USING TECHNOLOGY TO SUPPORT HIGH YIELD TEACHING AND LEARNING

| YOUR NAME | HIGH YIELD TEACHING STRATEGY | Standard/ Target CCSS and Content | HOW WOULD YOU USE TECHNOLOGY TO SUPPORT THE LEARNING TARGETS? |
|---|---|---|---|
| Laura Greenstein<br><br>(This is a rudimen- tary and generic example) | Hattie: Vocabulary Building<br><br>Marzano: Nonlinguistic Represent-ations | CC STANDARDS: CCSS. ELA-Literacy.CCRA-RA.L.4 CCSS.ELA-Literacy. L.6.4<br><br>CONTENT STANDARD NCTE: Students use a wide range of word identification strategies to…comprehend texts | Using purposeful small learning groups, students will select or be given a text-based word to define. They will use the strategy "illustrated vocabulary" (or for some groups "illustrated opposites)" from Visualizing Vocabulary to define their word. I will suggest the use of<br>Blabberize to present their word to the class<br>Google Drawings to create a presentation<br>Visual Dictionary such as Shahi<br><br>After the presentations, students will review the vocab using a teacher generated Q and A Mix-up. When they find their match, the students will then explain their vocabulary word to the class. I anticipate that their post-test graded will show improvement from the pretest and will use that data to adjust the instructional strategy or learning process. |
| Amy Paskov | Hattie: Challenging yet feasible goals<br><br>Marzano: Activiating prior knowledge via questions, cues, and advance organizers | Common Core Standards:<br><br>CCSS.MATH.CONTENT.HSA.REI.C.5<br><br>CCSS.MATH.CONTENT.HSA.REI.C.6<br><br>CCSS.MATH.CONTENT.HSA.REI.D.12<br><br>**Content Standard NCTM:** | Using the computer lab (which is not always desirable for class instruction), students will begin learning about graphing linear systems of inequalities.<br><br>Using prior knowledge of graphing linear inequalities, they will now see what happens when they graph two inequalities on one coordinate plane.<br><br>To review graphing inequalities:<br>Graphing Inequalities Review<br>Information on graphing systems of inequalities:<br>Graphing Systems of Inequalities<br><br>Students will also find it useful to practice using Geometer's Sketchpad, a mathematical program used for graphing, plotting points, and much more in Geometry.<br><br>An interactive web applet students can use to graph systems of inequalities and find the overlap of the shading |

| | | | |
|---|---|---|---|
| | | In grades 9–12 all students should understand the meaning of equations, inequalities, and systems of equations and solve them with fluency—mentally or with paper and pencil in simple cases and using technology in all cases. | where the solutions will be found: Interactive Applet for Graphing Systems of Inequalities<br>I anticipate that as students use the online applet, the idea of the solutions of linear systems of inequalities will become more clear to the students. Using technology will be much more visual (and colorful) to the students than using pencil and a piece of paper. |
| Gail Corbett Dandelske | Marzano Identifying similarities and differences | CT ELDS (Pre-K) C.48.7 Identify similarities and differences in objects, people, events, sounds based on one attribute | Teacher will Read Aloud Same, Same But Different by Jenny Sue Kostecki-Shaw to the whole group and ask students to identify how the two boys are the same or different. Teacher will write students comments onto a Venn Diagram on the Smartboard, and facilitate discussion. Students will move to tables and draw a picture showing their understanding of the similarities and differences discussed. Students can use Drawing Pad on an ipad to create their picture, or choose from colored pencils, markers or crayons to draw and color.<br><br>To reinforce skill of recognizing Same/Different, Students will take turns on ipad/desktop with these apps I Can Do App, ABA Game, What's Different?<br>Teacher will take anecdotals while students work on drawing, asking questions to promote deeper learning (Bloom's taxonomy), assistant will monitor students on computers/tablets guiding and facilitating as needed, and taking anecdotal notes. Students will share their drawing at pm circle. |
| Tim Flanagan | Marzano: Summarizing and note-taking | CCSS.ELA-LITERACY.W.7.9<br><br>CCSS.ELA-LITERACY.W.7.1 | Students will watch engaging videos of spoken word poems and answer the question: How does the author make his/her argument? They will take notes using Google Docs to trace the author's argument throughout the performance. The focus for the notes will be on |

| | | | |
|---|---|---|---|
| | Fedel and Lemke (Cisco Systems and Metiri Group Report): Video<br><br>Hattie: Spaced practice | CCSS.ELA-LITERACY.RI.7.1<br><br>CCSS.ELA-LITERACY.RI.7.6 | identifying the argument and the text-based evidence the author provides for the argument. This can be done as a whole-class activity, with students sharing notes and the teacher recording ideas.<br><br>The activity can be repeated at regular intervals (once a week, for example), and students can gradually move to small-group and independent work. They will practice developing their own arguments in short five-minute writing sessions based on topics related to the videos. Students will look forward to the engaging videos, practice close reading skills, and become more aware of argumentative techniques through class discussions. I expect students to eventually apply some of the argumentative techniques to their own writing. |
| Elizabeth Hick | **Hattie:** Problem Solving-Teaching<br><br>**Marzano:** Cues, Questions, and Advance Organizers<br><br>Setting Objectives and Providing Feedback | CCSS MATH 4.OA.A.1<br>CCSS MATH 4.OA.A.2<br>CCSS MATH 4.OA.A.3<br><br>CONTENT STANDARD NCTM: Students use symbolic algebra to represent situations and to solve problems, especially those that involve linear relationships. | Students will watch a mini lesson from the website LearnZillion on how to write an equation to solve multi-step word problems.<br><br>Using the website Shooloo students will solve and create multi-step word problems. They will use graphic organizers to help guide them through the process of solving multi-step word problems as well as an organizer to guide them in creating multi-step word problems.<br><br>Students will also solve problems using the site IXL to be exposed to additional examples of multi-step word problems.<br><br>Once they have solved 3 word problems and created 3 word problems they will receive feedback from both the teacher and their peers via the “Like,Comment, Invite, Detail” section of the Shooloo website. |
| Elizabeth Ferry | **Marzano:** Activating Prior Knowledge Via Questions, Cues, or | CCSS.MATH.CONTENT.7.SP.C.5<br>CCSS.MATH.CONTENT.7.SP.C.6 | Students will watch a tutorial on basic probability from Khan Acdemy: Khan Academy Basic Probability. While watching the video, students will be asked to think about any similarities that finding probability has with previous math lessons. After the video, students will use purposeful discourse and turn and talk with a partner to discuss any content material that they viewed in the |

| | | | |
|---|---|---|---|
| | Advanced Organizers<br><br>Generating and Testing Hypotheses | CCSS.MATH.CONTENT.7.SP.C.7.B<br><br>Content Standards NCTM: Students will predict the probability of outcomes of simple experiments and test the predictions. Students will understand the measure of the likelihood of an event can be represented by a number from 0 to 1. | tutorial that relates to previous math lessons. (Examples could include ratios, converting fractions to percents, simplifying fractions.)<br><br>As a whole class, students will find the theoretical probability of basic situations such as tossing a coin and landing on heads and spinning a spinner and landing on a specific color. Students will then use the National Library of Virtual Manipulatives to find the experimental probability of the same situations. They will use the virtual manipulatives to test their hypotheses of the theoretical probability and determine if their predictions are correct<br><br>Students will then use the Adjustable Spinner on the NCTM Illuminations website. They will change the display between a graph and table to view the different ways to demonstrate the experimental outcomes. They will also run multiple experiments to see if the experimental percent is different between runs.<br><br>After the lesson students will complete an exit slip on probability. They will be asked to find the probability of tossing a coin and having it land on heads. They will then make a prediction of how many times it would land on heads if it was tossed 10 times. They will perform the actual experiment and record their results on the exit slips. |
| Joan Robinson | **Marzano:** Identifying similarities and differences<br><br>**Hattie:** Problem Solving | CCSS Math 2.GA.1<br><br>Recognize and draw shapes having specified attributes, such as a given number of angles or a given number of equal faces.<br>1 Identify triangles, quadrilaterals, pentagons, hexagons, and cubes. | Teacher will begin with the NCTM Illuminations lesson Three Sides. Students will then watch the five, five minute videos on Learn Zillion lesson by Susan Nazario which explore triangles, quadrilaterals, pentagons, hexagons, and cubes. (teachers will have to sign up for this free site.)<br><br>Students will then complete a comparison matrix to demonstrate learning. The expectation is that students will be able to draw the shapes, identify the shape attributes, and compare different shapes by attribute. |

| | | | |
|---|---|---|---|
| Joseph DePalma | Marzano: Identifying Similarities and Differences<br><br>Hattie: Vocabulary Instruction | **CCSS.MATH.CONTENT.1.G.A.1** Distinguish between defining attributes (e.g., triangles are closed and three-sided) versus non-defining attributes (e.g., color, orientation, overall size); build and draw shapes to possess defining attributes.<br><br>CCSS.ELA-LITERACY.SL.1.5 Add drawings or other visual displays to descriptions when appropriate to clarify ideas and thoughts. | Students will look around the room for a 3d shape (cylinder, sphere, pyramid, rectangular prism, etc.) Once they have found the 3d shape of their choice, they can take a picture of the shape using the ipad camera. Once they have taken the picture, they can retrieve the picture from the camera roll on the iPAD and then upload it to the app Educreations.<br><br>Once the picture has been uploaded, the students can annotate the picture, labeling the different attributes of the shape, with content specific vocabulary (i.e vertices, edge, face). Once the student has labeled the different attributes, they can then use the record feature of Educreations, to record an explanation of what 3d shape they chose and explain the different attributes of the shape. Students can then share their Educreations video with their math partner, discussing the similarities and differences in the shapes that they chose. Using the Venn Diagram App on the iPAD, they can then create a visual representation for the similarities and differences that they noticed. Students can then share their venn diagram with the class. |
| Nancy Atterberry | Marzano: nonlinguistic representation | CCSS.ELA-Literacy.W.6.3<br>CCSS.ELA-Literacy.W.6.8<br>CCSS.ELA-Literacy.W.6.2.a | Students will create a book trailer of their favorite book. The objective is to inspire others to read the book after viewing the trailer. Students can use Google presenter or Animoto to develop their trailer. The book trailer will consist of text and multimedia content that present the elements of the story. Students will use the Internet to locate multimedia to add to their book trailer. The multimedia content must complement the text and add to the presentation. |

| | | | |
|---|---|---|---|
| | Hattie: Self regulation self assessment capable students | | They must provide proper attribution to the creators of the media used. Students may also add their own images to their projects. A scanner can be used to digitize their images.<br><br>Students will present their book trailers to the class. The class will be allowed to ask questions and comment on the book trailer. Students will then reflect on their work and self assess their work. They will identify strengths and areas improvement. |
| | | | |