

# **A Toolkit for The Best of Classroom Instruction that Works**

## **Tools for Session 1:**

- **Essential Questions:**  
Structures for Purposeful Design and Tips
- **Setting Objectives:**  
Strategies and Self-Assessment Tools
- **Assessment and Feedback:**  
Formative Assessment Strategies,  
Peer Review Protocols, Feedback Frames
- **Cooperative Learning:**  
Planning Templates, Tips for Norming,  
Roles and Discussion Protocols,  
Assessment and Documentation

## **Tools for Session 2:**

- **Nonlinguistic Representation:**  
Digital Tools and Resources, Gamestorming
- **Questions, Cues, Advanced Organizers:**  
Frames, Charts, and Samples
- **Summarizing and Note-taking:**  
Rule-Based Strategy



**Angela Stockman**

WNY EDUCATION ASSOCIATES

**Phone:** 716-418-3730

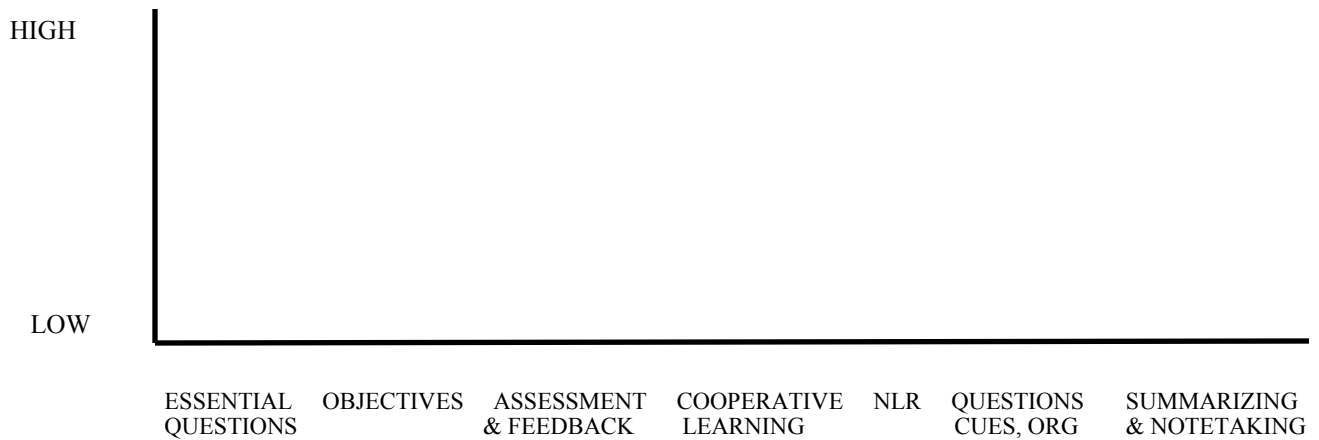
**Web:** [angelastockman.com](http://angelastockman.com) and [wnyyws.org](http://wnyyws.org)

**Twitter:** @angelastockman and @wnyyws

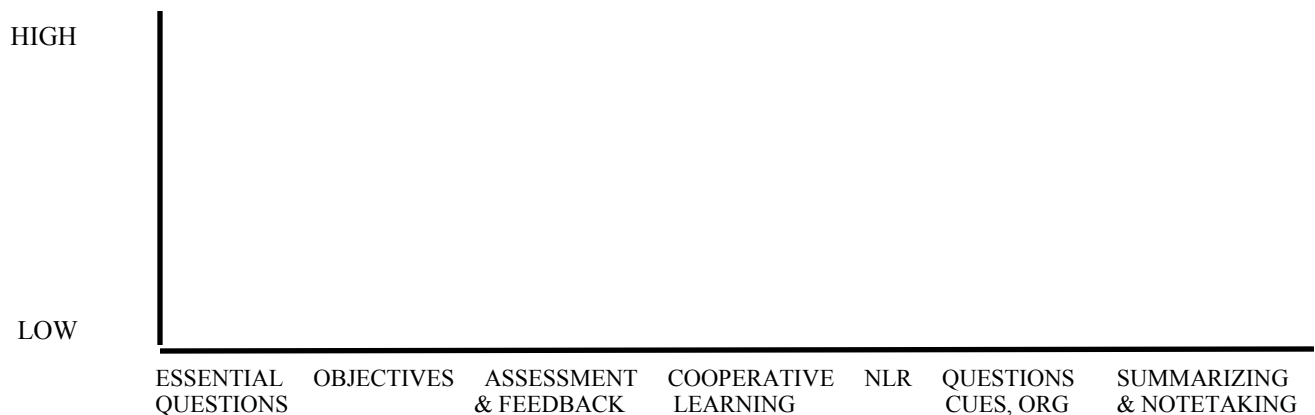
# ASSESSING STRENGTHS

Use the tools below to chart your current levels of interest and expertise in each of the domains listed.

## LEVELS OF EXPERTISE



## LEVELS OF INTEREST



# ESSENTIAL QUESTIONS

## Designing with Purpose

### **SELF AND GROUP IDENTIFICATION:**

- Who are we?
- Where are we in place/time?
- How do we define ourselves?
- How do we reveal ourselves?
- How does our world work?
- How do we organize ourselves?
- How do we share the planet?
- Where do we belong?
- How do we innovate?

### **CONCEPTS AND KNOWLEDGE:**

- Form: what it is like?
- Function: how does it work?
- Causation: what influenced it?
- Change: how is it changing?
- Connection: what is its relationship to others?
- Perspective: how does perspective change what we know of it?
- Responsibility: who or what is responsible for it?  
What is it responsible for?
- Reflection: what do we know and need to know about it?

### **GROWTH OF DISPOSITIONS:**

Appreciation	Independence
Commitment	Integrity
Confidence	Respect
Cooperation	Tolerance
Creativity	Perseverance
Curiosity	Reflection
Empathy	Humor
Enthusiasm	Self-Actualization

# ESSENTIAL QUESTIONS

Tips for Implementation

*Try to frame your entire year with one or two essential questions. Then, align the essential questions for each unit to this far more encompassing question.*

## What is the relationship between ego and ambition?

How does ego serve the ambitious?

### **HOW DOES EGO IMPEDE THE AMBITIOUS?**

*How does our awareness of ego influence our ambitions?*

Who is blind? Who can see?

## What does it mean to belong?

Who am I?

**Who are my classmates?**

What is a community?

*Why do we have rules?*

## Why mind the gap?

Why do we need to know where we started?

### **HOW DO WE KNOW WHEN CHANGE IS NECESSARY?**

*What is progress?*

What can be measured? What should be measured?

# ESSENTIAL QUESTIONS

## Tips for Implementation

Acquaint your students with the question and with the thinking processes inherent in the consideration of essential questions by using familiar and engaging contexts prior to exploring your content.

### Useful Resources:

- Familiar song lyrics
- Cartoons
- Social media exchanges, trends, and memes
- Current events articles
- TED talks
- Kid President talks
- Artwork
- Local controversies
- Favorite children's books
- Comic books
- Pictures
- Ephemera: concert tickets, programs, letters, receipts
- Observations
- Photo walks
- Personal experiences
- Text messages
- Journal entries
- Television and film clips
- Completed projects
- Previous units of study
- Biographies of those they love

# TEACHING WITH OBJECTIVES

## Design Strategies

Understanding the difference between objectives and activities is an important first step. As you read, distinguish each item as an OBJECTIVE (O) or an ACTIVITY (A):

1. Students will name the largest body in the solar system. \_\_\_\_\_
2. Students will create a diorama of the nine planets. \_\_\_\_\_
3. Students will define what the word orbit means and distinguish how the earth, the moon, and the sun differ in their orbits. \_\_\_\_\_
4. Students will be able to solve equations with one variable. \_\_\_\_\_
5. Students will practice blending sounds in guided groups. \_\_\_\_\_
6. Students will articulate the rules of play for rugby. \_\_\_\_\_
7. Students will follow the rules of play while engaging in a rugby scrimmage. \_\_\_\_\_
8. Students will be able to use intonation and pausing while reading aloud at their instructional level. \_\_\_\_\_
9. Students will add unfamiliar vocabulary words to the classroom word wall. \_\_\_\_\_
10. Students will be able to recognize and determine the meaning of unfamiliar vocabulary in context. \_\_\_\_\_

# TEACHING WITH OBJECTIVES

## Design Strategies

### Transforming Standards into Targets and Manageable Learner Goals

#### **STANDARDS:**

Describe what a learner should know and be able to do. They increase in complexity and sophistication as learners progress through school.

**RL.4.3** Describe in depth a character, setting, or event in a story or drama, drawing on specific details in the text

#### **LEARNING TARGETS:**

Learning targets are intended to help learners comprehend what the standards really mean and work toward achieving them one step at a time.

#### **Examples of Learning Targets Aligned to RL.4.3:**

- ◇ Use text details to describe a character from a story.
  - ◇ Use text details to describe a story's setting.
  - ◇ Use text details to describe an event in a story.
- (Additional targets could be designed for drama)

#### **PERSONALIZED GOALS:**

When students create personal goals from learning targets, they identify those they wish to master and define how they will go about doing so. Once achieved, they also describe how they know they were successful.

#### **Examples of Personal Goals Aligned to Learning Targets for RL.4.3:**

- ◇ I can use text details to describe Laura from Little House on the Prairie.
- ◇ I can use details from Little House on the Prairie to describe Kansas and Wisconsin.
- ◇ I can use details from Little House on the Prairie to describe how they traveled by wagon.

# ASSESSMENT AND FEEDBACK

## Assessment Moments, Types, and Purposes

### At what moment might a teacher assess for each of these purposes?

**Diagnostic Assessment:** Pre-testing to determine what is already known, adjust instruction, or appropriately place students.

**Formative Assessment:** Assessment that happens during guided practice, to provide students immediate feedback and allow for the adjustment of instruction.

**Summative Assessment:** Assessment that happens after learning has taken place, to measure mastery of content and skills improved upon through formative assessment.

**Benchmark Testing:** Testing that provides comparison to state standards, providing a “benchmark” of student learning/mastery.

Assessment	Purpose
As students are drafting their short stories, the teacher moves from one to another, conferencing and providing teaching points that allow them to improve their work.	
A student who is passionate about skateboarding engages in research about the topic and creates a wikispace of his findings that allows his classmates to learn from his expertise.	
A grade level team of teachers interested in learning more about how proficient their students are at interpreting literary devices asks students to complete a brief task targeting four specific devices. Each teacher provides immediate feedback to students and changes instruction in response to what was learned. Findings are shared at a grade level meeting and inform grade, building, and district-level curriculum mapping and professional development decisions. They are also shared with reading teachers, who are able to provide further support.	
Students take a mathematics quiz.	
At the beginning of a unit, a Social Studies teacher quizzes students to see what they already know about the topic. He compacts his curriculum to devote more time to what isn't known and less time to what is.	
All students complete the same persuasive essay writing task during quarter one. It is housed in a portfolio, and teams of teachers analyze all student work on a professional development day in November.	



# FORMATIVE ASSESSMENT

Low Preparation/No Preparation

— [ Low Preparation Ideas ] —

— [ No Preparation Ideas ] —

## ASSESSING THE QUALITY OF THE FEEDBACK YOU PROVIDE

DIMENSION	4 - SUPPORTS LEARNING AND GUIDES REVISION	3 - GUIDES REVISION	2 - INFORMS	1 - GRADES WITHOUT FEEDBACK
<b>PURPOSE</b>	-the purpose is to reinforce and connect the qualities taught to the work produced, to provide specific feedback, and to guide revision	-the purpose is to primarily guide revision via specific suggestions	-the purpose is to inform the author of general areas for improvement	-the purpose is to evaluate, grade
<b>TIMING</b>	-given when the author is able to internalize, discuss and use it to revise	-given when the author has ample time to use it to revise	-given during a prescribed time that is insufficient for the author to be able to use it	-given after the author has completed the work
<b>CONTENT</b>	<ul style="list-style-type: none"> <li>- is descriptive, specific, purposeful, respectful, encouraging</li> <li>- describes specific strengths and weaknesses, beginning with strengths</li> <li>-includes specific references to the author's work</li> <li>-emphasizes the most important aspects of quality</li> <li>- includes suggestions for improvement that are prioritized</li> <li>- allows the author to maintain total control over the work by allowing response to suggestions</li> <li>- is informed by reviewer's knowledge of quality work and the author's abilities, development, previous experience, and attitude</li> </ul>	<ul style="list-style-type: none"> <li>- is both general and specific, purposeful, respectful, encouraging</li> <li>- intersperses specific strengths and weaknesses</li> <li>- includes general references to the author's work</li> <li>- addresses aspects of quality without prioritizing</li> <li>- includes suggestions for improvement</li> <li>- allows the author to maintain control over the work by allowing choices from various suggestions</li> <li>- is informed by the reviewer's knowledge of quality work and the author's abilities</li> </ul>	<ul style="list-style-type: none"> <li>-is general, discouraging</li> <li>-identifies general weaknesses</li> <li>- based on opinion that is not grounded in references to the author's work</li> <li>- addresses only the least important aspects of quality</li> <li>- improvements are made by reviewer</li> <li>- takes authority away from the author</li> <li>-is informed by the reviewer's knowledge of quality work</li> </ul>	<ul style="list-style-type: none"> <li>-is vague</li> <li>- provides no specific information</li> </ul>

**Designed by Learner Centered Initiatives, 2011**

## **Peer Review Providing Warm and Cool Feedback**

What is peer review? Peer review is an opportunity to gain feedback on our ideas, thinking, and work so that we might improve. How does it work? You will spend 15 minutes in peer review for each group member.

Please follow these steps:

1. Identify a facilitator who will ensure that the process is carefully followed by all group members.
2. Listen carefully as the writer presents an idea, a dilemma, or a piece of work to the group.
3. Ensure that the writer asks for a specific kind of feedback. If needed, prompt the writer to do so before proceeding.
4. Read the work or listen as it is read aloud.
5. Take up to five minutes to plan warm and cool feedback:

- **Warm feedback** is not praise. Do not compliment the writer at this time.

Consider the writer's purpose and the type of feedback requested. Then, find evidence within the piece that reflects where the writer is succeeding or demonstrating the potential to succeed.

- **Cool feedback is not criticism.** Do not point out mistakes, errors, or weaknesses.

Consider the writer's purpose and the type of feedback requested. Then, ask questions that might help the writer determine how to make improvements independently.

6. Once reviewers have had the opportunity to plan their feedback, share it in rounds beginning with warm feedback. Each reviewer speaks one at a time, and only one piece of feedback is shared at a time. Reviewers may pass when their lists are exhausted. Rounds continue with cool feedback.
7. The writer under review may not speak during the process. They may take notes on the feedback they receive, and once the review is completed, they may engage the group in a discussion, if time remains.
8. Peer review is a service provided to the writer, not a set of demands. The writer may or may not accept and act upon the feedback provided.

### **Tips for Providing Warm Feedback:**

Avoid using the following statements:

I like it. This is good writing. Great job!

Use facts from the work to support your statements. For example:

1. You asked us to provide feedback on character development. The way you describe the main character's behavior in the fourth paragraph helps me understand her better.
2. In response to your question, I feel you create an important message in your piece: a single lie perpetuates many.
3. Your claim is compelling. I'm looking forward to reading your defense of it.

### **Tips for Providing Cool Feedback:**

Avoid using the following statements:

I don't get it. This is disorganized. You spelled some words wrong.

Consider how you might help the writer think about the work in a way that will enable improvement. For example:

1. I wonder what the river sounded like in paragraph seven.
2. I'm thinking about the main character. Was she arrogant or just shy? How can you make this clear?
3. I'm uncertain how this piece of evidence supports your claim.

Cool feedback is framed with sentence starters like these:

I wonder Why did.... Who did.... How did..... When did.....

What happens when.... Describe... Tell me about....

What if... I'm curious about..... Have you considered.....

**Version 2:  
Peer Review**

**Which element of writer's craft does the writer intend reviewers to focus on?**

\_\_\_ Idea Development   \_\_\_ Organization   \_\_\_ Word Choice   \_\_\_ Sentence Fluency   \_\_\_ Voice

**Directions:**

1. Study the rubric to ensure that you know what this means.
2. Read the writer's work.
3. Use the frames below to plan your feedback.

**Warm Feedback:**

No compliments! Use the rubric and evidence from the writer's work to guide your feedback.

Your idea/organization/word choice/sentence fluency/voice is strongest here:

**Cool Feedback:**

No criticism! Complete one or more of the frames below, using evidence from the work.

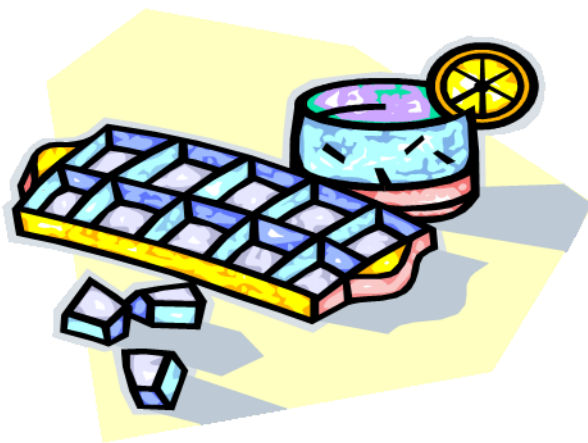
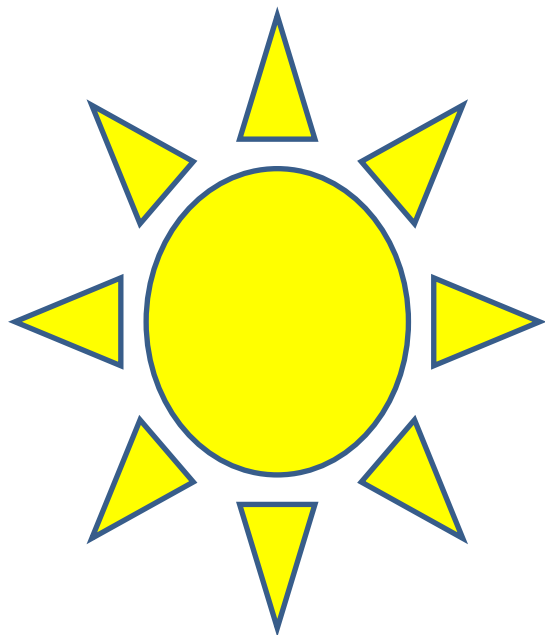
I wonder....

Have you considered.....

Tell me more about.....

### Version 3: Pointed Peer Review

With your teacher's help, plan to give another writer feedback on his or her work. When you share it, use your finger to point to the spot in the writer's work that you are talking about.




**POINTS FOR WARM FEEDBACK**



A large empty rectangular box for recording warm feedback points. At the top, it is titled "POINTS FOR WARM FEEDBACK" in bold black text. Below the title is a small icon of a hand pointing to the right, set against a blue square background with radiating lines.

**POINTS FOR COOL FEEDBACK**



A large empty rectangular box for recording cool feedback points. At the top, it is titled "POINTS FOR COOL FEEDBACK" in bold black text. Below the title is a small icon of a hand pointing to the right, set against a blue square background with radiating lines.

**Peer Review Notes: Listening, Reflecting, and Planning to Revise**

During peer review, capture what you hear. Then, describe what you will do next, based on what you learned.

<p><b>Warm Feedback I Received:</b></p>	<p><b>Cool Feedback I Received:</b></p>
<p><b>This is how I plan to revise my thinking or work, based upon the feedback I received:</b></p>	<p><b>I've chosen not to respond to the following feedback, and this is why:</b></p>

# COOPERATIVE LEARNING

Assumptions, Agreements, Arguments, Aspirations

<b>Assumptions</b>	<b>Agreements</b>
<b>Arguments</b>	<b>Aspirations</b>



# Cooperative Learning Self Evaluation

Name \_\_\_\_\_ Team \_\_\_\_\_ Date \_\_\_\_\_

Project Topic or Title:

Briefly describe your contribution to the cooperative learning project:

---

---

---

---

---

---

---

If you were doing this project again, what would you do differently to improve your work?

---

---

---

How could your team work together more effectively next time?

---

---

---

Your Teacher's Comments:

---

---

---

---

---

---

---

Your Grade for Yourself:

Your Teacher's Grade for You:


Copyright 2012 by Chad Menik, Teacher-Written Edware, LLC. All rights reserved.

# Peer Evaluation Form

Name \_\_\_\_\_ Class Period \_\_\_\_\_ Date \_\_\_\_\_

Write the names of your group members in the numbered boxes. Then, assign yourself a value for each listed attribute. Finally, do the same for each of your group members and total all of the values.

Values: 1=Strongly Agree 2=Agree 3=Disagree 4=Strongly Disagree

Attribute	Yourself	1.	2.	3.
Was dependable in attending group meetings.				
Willingly accepted assigned tasks.				
Contributed positively to group discussions.				
Completed work on time or made alternative arrangements.				
Helped others with their work when needed.				
Did work accurately and completely.				
Contributed a fair share to weekly papers.				
Worked well with other group members.				
Overall was a valuable member of the team.				
Column Totals 				

Copyright 2012 by Chad Manis, Teacher-Written Edware, LLC. All rights reserved.

# Quick Peer Evaluation Form

Name \_\_\_\_\_ Class Period \_\_\_\_\_ Date \_\_\_\_\_

Write the names of your group members in the numbered boxes. Then, assign yourself a value for each listed attribute. Finally, do the same for each of your group members and total all of the values.

Values: 5=Superior 4=Above Average 3=Average 2=Below Average 1=Weak

Attribute	Myself	1.	2.	3.	4.
Participated in group discussions.					
Helped keep the group on task.					
Contributed useful ideas.					
How much work was done.					
Quality of completed work					
<b>Totals</b>					

Copyright 2012 by Chad Manis, Teacher-Written Eduware, LLC. All rights reserved.

# Group Self Evaluation Checklist

Name \_\_\_\_\_ Class Period \_\_\_\_\_ Date \_\_\_\_\_

Topic of Study \_\_\_\_\_ Group Members' Names \_\_\_\_\_

As a team, decide which answer best suits the way your team worked together. Then, complete the remaining sentences.

We finished our task on time, and we did a good job!  YES  NO

We encouraged each other and we cooperated with each other.  YES  NO

We used quiet voices in our communications.  YES  NO

We each shared our ideas, then listened and valued each other's ideas.  YES  NO

We did best at

Next time we could improve at

Copyright 2012 by Chad Manis, Teacher-Written Eduware, LLC. All rights reserved.

# Progress Assessment

Name \_\_\_\_\_ Class Period \_\_\_\_\_ Date \_\_\_\_\_

	<b>Need to Work on This Score 1</b>	<b>Successful Score 2</b>	<b>Outstanding Score 3</b>
<b>Getting Set</b> Score _____	Noisy. Moved too slowly. Didn't know where to go or interfered with other groups.	Moved into group reasonably well, ready to get to work. May have had work. Needed a reminder or two from the teacher.	Moved efficiently and quietly into group, ready to work.
<b>Being Considerate</b> Score _____	Noisy. Failed to take turns. Failed to listen. Hurt feelings of others in group. Argued or interfered with other groups.	Worked reasonably well together. May have needed a reminder or two from the teacher.	Worked quietly together. Took turns. Listened to each other's ideas. Supported and helped each other. Together, asked for help from teacher as appropriate.
<b>Doing Assignment</b> Score _____	Off task. Wasted time. Argued. Unable to work out problems without lots of teacher intervention. Unprepared. Unable to decide who needs to do what. Failed to share workload or failed to meet deadlines.	Stayed on task most of the time. Everyone did his fair share. Finished on time. May have needed a reminder or two from the teacher.	Stayed focused. Everyone worked well together to accomplish assignment goals.
<b>Quality of Work</b> Score _____	Work done in a rush. Failed to follow rubric for assignment.	Work done carefully, following guidelines of rubric.	Extra work put into assignment. Met criteria for an outstanding assignment by guidelines of rubric.
<b>Individual Role</b> Score _____	Failed to work well with group. Failed to pull fair load, or interfered with other groups.	Worked reasonably well with group. Did fair share of work. May have needed a reminder or two from the teacher.	Worked well with group. Did fair share of work and helped others in the group be successful.

Copyright 2012 by Chad Manis, Teacher-Written Edware, LLC. All rights reserved.

# Cooperative Learning Rubric

Name \_\_\_\_\_ Class Period \_\_\_\_\_ Date \_\_\_\_\_

Category	4	3	2	1
<b>Contribution to Group Goals</b> Score: _____	Consistently and actively works toward group goals; willingly accepts and fulfills individual role within the group.	Works toward group goals without occasional prompting; accepts and fulfills individual role within the group.	Works toward group goals with occasional prompting.	Works toward group goals only when prompted.
<b>Consideration of Others</b> Score: _____	Shows sensitivity to the feelings and learning needs of others; values the knowledge, opinion, and skills of all group members.	Shows and expresses sensitivity to the feelings of others; encourages the participation of others.	Show sensitivity to the feelings of others.	Needs occasional reminders to be sensitive to the feelings of others.
<b>Contribution of Knowledge</b> Score: _____	Consistently and actively contributes knowledge, opinions, and skills without prompting or reminding.	Contributes knowledge, opinions, and skills without prompting or reminding.	Contributes information to the group with occasional prompting and reminding.	Contribute information to the group only when prompted.
<b>Working and Sharing with Others</b> Score: _____	Helps the group identify necessary changes and encourages group action for change; does assigned work without reminders.	Willingly participates in needed changes; usually does the assigned work and rarely needs reminding.	Participates in needed changes with occasional prompting; often needs reminding to do the assigned work.	Participates in needed changes when prompted and encouraged; always or often relies on others to do the work.
<b>Total Overall Score</b> _____	Comments:			

Copyright 2012 by Chad Manis, Teacher/Written Eduware, LLC. All rights reserved.

# NON-LINGUISTIC REPRESENTATION

## Digital Tools and Resources to Explore

### Digital Tools

**Create Visualizations LiveBinder:** <http://tinyurl.com/muabwu3>

**A Periodic Table of Visualization Methods:** <http://tinyurl.com/w2xzw>

**Visual Dictionary Online:** <http://visual.merriam-webster.com/>

**Kathy Shrocks Guide to Sketch-noting:**  
<http://www.schrockguide.net/sketchnoting.html>

### Resources

**Photo Analysis:** <http://tinyurl.com/yjeklkp>

**Cartoon Analysis:** <http://tinyurl.com/45fyfg>

**Motion Picture Analysis:** <http://tinyurl.com/k9t7srz>

**Map Analysis:** <http://tinyurl.com/cbpyyyc>

**Poster Analysis:** <http://tinyurl.com/nrk2uu6>

**The Visual Recorder:** <http://tinyurl.com/ns43kbh>

**Mathematical Doodling:** <http://kottke.org/10/12/mathematical-doodling>

**Gamestorming Cheat Sheet:** <http://tinyurl.com/kslrfqy>

**Angela's Visualization and Sketch-note Resources on Pinterest:**  
<http://tinyurl.com/kxbs6ub>

# CUES AND ADVANCED ORGANIZERS

## Tips for Quality Design

### **Cueing Learners While Attending the Shifts that Underpin the Common Core:**

- Let the learner do the heavy lifting: rather than GIVING them background knowledge, challenge them to build it from text, visuals, video, or artifacts.
- Require the learner to use evidence from their study to make predictions about the content, concepts, or skills that will be studied.
- Differentiate the cue strategy according to student ability, interest, or content.

**Ability:** Learners explore one of three levels of text pulled from Newsela.com

**Interest:** learners conduct online research about a chosen concept, selected from a pool previously established by the teacher

**Content:** Learners work in groups to study just one of several concepts that will be learned. Other groups study the remaining topics, and all report out.

### **Examples of Advanced Organizers:**

- Essential Questions
- Objectives, Learning Targets, Goals, and I Can Statements
- Agendas
- Skimming
- Picture Walks
- Anticipatory and Reaction Guides

### **Designing a Quality Anticipatory and Reaction Guide**

**Adapted from Indiana University, 2006**

1. Select content, concepts, events, phenomena, or skills to be studied.
2. Draft 6-12 statements that focus on what is most important.
  - Ensure that learners can respond without having learned anything first.
  - Ensure that the statements will be supported or refuted by the learning.
  - Write statements that may challenge learner's beliefs.
  - Craft statements that are general rather than specific.

### **Using Anticipatory and Reaction Guides:**

1. Learners read and react to each statement by capturing beliefs in writing.
2. They report to small groups to share their reactions and if they wish, adjust them.
3. They engage in learning, and then they revisit guides again in order to revise.

## Aesthetically Oriented and Higher Order Thinking Question Stems

Kyleen Beers

### Questions to encourage an aesthetic response to a history/math/science text:

1. What did you think of what you just read?
  2. What confused you or surprised you?
  3. Try to imagine living through this event just described in the history text. What would you have felt?
  4. Try to imagine living life without this scientific discovery just discussed in the text. What would life be like?
- Try to imagine going one day without using this mathematical function we've just discussed. What would that be like?

### Questions that help students work together to make sense of history/math/science

1. What do other think about what \_\_\_\_\_ said?
  2. Do you agree? Disagree?
  3. Does anyone have the same answer or idea or theory but a different way to explain it?
  4. Would you ask the rest of the class that question?
  5. Do you understand what they are saying?
  6. Can you convince the rest of the class that that makes sense?
  7. How would you explain that to someone who doesn't have your same background in history/math/science?
- Who had an idea you really liked? What was it about the idea that intrigued you?

### Questions that help students rely more on themselves to determine whether something is historically/mathematically/scientifically correct:

1. Why do you think that?
  2. Why is that true?
  3. How did you reach that conclusion?
  4. Does that make sense?
  5. Can you make a model to show that?
  6. What theory supports this?
- What other past occurrences support this?

### Questions that help students learn to reason as a historian/mathematician/scientist:

1. Does that always work?
2. Is that true in all cases?
3. Can you think of a counterexample?
4. How could you prove that?
5. What assumption are you making?
6. What evidence is there to support your conclusion?

### Questions that help students learn to conjecture, invent, and solve problems:

1. What would happen if ....? What if not?
2. Do you see a pattern?
3. What are some possibilities here?
4. Can you predict the next one? How about the last one?
5. How did you think about the problem?
6. What decision do you think should be made?
7. What is alike and what is different about your method of solution and a classmates?

Look at the steps you went through to solve this dilemma. Where could you have taken a different route and how would the solution be different?

### Questions that help students to connect history/mathematics/science, its ideas, and its applications:

1. How does this relate to.....?
2. What ideas that we have learned before were useful in solving this problem or studying this situation?
3. Have we ever solved a problem or seen a situation like this before?

What uses of mathematics did you find in the newspaper tonight or hear on the news? What current event could be related to something you have learned in history? What is in the news today that is about science? Can you give me an example of...?

\*Adapted from the NCTM Professional Standards for Teaching Mathematics



## Using Sentence Frames to Scaffold Learners Toward Independent Questioning and Discourse

Adapted from the work of Jim Burke

Applying Comprehension Strategies	Taking a Position
<p><b>Predicting:</b> I predict that _____ If x happens then _____ Because x did y, I expect _____ I'm wondering if x _____</p> <p><b>Connecting:</b> X reminds me of _____ X is similar to y because _____ X is important to y because _____</p> <p><b>Inferring:</b> X is _____ so this means _____ Earlier, we learned _____, so this suggests _____ X causes Y as a result of _____, which demonstrates _____</p> <p><b>Summarizing:</b> The main idea is _____ The author's point of view is _____ The author's purpose is to _____ We read this because _____</p> <p><b>Evaluating:</b> The point made is valid/invalid because _____ The strengths of this piece are _____ The text/author does not do a good job of _____ What's most important about this is _____</p> <p><b>Analyzing the Text:</b> The author uses _____ for the purpose of _____ The author assumes _____ and I agree/disagree _____ These particular features of the text clarify/convolute meaning _____</p> <p><b>Clarifying:</b> This is what the author is really saying _____ Given that _____ happened, the author is trying to _____ X is not _____ but is instead _____</p> <p><b>Synthesizing:</b> These factors suggest _____ Initially, we/I thought _____, but after learning _____, I now think _____ It's not a question of x but rather of y because _____</p>	<p><b>Agreeing:</b> Most will agree that _____ because _____ I agree with the suggestion that _____ and this evidence supports that as well.</p> <p><b>Disagreeing:</b> I would challenge x's point about y because _____ I would argue that _____ because _____ X claims y, but we've learned that _____ so _____ While x suggests y, this evidence disproves that _____</p> <p><b>Agreeing and Disagreeing:</b> I agree that _____ I challenge y because _____ I share x's belief that _____ but question _____ because _____ I agree with _____ but question how that belief helps us resolve _____</p> <p><b>Arguing to Enlighten:</b> X is happening, but it is not y but z that is causing it to happen. While x is true, I would argue y, because of z. Previously, we understood x to be the most important factor, but y has changed, having this effect _____. I'm noticing this relationship _____ which changes previous notions about _____.</p> <p><b>Provoking Action:</b> We've learned x, so we must do _____ In order to do y, we must learn more about x. We used to think x, but now we realize y. Let's plan how we will use this information to do z.</p>

# SUMMARIZING

## A Rule-Based Strategy

### PROCEDURE

- Engage learners in a close, shared reading of a common text during their first experience.
- Read the passage once in its entirety, and prompt learners to articulate the GIST.
- Next, model how a reader might identify and then delete trivial material that is unnecessary to understanding by using a single strike-through.
- Model how a reader might identify and then delete redundant material using a double strike through.
- Substitute superordinate terms for lists (for example: “flowers” for “daisies, tulips, and roses”).
- Review what remains, and use these details to craft a topic sentence that can guide your summary.
- Demonstrate how to craft a summary that includes a topic sentence and supporting evidence from the text.

## REFERENCES

This week's presentation was adapted from the work of the following experts and researchers in the field:

Kyleen Beers

Sunni Brown

Jim Burke

Dave Gray

Learner-Centered Initiatives

Marzano, Robert J. (2007). **The art and science of teaching**. Alexandria, VA:Association for Supervision and Curriculum Development.

Marzano, Robert J. (2001). **Classroom instruction that works**. Alexandria, VA:Association for Supervision and Curriculum Development.

Marzano, Robert J. (2003). **What works in schools: translating research into action**. Alexandria, VA:Association for Supervision and Curriculum Development.

Wormeli, Rick. (2004). **Summarization in any subject: 50 techniques to improve student learning**. Alexandria, VA:Association for Supervision and Curriculum Development.

The WNY Young Writer's Studio