Core support, study hall, morning/after-school tutoring).
Some students won’t watch the lessons.

- **Sink or Swim.** Students can glean all they can from the brief recap given in class prior to practice time. They also will have access to help from their group members as well as the teacher during the practice time. There will always be students who won’t do any work outside of the classroom. In a flipped classroom, they at least have to practice the lesson content.

- **Second Chance.** Depending on the amount of available class time and access to technology in the classroom, students who didn’t do the homework can watch the lesson they missed while the rest of the students continue on with the group practice.
#4 Students will complete the class practice at different paces.

Take advantage of this increased contact time with your students!

- Performance based tasks or projects related to recent units of study to complete over a span of several class periods.

- SOL practice questions aligned with that day’s lesson material.

- Start the “homework” and watch the lesson for the next class period (if technology is available).

- “Brain Break” Activities (Spot the Differences, Sudoku, Hidden Pictures, Scrambled Square Puzzles, etc.)
DELIVERY METHODS

• Upload to YouTube and your students subscribe to your channel.
• Upload to YouTube or Vimeo, then post the links to the videos on your website or LMS.
• Upload the videos directly to your LMS.
• Put the videos on a flash drive.
• Burn the videos to a playable DVD.
WEB RESOURCES

The mission of the Flipped Learning Network™ is to provide educators with the knowledge, skills, and resources to successfully implement Flipped Learning. John Bergman serves on the board and is considered one of the pioneers in the Flipped Class movement after successfully flipping his own classroom and sharing the teaching model with other educators.

http://flippedlearning.org

Dr. Lodge McCammon (North Carolina State University) created FIZZ—a special type of flip teaching. His method focuses on “One-Take” videos where students can see the instructor and his/her handwritten notes. His organization provides a Flipped Classroom Training Program (FCTP) for educators, professors, and pre-service teachers.

http://lodgemccammon.com/flip/research/fizz-method/

Katie Gimbar is a middle school math teacher in Raleigh, NC and helps facilitate the FCTP with Dr. McCammon. She has great flipped classroom Q & A videos on her YouTube channel.

http://www.youtube.com/playlist?list=PLB632EC24182B4D40
BOOK RESOURCES

Flip Your Classroom: Reach Every Student in Every Class Every Day
by Jonathan Bergmann (Author), Aaron Sams (Author)

*Good for those just starting.

Flipping 2.0: Practical Strategies for Flipping Your Class (Paperback)
by Jason Bretzmann (Author)