

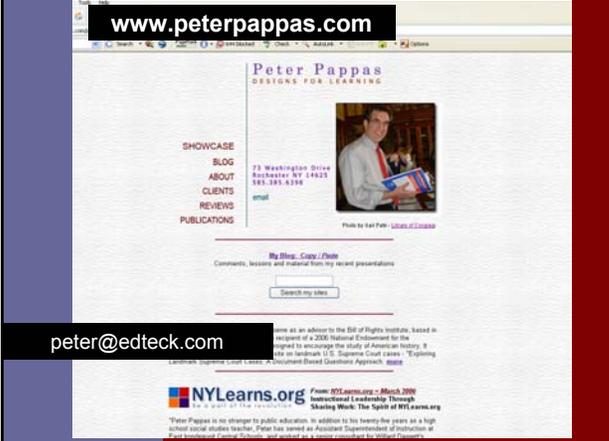
Rigor, Relevance and Reflection by Peter Pappas
 Strategies for Student Success ~ Oregon Department of Education Workshop



**Strategies for Student Success
 February Follow-up**

**Rigor,
 Relevance and
 Reflection**

Peter Pappas



www.peterpappas.com

Peter Pappas
 DESIGNS FOR LEARNING

SHOWCASE
 BLOG
 ABOUT
 CLIENTS
 REVIEWS
 PUBLICATIONS

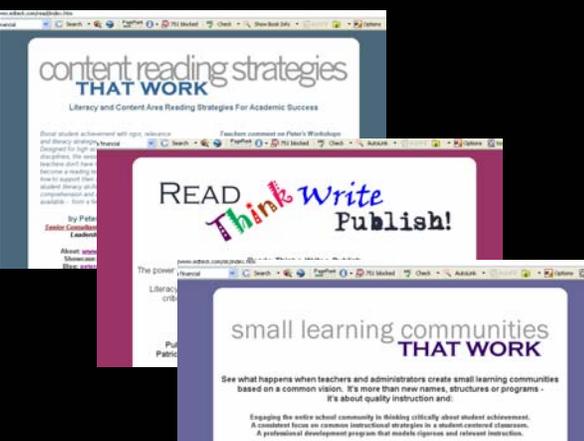
72 Washington Drive
 Rochester NY 14623
 585.383.6198

By Blog: Copy / Paste
 Comments, lessons and material from my recent presentations

Search my sites

peter@edteck.com

NYLeans.org



**content reading strategies
 THAT WORK**
 Literacy and Content Area Reading Strategies For Academic Success

**READ
 Think & Write
 Publish!**

**small learning communities
 THAT WORK**
 See what happens when teachers and administrators create small learning communities based on a common vision. It's more than new names, structures or programs - it's about quality instruction and:



Copy / Paste by Peter Pappas
 Dedicated to relinquishing responsibility for learning to the students

Upcoming Events from Peter's calendar

February 10, 2007
350 Participants + Live Blog + Audience Responses System + Engaging Workshop

Conference Keynote & Facilitator
 This, Feb 22
 Oregon Dept of Education - Portland OR

School Workshop
 Wed, Feb 28
 School without walls, District Workshop

Mon, Mar 12
 North House-Portland CSO

Go to:
peterpappas.blogs.com
 for color handout and podcast



**AM:
 Agenda**

1. Rigor, relevance and reflection
2. Defining, summarizing and comparing strategies
3. 21st century literacy

Two table discussions / breaks



**PM:
 Agenda**

Lunch

1. Extended applications that showcase student success. **Snack break**
2. Team planning time - rigor, relevance and reflection in action

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Literacy - constructing meaning

READING NEXT
A VISION FOR ACTION AND RESEARCH IN MIDDLE AND HIGH SCHOOL LITERACY

We'll focus on how you can use Reading and Writing Standards while teaching your subject standards

Reading Standards we'll address

1. Direct, explicit comprehension instruction	X
2. Effective instructional principles embedded in content	X
3. Motivation and self-directed learning	X
4. Text-based collaborative learning	X
5. Strategic tutoring	
6. Diverse texts of varying difficulty levels, topics, styles	
7. Intensive, integrated writing as a vehicle for learning	X
8. A technology component	X

Peter Pappas - Recent Clients

My goal: provide training that models the instruction we want to see in the classroom!

peterpappas.blogs.com/workshopblog/

When I go to a workshop, I like to:

- Focus on the theory of instruction: 27.3%
- Be inspired: 27.3%
- Interact with my peers: 27.3%
- Get ideas I can use in my classroom: 22.0%
- Reflect on my practice: 26.4%

What is rigor and relevance in a 21st century standards-based classroom?

Teachers are working hard to create classrooms where students can take on the challenge of intellectual work. We all want school to be more rigorous, relevant and engaging to students. Schools should give students opportunities to learn how professionals approach their work - scientist, engineer, artist, historian, mathematician, writer, and musician. The challenge is turning that vision into a reality.

1. What's your working definition of rigor and relevance?
2. How is rigor connected to your expectations for students?
3. How are standards a part of a rigorous and relevant classroom?
4. How can you support relevance with more student-directed instructional experiences?
5. How do we get past the obstacles to create the effective and engaging classroom of the 21st century?

Posted at 05:01 PM in [Rigor and Relevance](#) | [Permalink](#) | [Comments](#)

To comment on the blog- click comment link

Comment on the blog

POST A COMMENT

Name: Peter Pappas

Email Address: peter@edteck.com

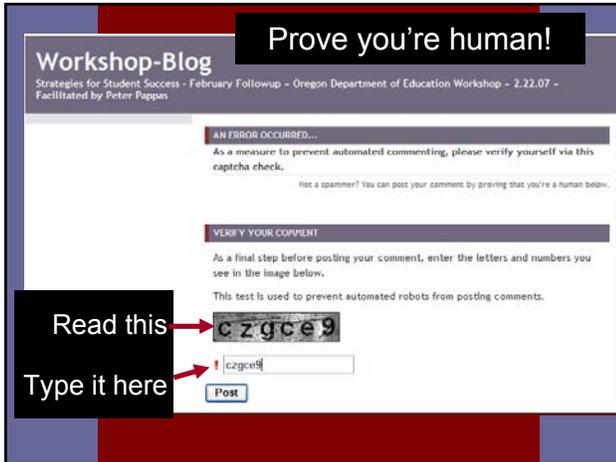
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Remember personal info?

Comments: Lee,
You make excellent points here - great opportunity, but a big challenge. We'll try to address some solutions at the conference. Looking forward to working with you. Stop by and say hello.

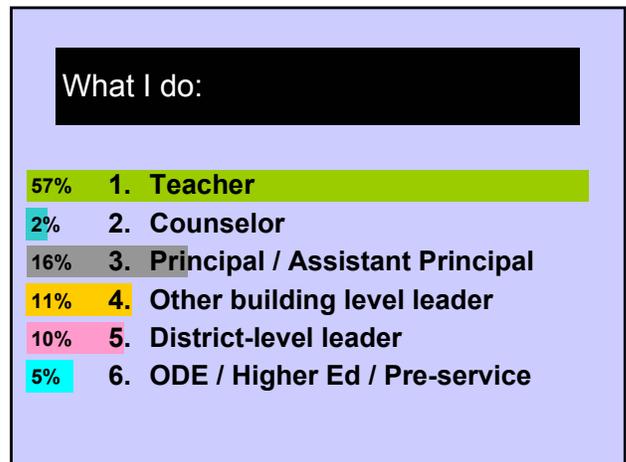
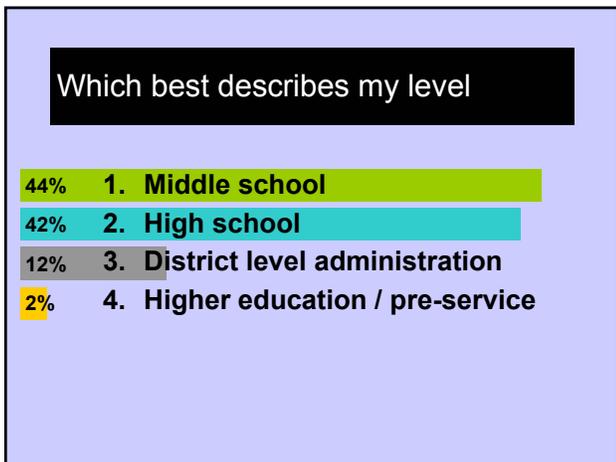
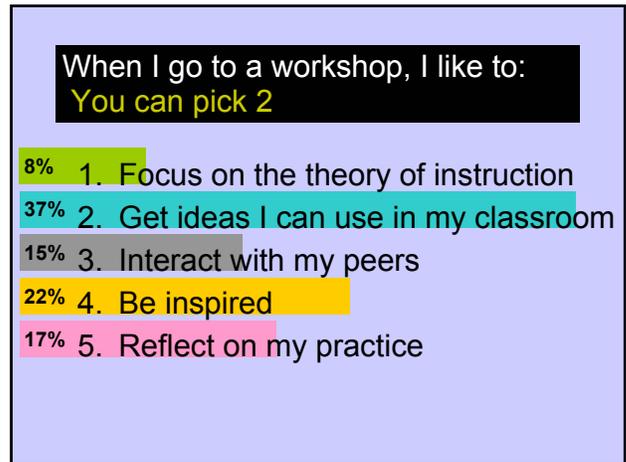
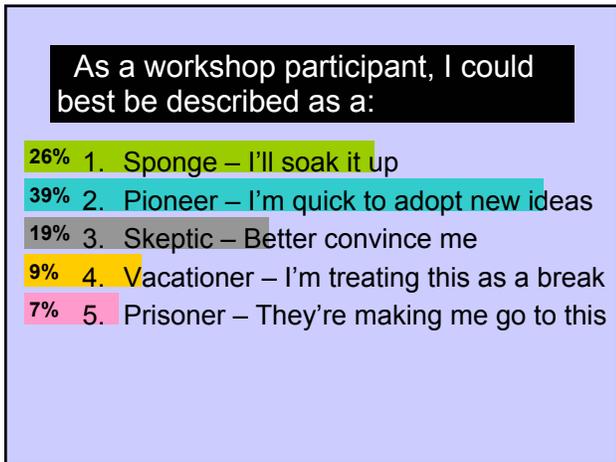
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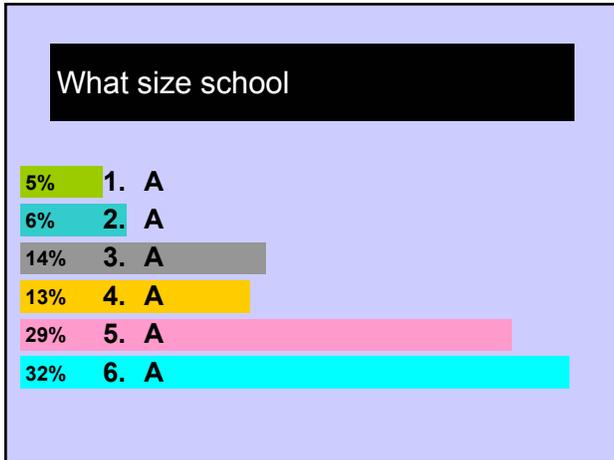
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Audience Response System
 courtesy of:

Mike Venrose
 Turning Technologies
 (330) 884-6044
 mvenrose@turningtechnologies.com





Rigor and Relevance in the 21st Century

Students must take on the challenge of intellectual work
rather than just look for the right answer.

Rigor: Bloom's taxonomy

Evaluation: appraise, defend, predict

Synthesis: compose, design, develop

Analysis: compare, contrast, categorize

----- Basic Skills -----

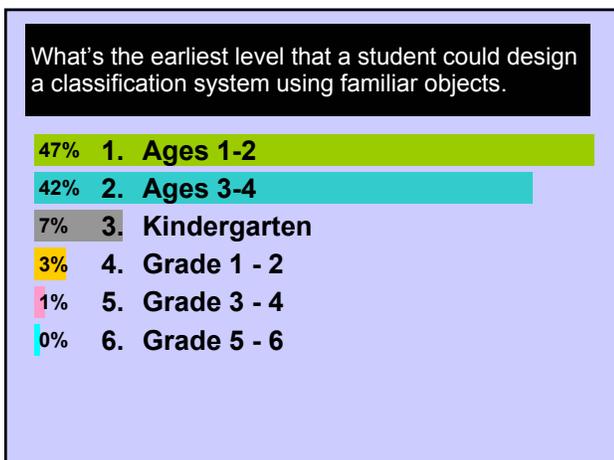
Application: demonstrate, illustrate, solve

Comprehension: describe, explain

Knowledge: memorize, name, recognize, recall

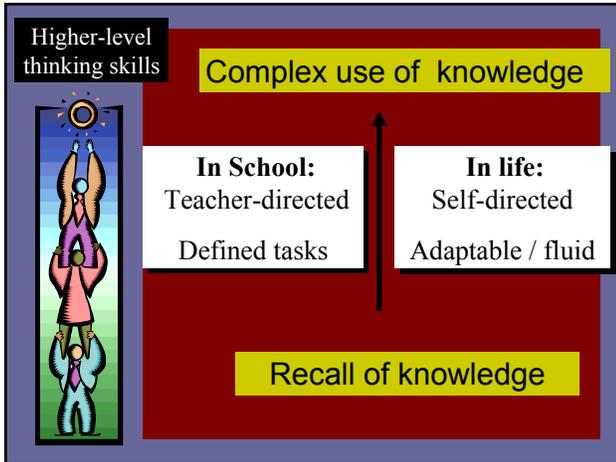
When can students start doing higher level thinking?

- You give the students a selection of familiar objects and ask them to classify them
- You scaffold / model the task, but they develop the classification independently
- They should be able to describe reasons for classification
- When adding a new object they can put in correct category or modify system to accommodate the new object



How do we create a secondary program with **rigor**?

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Justin, a second grader, talks about math

Justin
 Math is when you add or subtract numbers. And your teacher will make sure you have the right answer.

Only right answers count. Teachers tell you how to get those right answers. You work by yourself to solve problems.

From: Math Is Language Too: Talking and Writing in the Mathematics Classroom
 Phyllis Whitin

The slide includes a drawing of a teacher leaning over a desk to help a student.

Question: A cruise ship carries 200 passengers and crew. Each life boat carries 30 passengers. How many lifeboats will the ship need?

Almost one-third of the 8th graders who took a NAEP math test answered
“6 remainder 20”

The illustration shows a green lifeboat with a red and white life preserver on the water. Two people are visible inside the boat.

From a high school valedictorian:
“I could memorize very easily, and became valedictorian.

But I was **embarrassed that I understood much less** than some other students who cared less about grades.

I felt that **my brain was a way station for material** going in one ear and (after the test) out the other.”

~ High School Student quoted in Wiggins and McTighe
Understanding by Design

Make it relevant

The illustration shows a group of people in business attire walking on a red carpet that is being rolled out by a machine.

Lower level:
I use skills/knowledge in school (for my teacher)

Higher level:
I use skills/knowledge for myself in the real world

1 2 3 4 5

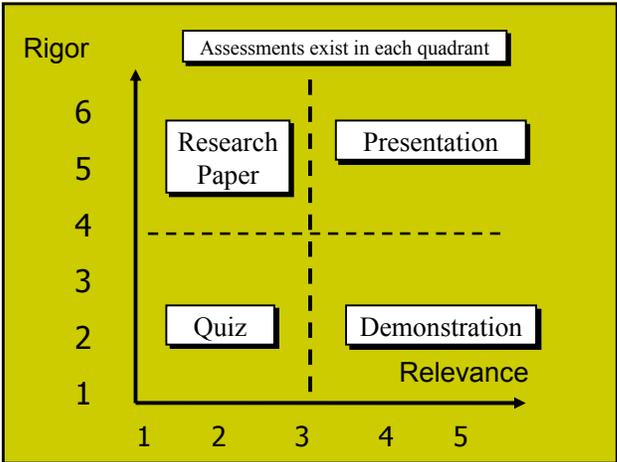
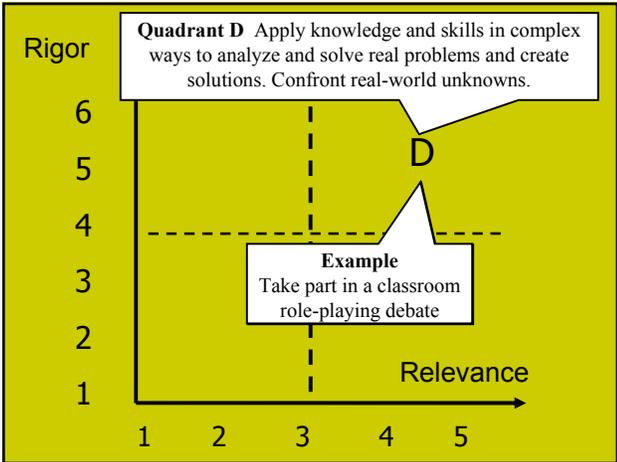
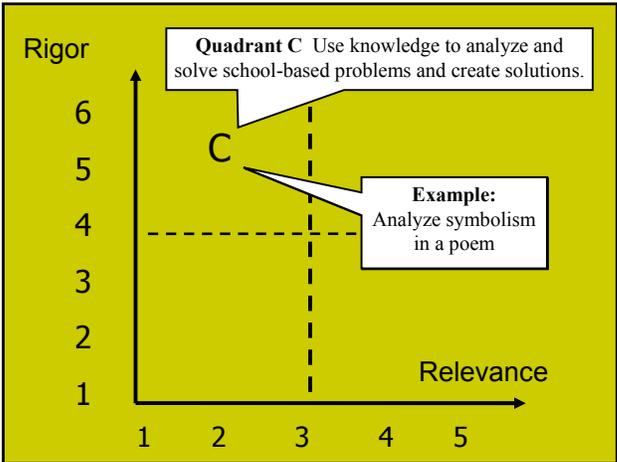
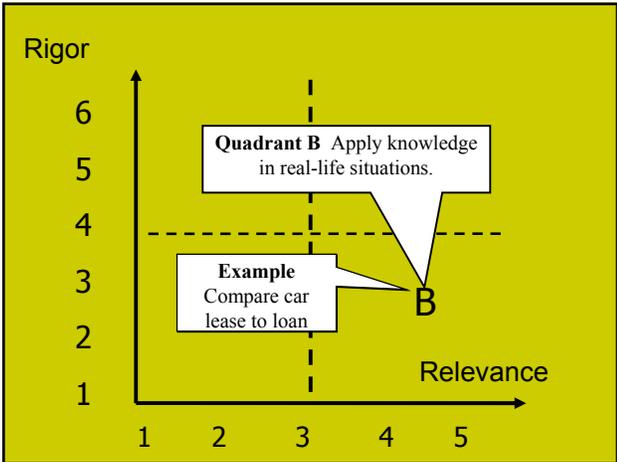
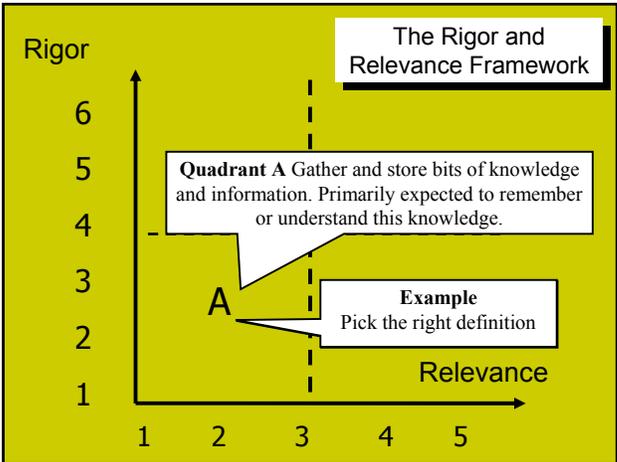
A horizontal arrow at the bottom points from left to right, with numbers 1 through 5 positioned below it.

Greater relevance for the student means:

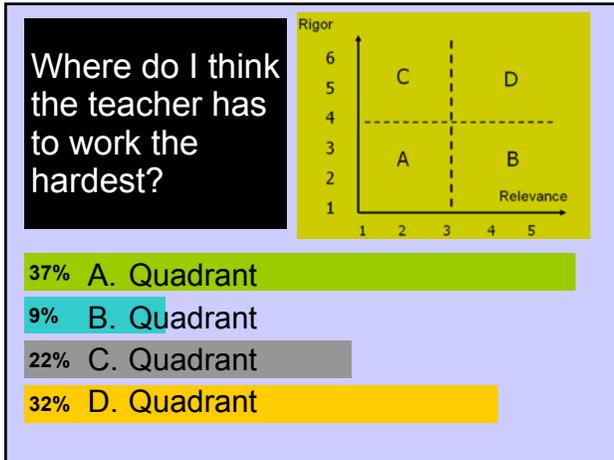
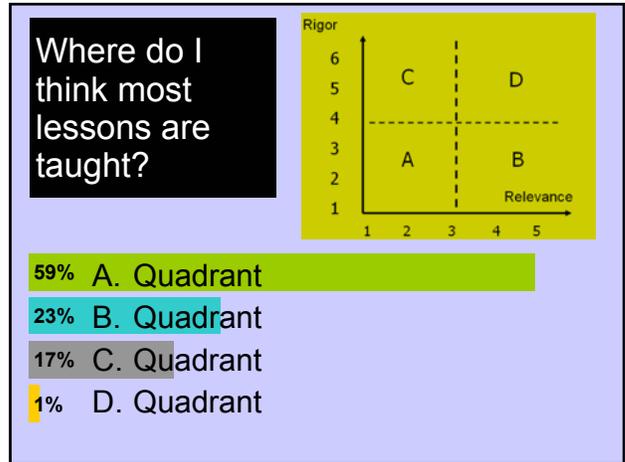
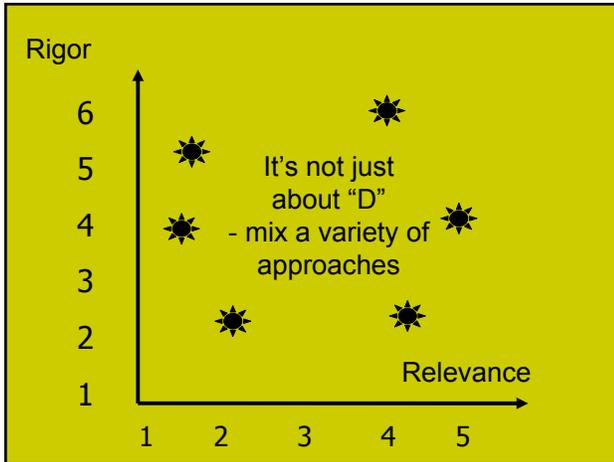
1. I understand how this information or skill has some application in my life.
2. I have an opportunity to construct my own understanding rather than just learn “the facts.”
3. In addition to learning content and skills, I am thinking about how I learn.

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How do we create a secondary program with **relevance**?



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Synthesis

CIM ~ Synthesis
Examine Content and Structure

- **Synthesize and use information** from a variety of consumer and public documents to explain a situation or decision and to solve a problem (grade 8)...
- **Synthesize the content from several sources** or works by a single author dealing with a single issue; paraphrase the ideas and **connect them to other sources and related topics** to demonstrate comprehension (grade 10)
- **Evaluate the logic, unity and consistency of text**, etc.....(grade 10)

Bloom's Synthesis
Extended Application

The student will be able to **apply and extend** academic and career-related **knowledge and skills in new and complex or non-routine situations** appropriate to the student's personal, academic, and/or career interests and post-high school goals.

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What's special about Synthesis?

Evaluation: appraise, defend, predict

Synthesis: compose, design, develop

Analysis: compare, contrast, categorize

----- Basic Skills -----

Application: demonstrate, illustrate, solve

Comprehension: describe, explain

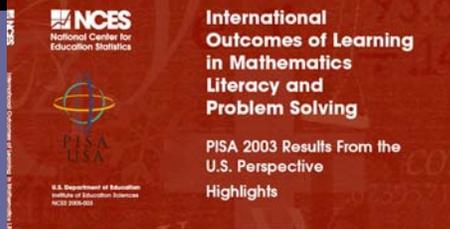
Knowledge: memorize, name, recognize, recall

Synthesis > Creativity > Innovation

- Our curriculum and pedagogy heavily emphasizes analysis over synthesis.
- Students categorize, dissect and compare

But we rarely ask students **to create something new**

Program for International Student Assessment (PISA) is an assessment (began in 2000) that focuses on 15-year-olds' capabilities in reading literacy, mathematics literacy, and science literacy.



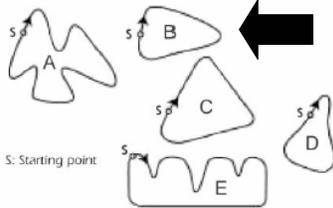
My blog "Are students well prepared to meet the challenges of the future?"
http://peterpappas.blogs.com/copy_paste/2006/09/are_students_we.html

Question From PISA Math Literacy



Here are pictures of five tracks:

Along which one of these tracks was the car driven to produce the speed graph shown earlier?

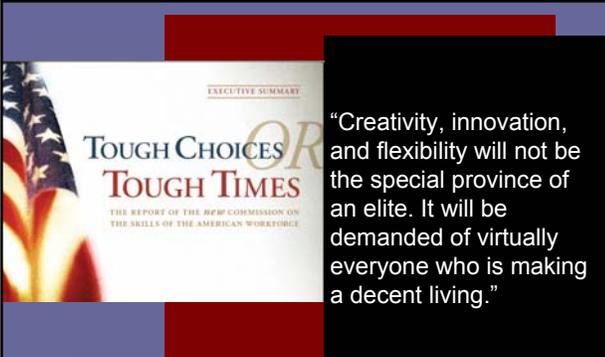


United States percent full credit: 23%
 All country average: 30%
 8 Countries between 55 – 36%

PISA Defines Problem solving as:

...an individual's capacity to use cognitive processes to **confront and resolve real, cross-disciplinary situations** where the solution is **not immediately obvious**.

... and where the literacy domains or curricular areas that might be applicable are **not within a single domain of mathematics, science, or reading**.



“Creativity, innovation, and flexibility will not be the special province of an elite. It will be demanded of virtually everyone who is making a decent living.”

Tough Choices or Tough Times: The Report of the New Commission on the Skills of the American Workforce
 by NCEE 2007

Tough Choices or Tough Times on **synthesis**

“If someone can figure out the algorithm for a **routine job**, chances are that it is economic to **automate it**.”

The best employers the world over will be **looking for the most competent, most creative and most innovative people** on the face of the earth and be willing to pay them top dollar for their services.”

Synthesis is Innovation
 ~ fresh ideas being put to work

Evaluation

What's special about Evaluation?

Evaluation: appraise, defend, predict

Synthesis: compose, design, develop
Analysis: compare, contrast, categorize

----- Basic Skills -----

Application: demonstrate, illustrate, solve
Comprehension: describe, explain
Knowledge: memorize, name, recognize, recall

Bloom's Evaluation Collection of Evidence
 ~ Creating a Reflection

1. Which parts of your collection **give you the most pride? Why?**
2. As you completed your collection, what kinds of **challenges did you face? What did you learn** from those challenges?
3. How are the knowledge and skills you describe **relevant to your education plans** and post-high school **goals?**

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How do we create a secondary program with reflection?

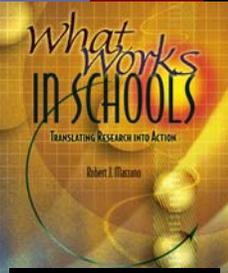
You will need to purposefully connect students with their learning



1. What am I learning today?
2. Why am I learning it?
3. How can I use this knowledge and these skills to make a difference in my life?
4. How can I work with teachers and other students to improve my learning?
5. How am I progressing as a learner?




To comment on the blog- click comment link



Robert Marzano:
What Works in Schools

“35 years of research concretely identifies the factors that are the primary determinants of student achievement.”

Robert J. Marzano, What Works in Schools: Translating Research into Action, 2003

Instructional strategies that work

We'll focus on three strategies

1. **Defining:** negotiating meaning
2. **Summarizing:** synthesis and judgment
3. **Comparing:** assessing similarities and differences

Reading Standards	
1. Direct, explicit comprehension instruction	X
2. Effective instructional principles embedded in content	X
3. Motivation and self-directed learning	X

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"Toolkit"
 Reading Strategies
 you can download

For more strategies:
www.edteck.com/read

Reader's Toolbox

Tool #10
 You Are the Jury

Use this tool to:

1. I will use a strategy to negotiate with my partner about a text.

2. I will use a strategy to negotiate with my partner about a text.

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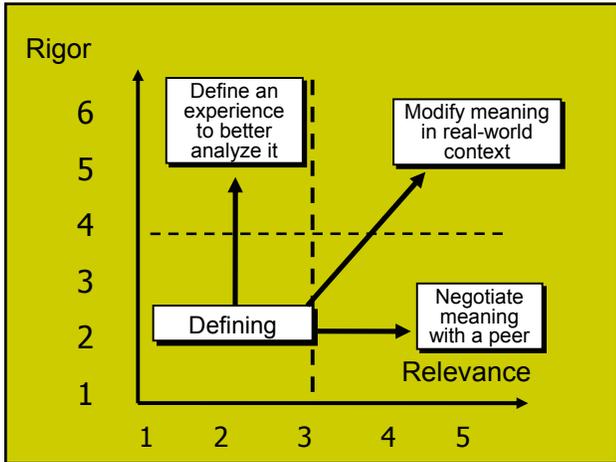
98. I will use a strategy to negotiate with my partner about a text.

99. I will use a strategy to negotiate with my partner about a text.

100. I will use a strategy to negotiate with my partner about a text.

Strategy #1:
 Defining
 negotiating
 meaning

What is this?



Strategies for teaching defining skills

- 1. Connect new vocabulary with *prior knowledge***
 - What they think they know
 - Brainstorm their own explanations of terms
 - Introduce with story, current event, image
- 2. Give students a chance to more *deeply process* vocabulary to internalize meaning**
 - Create their own non-linguistic models of terms
 - Activities that explore, restate, discuss terms with peers
 - Finalize with reflection and revisions to vocabulary notebooks

Let's negotiate meaning: "Adolescent"

- Work in a small group to develop a definition for "Adolescent"
- Work together until you can agree on a definition
- Group roles
 - "Definers" (2 or 3 of you) discuss possible meaning
 - "Recorder" captures evolving meaning

Adolescent, n.,
 a 24-year old male too busy playing Halo 2 on his Xbox or watching SpongeBob at his parents' house to think about growing up.

Adolescent

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List, Group, Label *Example "Revolution"*

1. List all the words they can think of related to the subject
2. Group the words that you have listed by looking for word that have something in common
3. Once grouped, decide on label for each group

Use a variety of skills - prior knowledge, identifying, listing
 Use words in multiple contexts allow to be creative.
 Group work exposes students to thinking of others

Words, Words, Words ~ Allen

Increase rigor and relevance with a personal vocabulary notebook

Term:
"My" definition:
Dictionary Definition:
Comparison:

Reading for Academic Success ~ Strong and Silver

Term: <i>Segregation</i>
"My" definition: <i>A time when African-Americans used to have separate schools</i>
Dictionary Definition: <i>The policy or practice of forcing racial groups to live apart from each other</i>
Comparison: <i>I thought of segregation more as a time period, but the dictionary calls it a practice or policy</i>

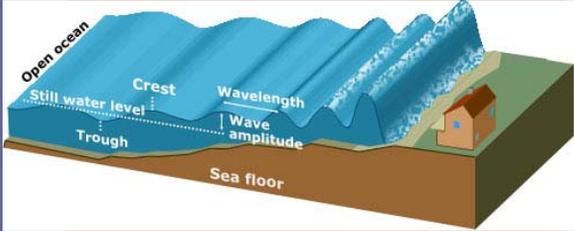
Be sure to consider the use of familiar terms in a specialized context

- Identify **key words** in passage
- Ask students to read the passage with **special attention to the context** in which the term is used
- Ask students to discuss **how the author has used the term** in this specific context
- Ask them to **refine their preliminary definition** of the word

Refining meaning in an academic discipline ...
 "Model"

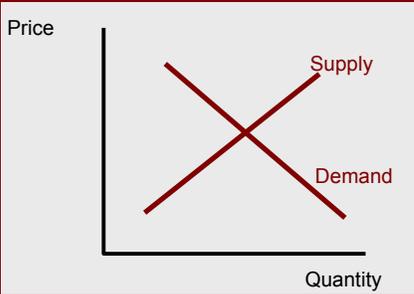


Model of how a tsunami develops



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The supply and demand model



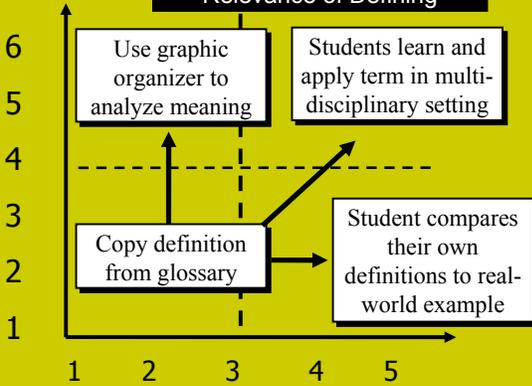
Compare to the dictionary definition

Model - n.

1. a standard or example for imitation or comparison.
2. a representation, generally in miniature, to show the structure or serve as a copy of something.
3. a person or thing that serves as a subject for an artist, sculptor, writer, etc.
4. a person, esp. an attractive young woman, whose profession is posing with, wearing, using, or demonstrating a product for purposes of display or advertising.
5. a pattern or mode of structure or formation.

Rigor

Improving the Rigor and Relevance of Defining



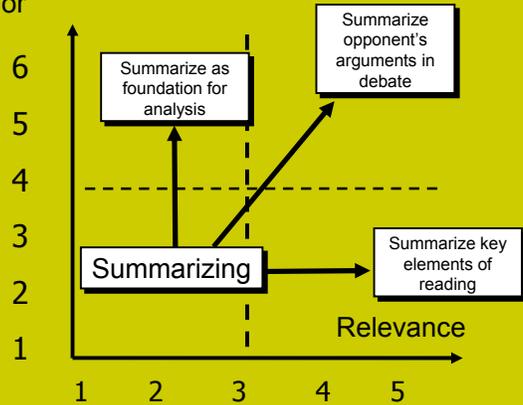
Defining: A chance for reflection

1. How is the term **related to previous subject matter** I have studied?
2. What's **something in my life** I can associate with the term?
3. How the term is **used in real-life situations**?
4. How has my **understanding** of the term evolved?

Strategy #2:
 Summarizing
 synthesis and
 judgment



Rigor



Rigor, Relevance and Reflection by Peter Pappas
Strategies for Student Success ~ Oregon Department of Education Workshop

Research shows student use of summarizing skills results in a 34-percentile gain in student performance.
Classroom Instruction that Works, ASCD, 2001

Case 1:
Teacher lectures on the essential characteristics of mammals

Case 2:
Teacher lectures and then students do a summarizing exercise on the essential characteristics of mammals

+ 34% gain in content mastery

Summarizing is an essential reading skill

Brad - high school senior

“I don’t look at a book as a whole bunch of words... I look at it as **someone’s thinking** and the **information the author wants me to know.**”



From: Do I Really Have to Teach Reading?
~ Cris Tovani

Summarizing skills include:

- **Identify details** – can you identify key symbols, words, visual elements?
- **Recognizing context** –where is this taking place, time period, who’s involved?
- **Identify relationships** –who are these people, what is their relationship to one another?

More summarizing skills

- **Identify opinions** – is there a point of view expressed in the source information?
- **Infer meaning** – is there meaning that can be extracted from what’s between the lines?
- **Make predictions** – based on the information, what will happen next?

Which summarizing skills would be most challenging for your students
You can pick 2

2%	1. Identify details
11%	2. Recognizing context
19%	3. Identify relationships
10%	4. Identify opinions
43%	5. Infer meaning
15%	6. Make predictions

Two essential components of teaching effective summarizing skills

1. Introduce material to be summarized – it’s structure and what students should expect to learn from it.
2. Allow them to make their own judgements about what is important. (Instead of simply asking them to repeat the details we’ve identified.)

Rigor, Relevance and Reflection by Peter Pappas
 Strategies for Student Success ~ Oregon Department of Education Workshop

Writing a summary matched to text structure

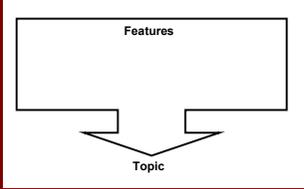
Recognizing how a piece of writing is organized helps to summarize it

Students may need to first map out the main points in a rough outline so that they can see the relationships

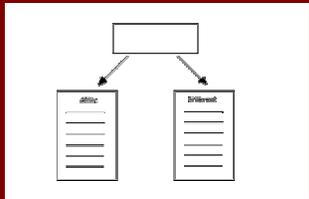
Critical Strategies for Academic Thinking and Writing by Mike Rose, Malcolm Kiniry

Pattern	Description	Cue Words
Description	Describes a topic by listing characteristics, features, and examples	for example, characteristics are
Comparison	Explains how two or more things are alike and/or how they are different.	different; in contrast; alike; same as; on the other hand
Cause and Effect	Lists one or more causes and the resulting effect or effects.	reasons why; if...then; as a result; therefore; because
Problem and Solution	States a problem and lists one or more solutions for the problem.	problem is; dilemma is; puzzle is solved; question... answer
Sequence	Lists items or events in numerical or chronological order.	first, second, third; next; then; finally

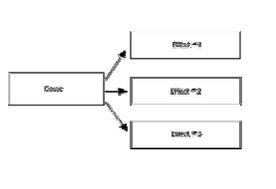
Description: listing characteristics, features, and examples



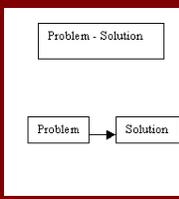
Comparison: how two or more things are alike or different



Cause and Effect: one or more causes and the resulting effect or effects



Problem and Solution: States a problem and lists one or more solutions for the problem

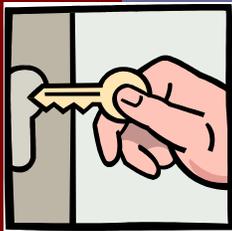


If we expect our student to synthesize the essential information, do we help them set a purpose for their reading?

Think of purpose we set for our reading

Students need to know what they should expect to learn

- Main points or details?
- Sequence of events?
- Author's viewpoint?
- Connections to previous learning?



Would your students benefit from standardized reading assignment form?

1. **Specific passage and due date**
2. **Purpose** – what should they know or be able to do?
 And pay special attention to:
 - **New vocabulary** that they will encounter
 - **Text features** – headings, bold face, images, data, graphs, footnotes
 - **Reading tips** – skim, make predictions, summarize, organize details, take notes

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READING STRATEGIES FOR THE CONTENT AREAS

READING ASSIGNMENT PLANNING

Reading Assignment: _____

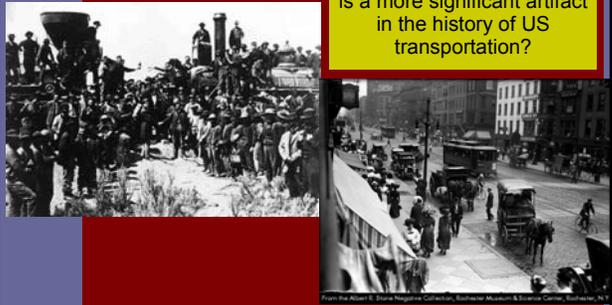
Purpose/Expected Results: _____

Vocabulary: _____

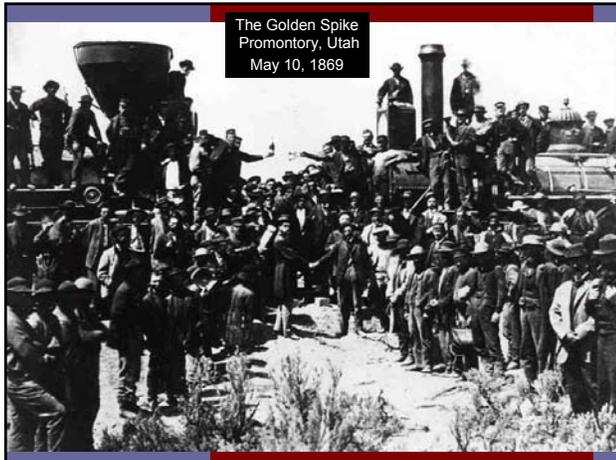
From Reading Strategies in the Content Areas
 ASCD, 2003

Summarizing - synthesis and judgment – that’s the student job not ours!

Which of these two images is a more significant artifact in the history of US transportation?



From the Albert E. Staro-Nagelmaier Collection, Rochester Museum & Science Center, Rochester, N.Y.



Which of these two images is a more significant artifact in the history of US transportation?

55% 1. Golden Spike

45% 2. Street scene



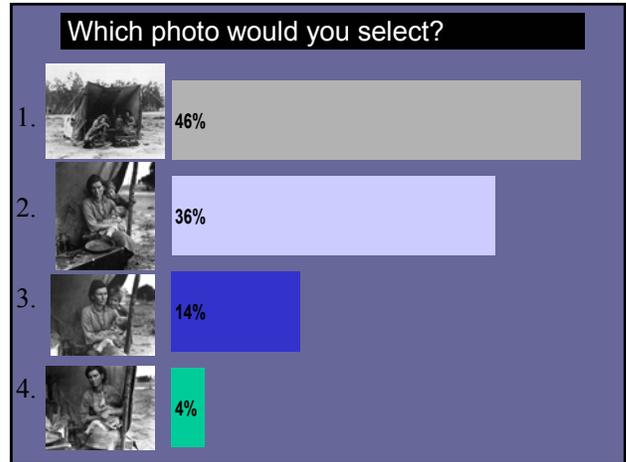
Make it more rigorous and relevant with **Evaluation**



Which photo would you use?
 What’s in the images? What’s left out?

?

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"I approached the hungry and desperate mother, as if drawn by a magnet. I do not remember how I explained my presence ... she asked me no questions. ... I did not ask her name.

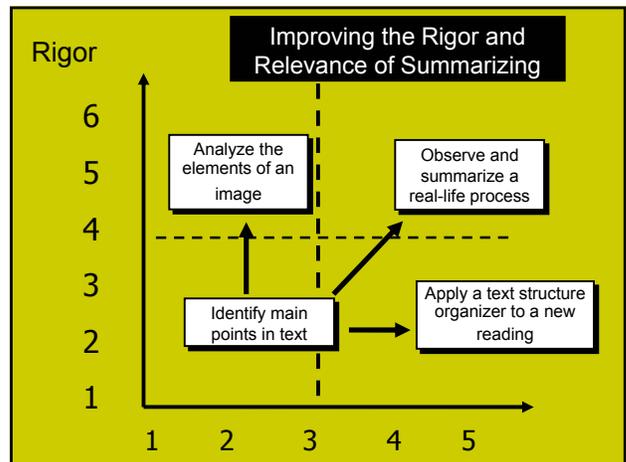
She told me that she was thirty-two. They had been living on vegetables from the surrounding fields, and birds that the children killed.

She seemed to know that my pictures might help her, and so she helped me. There was a sort of equality about it." Dorothea Lange

"Migrant Mother" 1936 Nipomo, California

Two essential components of teaching effective summarizing skills

1. Introduce material to be summarized – it's structure and what students should expect to learn from it.
2. Allow them to make their own judgements about what is important. (Instead of simply asking them to repeat the details we've identified.)



Summarizing: A chance for reflection

- Does my summary convey the information **accurately and fairly**?
 - Are my ideas in the **right sequence**?
 - Is they too **narrow or broad**?
- Did my summary **suit my audience and purpose**?
- Did I use **my own words and style**?
- What did **I learn** from creating the summary?

Strategy #3: Comparing / Classifying

assessing similarities and differences and what we can learn from them

Research shows student use of comparison skills results in a 45 - percentile gain in student performance.
Classroom Instruction that Works, ASCD, 2001

Case 1:
 Teacher lectures on the essential characteristics of mammals

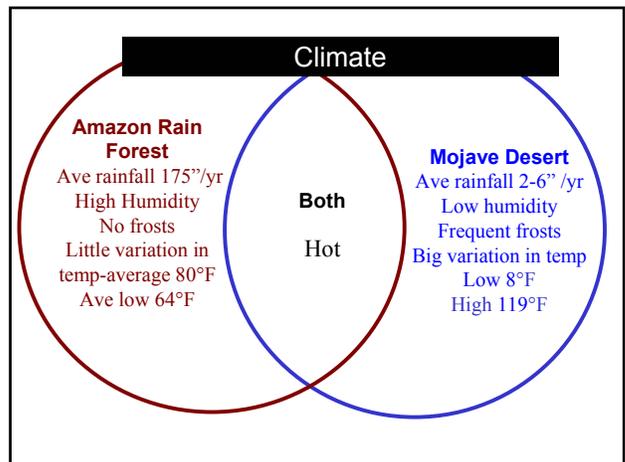
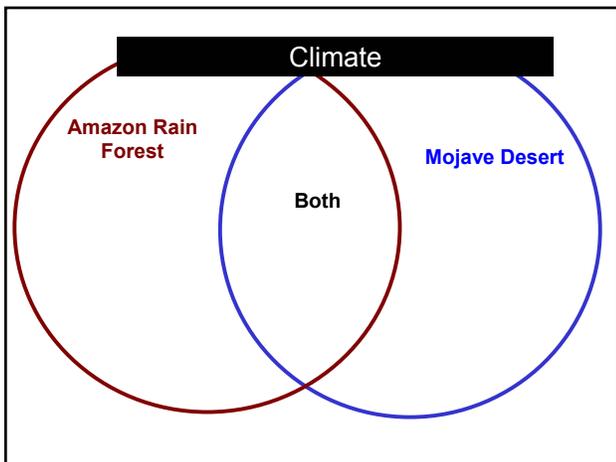
Case 2:
 Teacher lectures and then students do exercise comparing the essential characteristics of mammals to birds

+ 45% gain in content mastery

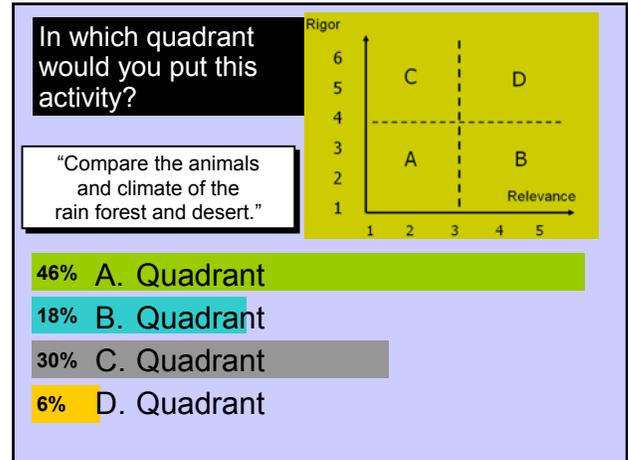
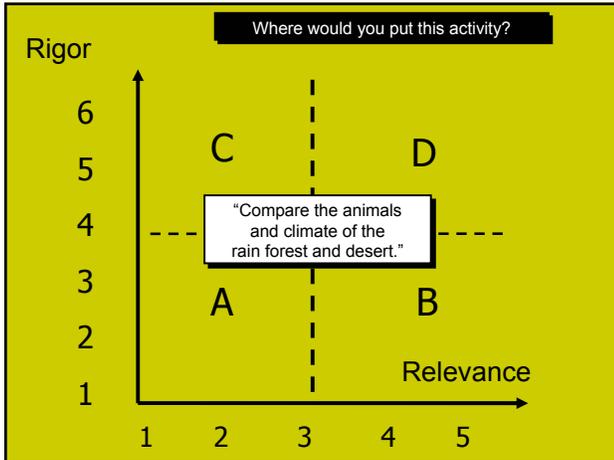
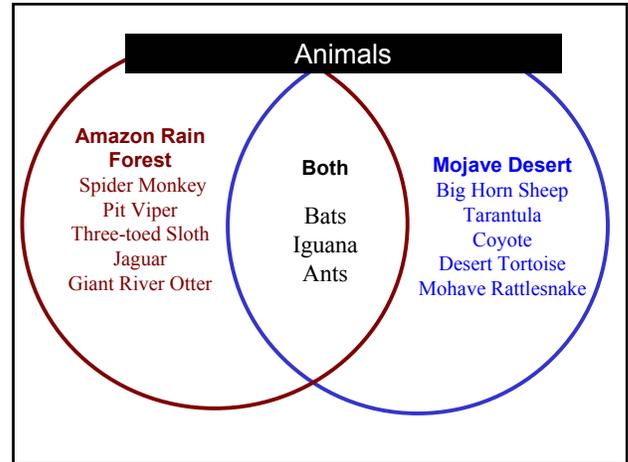
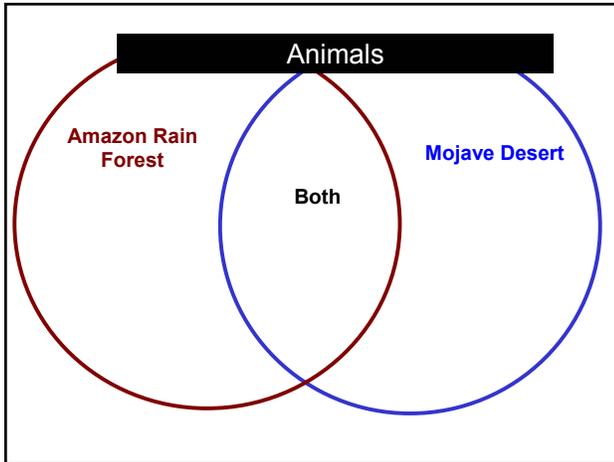
"Compare the animals and climate of the rain forest and desert."

Amazon Rain Forest	Mohave Desert
Ave rainfall 175"/yr	Ave rainfall 2-6" /yr
High Humidity	Low humidity
No frosts	Frequent frosts
Little variation in temp-average 80°F	Big variation in temp
Ave low 64°F	Low 8°F
Hot	High 119°F
Spider Monkey	Bats
Pit Viper	Iguana
Three-toed Sloth	Ants
Jaguar	Big Horn Sheep
Giant River Otter	Tarantula
Bats	Coyote
Iguana	Desert Tortoise
Ants	Mohave Rattlesnake

Classroom Instruction that Works, ASCD



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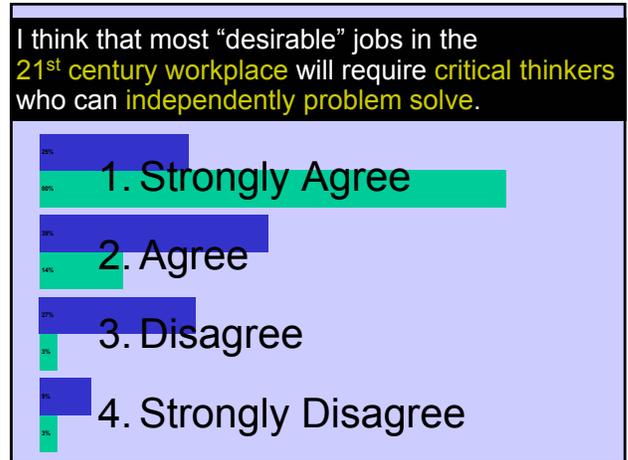
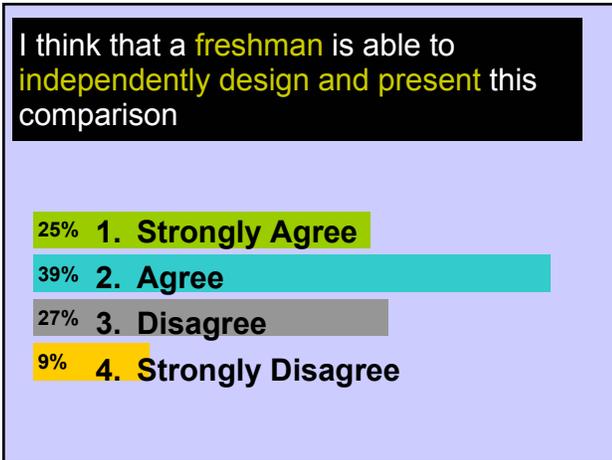
Who is doing the comparing in this exercise?
The teacher or the student?

1. Who **selected the information?**
2. Who **decided on the categories?**
3. Who **designed the graphic organizer?**
4. What's the **purpose** of the comparison?
 (What does it enable us to do or see?)

Is this really an exercise in memorizing and repeating information?

How would students independently compare regions?

- Select two geographic regions of the world
- Develop a model to compare the regions
- Select at least two factors to compare
- Develop a graphic organizer to display your comparison.



- Do you give students an opportunity to **develop their own analytic models** for comparison?
1. They **select items to compare** from a teacher-produced list.
 2. They independently decide **what to compare**.
 3. Can include some combination of **selecting both the items and / or characteristics**.

Is Tuesday’s school lunch better than Wednesday’s lunch?

Middle school



Design comparison
 Select characteristics
 Rating system

Develop a comparative analysis of **What’s more important in sports ...strength or agility?**



Add a peer review of research proposals

- Rigor and relevance in practice:
Student-designed classification systems
1. What **things are alike** that I can put into a group?
 2. **Does everything fit** into a group now?
 3. Would it be better to **split up any of the groups** or put any groups **together**?
 4. **What do I learn** from the classification?

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Increase rigor of classification
– add evaluation and decision-making

Decision	Criteria for evaluation		
	Criteria 1	Criteria 2	Criteria 3
Option 1			
Option 2			
Option 3			



Make it relevant - Choose an Mp3 Player	Criteria		
	Cost	Battery	Memory
iPod			
Creative Zen			
Zune			

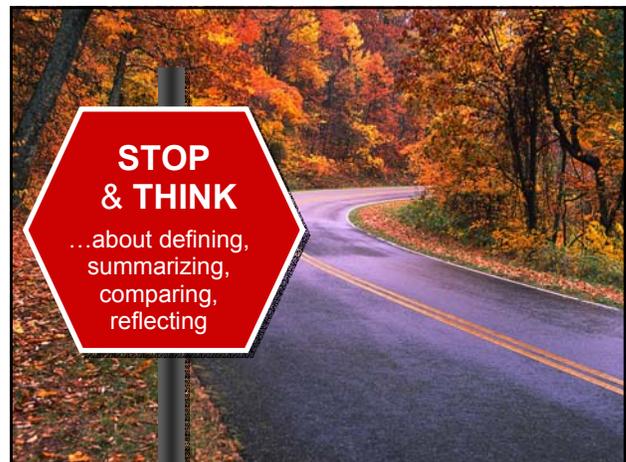
What criteria will you use?
Are they of equal importance?
How can your evaluations be quantified?

Two essential elements of comparing

1. Do we ask students to develop the comparison, or merely learn and repeat the comparison model that was presented to them?
2. Does the comparison serve as a catalyst for a deeper understanding of the material?

Comparing: a chance for reflection

- What information did compare?
- How did I structure the comparison?
- In what ways was the comparison useful to me?
- What did I learn from it?



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Workshop-Blog
 Strategies for Student Success - February Followup - Oregon Department of Education Workshop - 2.22.07 -
 Facilitated by Peter Pappas

Get 3 out of 238 visitors

When I go to a workshop, I like to:

Focus on the theory of instruction	27.3%
Be inspired	27.3%
Interact with my peers	27.3%
Get ideas I can use in my classrooms	62.6%
Reflect on my practice	36.4%

What is rigor and relevance in a 21st century standards-based classroom?

Teachers are working hard to create classrooms where students can take on the challenge of intellectual work. We all want school to be more rigorous, relevant and engaging to students. Schools should give students opportunities to learn how professionals approach their work - scientist, engineer, artist, historian, mathematician, writer, and musician. The challenge is turning that vision into a reality.

1. What's your working definition of rigor and relevance?
2. How is rigor connected to your expectations for students?
3. How are standards a part of a rigorous and relevant classroom?
4. How can you support relevance with more student-directed instructional experiences?
5. How do we get past the obstacles to create the effective and engaging classroom of the 21st century?

Posted at 02:01 PM in [Rigor and Relevance](#) | [Permissions](#) | [Comments](#) (0)

To comment on the blog- click comment link

Rigor,
 Relevance,
 Reflection,
 and 21st
 Century
 Literacy

“You control the Information Age.
 Welcome to your world”
 ~ Time

New technologies have put students in charge of the information they access, store, analyze and share.

Life has become an open book test.

Yet many schools function as if they still controlled the flow of information

What is
literacy in the 21st
century?

Literacy in the 21st century will mean the ability to find information, decode it, critically evaluate it, organize it into personal digital libraries and find meaningful ways to share it with others. *David Warlick*



What factors impact
literacy in the 21st
century?

Flow of information has changed from a **top-down broadcast model** - to a **horizontal model** that fosters **interaction – people / information**



Personal - You can gather information, content, and entertainment.



An explosion of self-direct learning

“Search is highly personal and empowering.

It's the antithesis of begin told or taught.”

~ Eric Schmidt
CEO Google



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IDENTIFIX DIRECT-HIT

Posted Fix Information

Confirmed Fix: Gaslet

Problem Description: 1- customer complaint- he has to top up cooling system due to "low coolant"
 2- Mac, is good for 1-2 weeks, then light comes on, no obvious leaks or puddles
 3- top up cooling system, pressure test, no drive under pressure, pressure gauge shows no drop noticeably, visual inspection of hoses, intake gaskets at top, 5- removed plastic shield and aluminum valveplate for better view of unit
 4- found wet spring harnesses and foam at passenger side front corner of fender
 5- Clear inspection revealed white traces up back to passenger side water seal junction, long bit of antifreeze in the crack where the gasket edge is. Leak will
 6- while trace as it evaporates off the fan shroud faster than it actually leaks. And
 7- pump mounting bolt torque. Off specs call for 22 ft-lbs. Tightened the six bolts
 8- 12 ft-lb (with torque wrench). You can access these under the truck when
 9- you would have to remove an intake hose, etc to access from the top. (Leak
 10- gasket with rubber spring may, seal stops after bolts are torqued. I replaced
 11- same seal bolts on my 2002 Suburban 5.3L, check any new Chev. small leak
 12- problem

Vehicle Description: 2003 GMC Sierra 2500 S.B. G40, V8 U

Category: Engine Cooling
 Control Leaks

Posted By: Buile Wilkins And Fam

Posted Date: 1/14/2007

©2007 Automotix



Auto service technicians must be capable online researchers adept at computers, math and reading.

A copy / paste world fosters synthesis and creativity



PEW / INTERNET
 PEW INTERNET & AMERICAN LIFE PROJECT

Teen Content Creators

57% of online teens create content for the internet:

Blogs and web pages
 Share original or remixed - artwork, photos, stories, or videos

Girls age 15-17 lead the blogging activity among teens.



High school teacher Lars Brownworth's "12 Byzantine Rulers" is in the top 50 of all podcasts

12 Byzantine Rulers
 The History of The Byzantine Empire

ON EDUCATION
 History Teacher Becomes Podcast Celebrity

By Lars Brownworth



Evaluation:
 Created new digital communities – of people who share advice and opinion



Age of Peer Production – Armies of amateurs happy to work for free producing user-generated content.

Apple User Groups

Learn More About User Groups

Help is Here for Group Leaders

Find a Group

Join or Start a Group on Campus

People who use Apple technologies have joined together in user groups all around the world. Hundreds of groups offer members the chance to become friends with other Mac users, get questions answered, and have a lot of fun. Groups are for everyone from first-time computer users to experts – from every profession, background, and age. Want technology to do more for you? Join the Club. Find a user group near you.

News & Events
 Questions & Answers
 Contact Us

Podcast: Listen to the Apple User Group Advisory Board's User Group Market Report

UGAB Website: Check out the User Group Advisory Board's website for information on events, resources and special offers for Apple User Groups.

Rigor, Relevance and Reflection by Peter Pappas
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Amazon's top rated reviewer –
Harriet Klausner ~ 13,199 book reviews

The screenshot shows Harriet Klausner's Amazon reviewer profile. It includes her name, a photo, and a list of recent book reviews with their star ratings. Her reviewer rank is listed as 'One of 13,199 reviewers (81,722 helpful votes)'. The profile also shows her nickname, birthday, and a section for 'In my own words'.

Simon Pulsifer has authored somewhere between 2,000 and 3,000 Wikipedia articles and edited roughly 92,000 others

The image shows Simon Pulsifer, a man with glasses, sitting at a desk with a laptop. The laptop screen displays a Wikipedia article. The background is a bookshelf filled with books.

The copy / paste culture creates a **bottom-up takeover of the information flow.**

We can be **creators** as well as consumers of **content.**

Digital Publishing Projects

The illustration features a stylized, high-contrast profile of a woman's face on the left, looking towards the right. On the right, there is a large, stylized open book. A yellow arrow points from the book towards the woman's face. The background is dark with a pattern of white dots at the bottom.

www.edteck.com/publish

The screenshot shows the website 'www.edteck.com/publish'. The main heading is 'READ Think Write Publish!' with 'Think' in a colorful, stylized font. Below the heading, there is a paragraph of text explaining the power of publishing and literacy in the 21st century. At the bottom, there are two sections: 'Publishing Workshops by Patricia Martin, Suzanne Meyer and Peter Pappas' and 'The Power of Publishing: Academic Success for Struggling Readers and Writers'.

Learning strategies are tools.

Publishing is a chance to "build" something with them.

**Defining
 Summarizing
 Comparing**

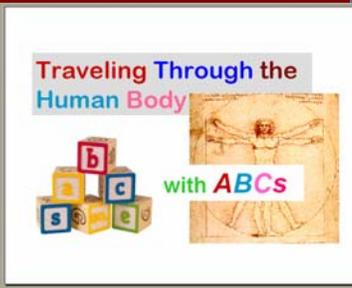
The image shows a close-up of a hammer striking a nail. The hammer is blue and silver, and the nail is being driven into a wooden surface. The background is a gradient of blue and purple.

Rigor, Relevance and Reflection by Peter Pappas
 Strategies for Student Success ~ Oregon Department of Education Workshop

Publishing puts the reading standards to work!

1. Direct, explicit comprehension instruction	X
2. Effective instructional principles embedded in content	X
3. Motivation and self-directed learning	X
4. Text-based collaborative learning	X
5. Strategic tutoring	
6. Diverse texts of varying difficulty levels, topics, styles	X
7. Intensive, integrated writing as a vehicle for learning	X
8. A technology component	X

ABC Book Sample project



Traveling Through the Human Body with ABCs

- Written by 6th grade science students working in teams
- Students asked to create their own comparisons
- Softcover books were published
- The student then read their books to 3rd grade students

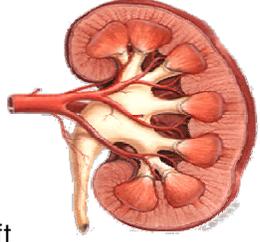
Research shows student use of comparison skills results in a 45 - percentile gain in student performance.
Classroom Instruction that Works, ASCD, 2001

Case 1:
 Teacher lectures on body systems

Case 2:
 Teacher models and then students design a comparison.

+ 45% gain in content mastery

K is for **Kidney** By~ Holly and Sarina



The kidneys separate waste from blood and turn it into urine. Most people have both a left and a right kidney.

Kidney By~Holly and Sarina

The kidneys can relate to a pool filter because both of them separate the bad things from the good things. The pool filter empties the bugs and leaves from the water and the kidneys, they get rid of the bad things in your blood and turn it into liquid waste.



Pool filter




E is for egg cell

F is for femur

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A chance for students to reflect



Traveling Through the Human Body
 with ABCs

Publishing and the power of reflection

1. What did you think when we got started?
2. Describe the steps you followed?
3. What do you find out about yourself and how you learn?



What process did you use to complete the project?

We researched our organ first. While doing this, we took notes. We then used these notes to write a rough draft, revised it and typed our power point. We did all this together.



We organized and decided who was going to do what and how. Then we read everything over to see if everything made sense to our audience.

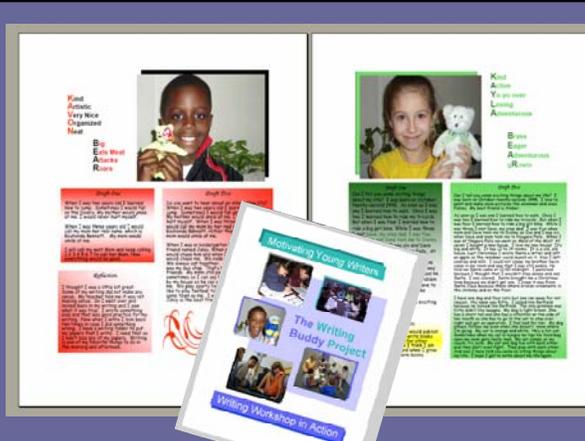
Not an add-on, a chance for kids to master content and record their thinking

- Based on 6th grade science standards
- Use powerful literacy strategy – creating comparisons
- Technology a tool not the goal
- A chance to work in teams to create for an authentic audience.

Publish at any grade level or content area

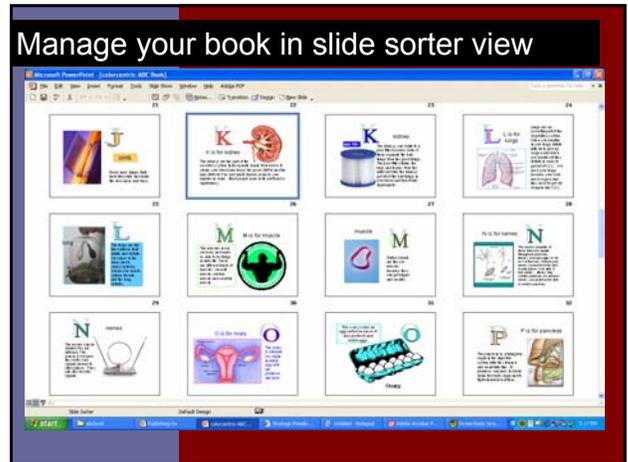
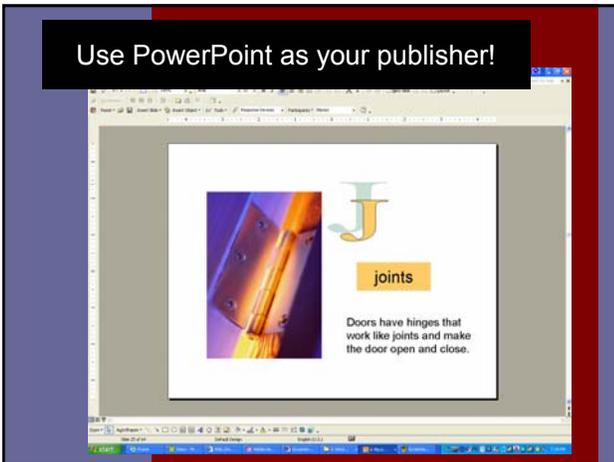
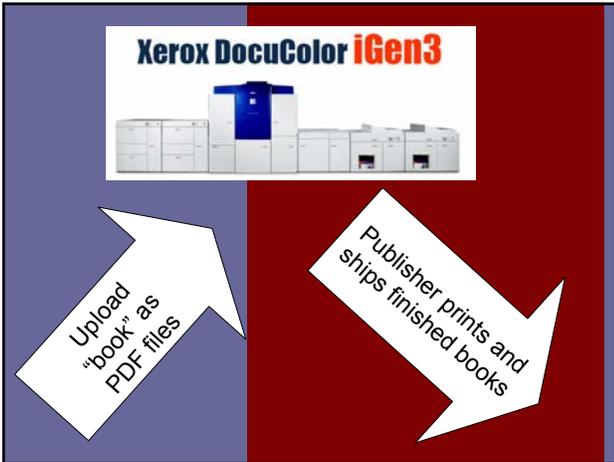
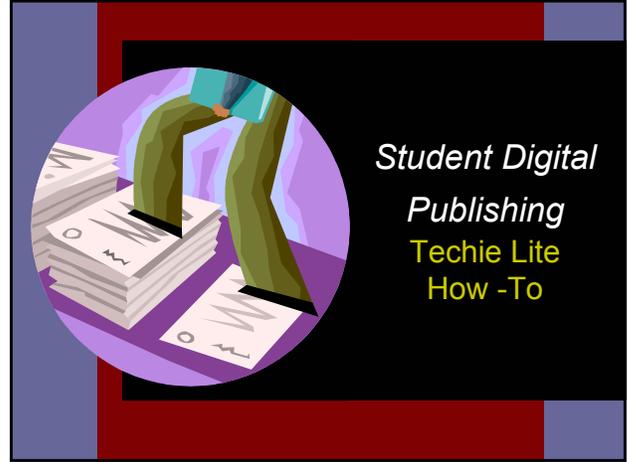
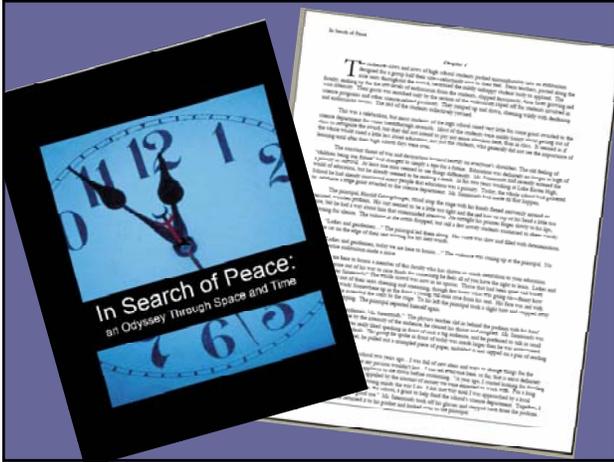


The bus ride home was great and fun. When we got home, she had to go to the store so her mom only went and the rest of her family got to stay in the car with their daddy.

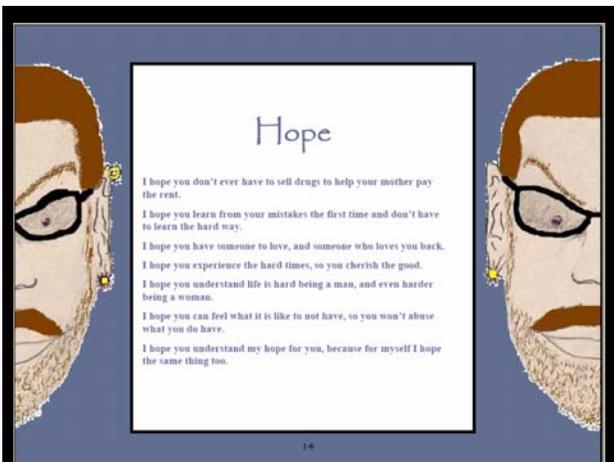
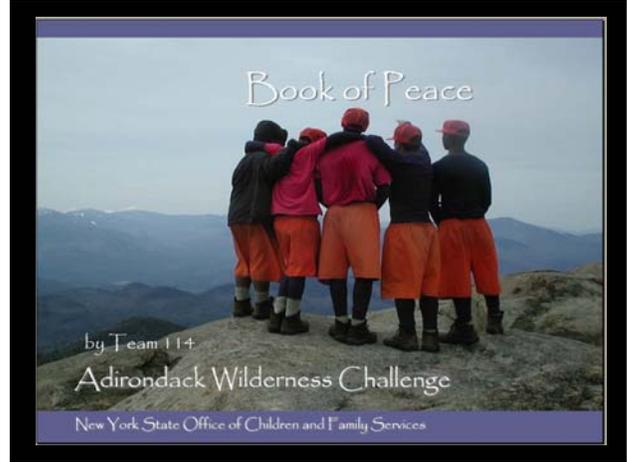
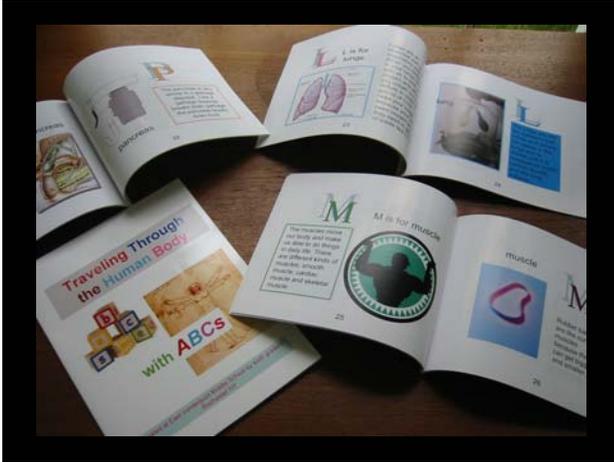


Motivating Young Writers
 The Writing Buddy Project
 Writing Workshop in Action

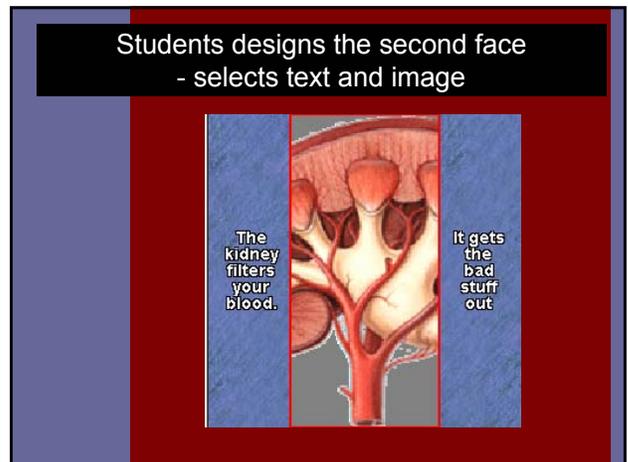
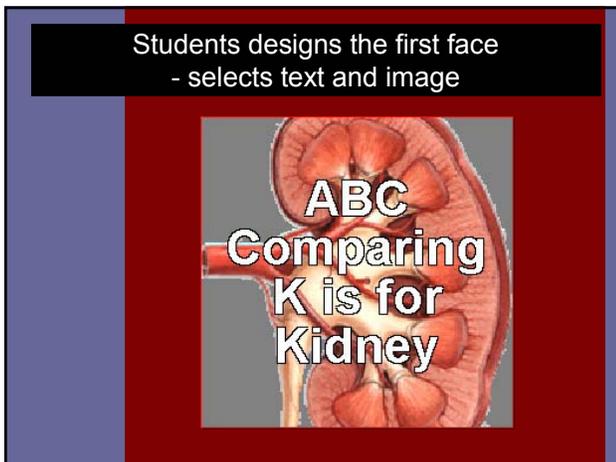
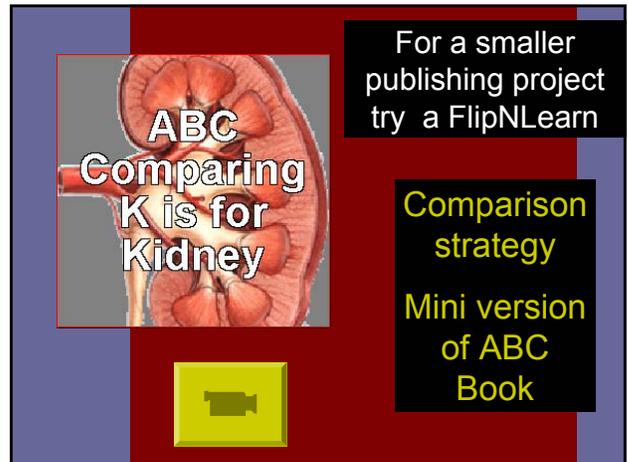
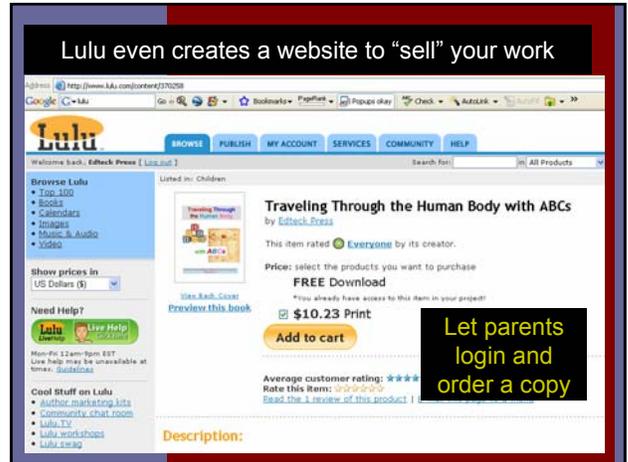
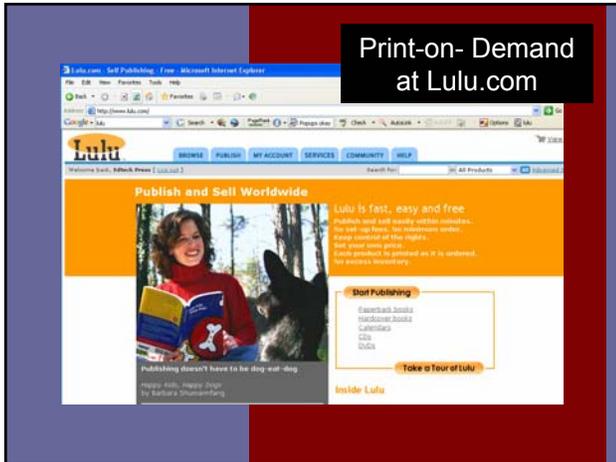
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 Strategies for Student Success ~ Oregon Department of Education Workshop

Students designs the third face
 - selects text and image

Students designs the final face
 - selects text and image

Then
 print and
 share

I remember what the kidney does for my body, by thinking of a pool filter. They are both filters - one for your blood, the other for your pool. I'm using a comparison strategy to learn and remember.

Students pick text / images and layout for each face.

Edit Text

Enter the Multiline Text:

Dots of color are the strongest visual element in this painting.

Student adds text

Student can crop images

Student makes design decisions to communicate a message to their audience

Rigor, Relevance and Reflection by Peter Pappas Strategies for Student Success ~ Oregon Department of Education Workshop

• **Design** - students make design decisions
 • **Print** - easily create and print in one class session
 • **Share** - Students have a creative product to share

Download free software – order paper
www.flipnlearn.com

Design, Print, Share & Learn!
 Students in grade 3 through high school can easily design and print their own FlipNLearn.

- Engage and motivate students
- Create tangible proof of learning
- Foster teamwork and discussion
- Promote self-assessment and reflection
- Share with friends and family

Download samples based on learning strategies –defining, summarizing and comparing

View samples using:
 Defining strategies
 Summarizing strategies
 Comparison strategies

Sample FlipNLearn Using Defining Strategies

Word Derivations - students explore root words and make their own connections to vocabulary. Use derivative words in a sentence of their own design that expresses connection to root word.

Root Words: Durable in Latin, means "to last."

Publishing ~ Quadrant D
 Student and teacher reflection
 Writing for authentic audience and purpose

Student's who publish a book or FlipNLearn have answered the question:
 "Why do we have to learn this?"

Publishing > Innovation > Reflection

Evaluation: appraise, defend, predict

Synthesis: compose, design, develop

Analysis: compare, contrast, categorize

----- Basic Skills -----

Application: demonstrate, illustrate, solve

Comprehension: describe, explain

Knowledge: memorize, name, recognize, recall



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Blog Question 2: What is literacy in the 21st Century?

What is literacy in the 21st century?

"American teenagers can engage media material and create their own content in ways their parents could not. Today's online teens live in a world filled with self-authored, customized, and on-demand content, much of which is easily replicated, manipulated, and redistributable. The internet and digital publishing technologies have given them the tools to create, remix, and share content on a scale that had previously only been accessible to the professional gatekeepers of broadcast, print, and recorded media outlets." Pew Internet & American Life Project [Download Report](#) (253 kb) pdf

The new information technologies have unleashed individual and collective creativity. We are now both the audience and the show. Digital technologies have created exciting new opportunities for interaction with people and information in ways that can revitalize teaching and learning.

1. What is literacy in the 21st century?
2. What implications does 21st century literacy have for teaching and learning?

Posted at 04:49 PM in [21st Century Literacy](#) | [Permalink](#) | [Comments \(0\)](#)

Extended application (EA) is the application of knowledge and skills in the context of the student's personal and career interests and post-high school goals. Students use knowledge and skills to solve problems, create products, and make presentations in new and complex situations.

Literacy in the 21st century will mean the ability to find information, decode it, critically evaluate it, organize it into personal digital libraries and find meaningful ways to share it with others. *David Warlick*



How does the digital era influence students?

1. You **can't broadcast** at students.
2. Students won't be a **passive audience.**
3. Students expect **control** and **functionality.**



Will students be motivated for collection of evidence?

They already assemble, catalogue, and share the information that's important to them



They collect and showcase their work on MySpace



myspace.com a place for friends

Double Entendre



"Ashlee Haze: Poet. Person. Princess."

Female
17 years old
Lyricsville,
GEORGIA
United States

Last Login:
7/17/2006

View My: Pics | Videos

myspace.com a place for friends

Photographers

- MySpace members are participants.
- It gives people a forum and tools to express themselves and create a map of their lives.

Photographer Ent



"Enttany"
Female
19 years old
GASTONIA,
North Carolina
United States

Last Login:
7/18/2006

View My: Pics | Videos

Schools shouldn't try to compete with MySpace.

But we can provide student with guidance and tools to manage their EA

The copy / paste culture creates a **bottom-up takeover of the information flow.**

We can be **creators** as well as consumers of **content.**

What skills will the 21st century workplace require?

Literacy / numeracy

Self-discipline

Creativity

Adaptability – they must be independent learners



Higher and lower order reflection

<i>Evaluation</i>	I describe patterns, create my own connections, and assess my progress
<i>Synthesis</i>	
<i>Analysis</i>	

<i>Application</i>	I narrate what happened
<i>Comprehension</i>	
<i>Knowledge</i>	

Goal – students who can function in an academic or real-world setting that is unpredictable and vital

Learn to research, think, problem-solve and write like a **scientist, engineer, coach, artist, historian, mathematician, writer, musician,**

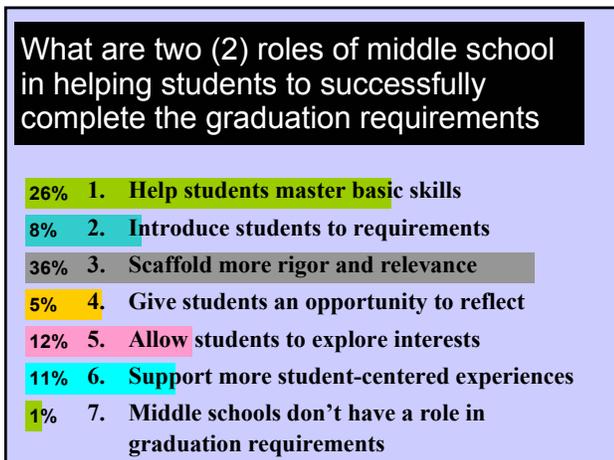
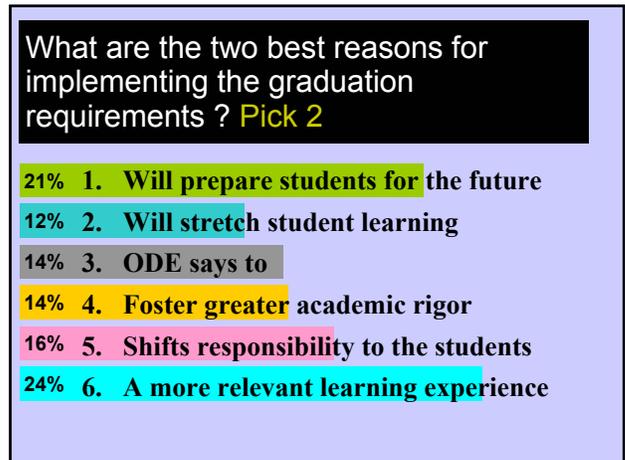
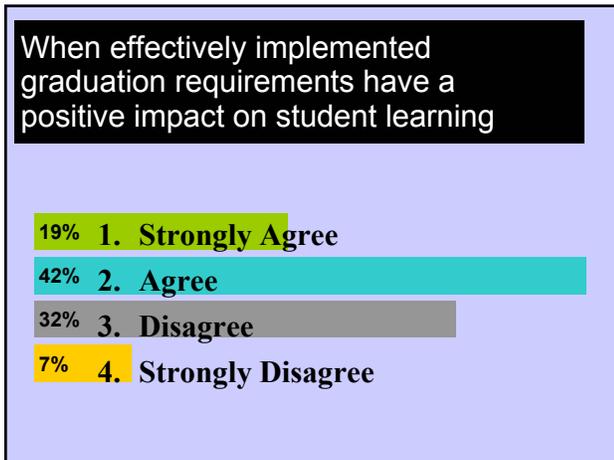
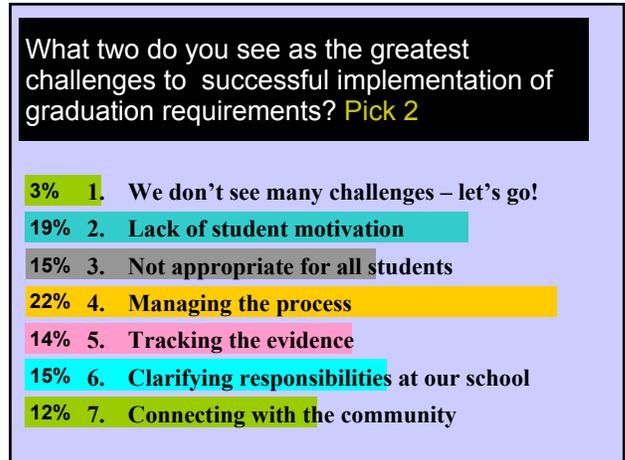
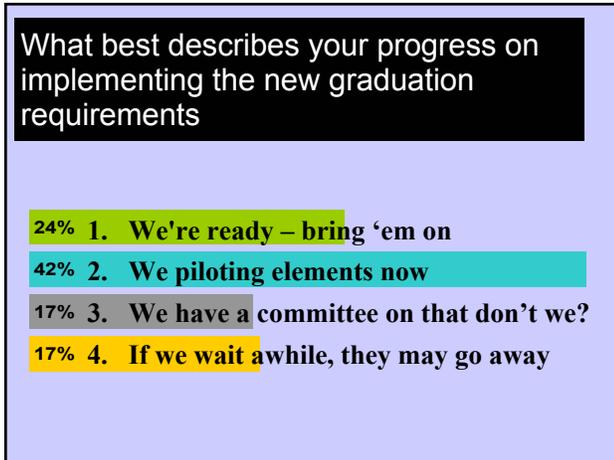
Extended application (EA) is the application of knowledge and skills in the **context of the student's personal and career interests** and post-high school goals.

Students use knowledge and skills to solve problems, create products, and make presentations in new and complex situations.

What are the two most challenging for you to implement? **Pick 2**

- 13% 1. Education plan and profile
- 17% 2. Career Related Learning Standards
- 34% 3. Career Related Learning Experiences
- 36% 4. Extended Applications

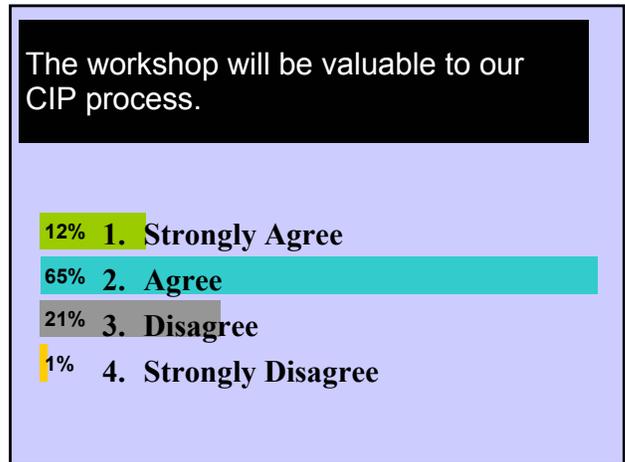
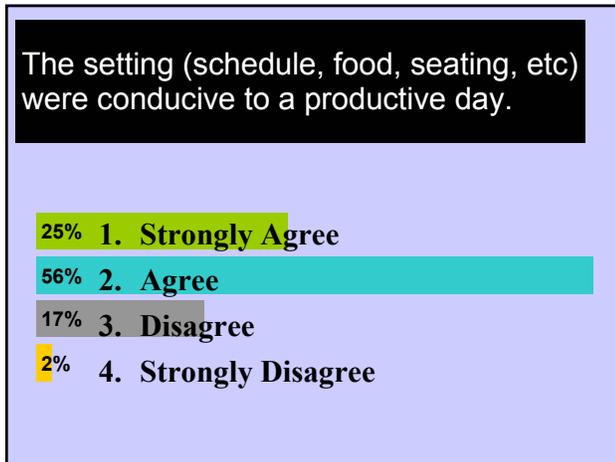
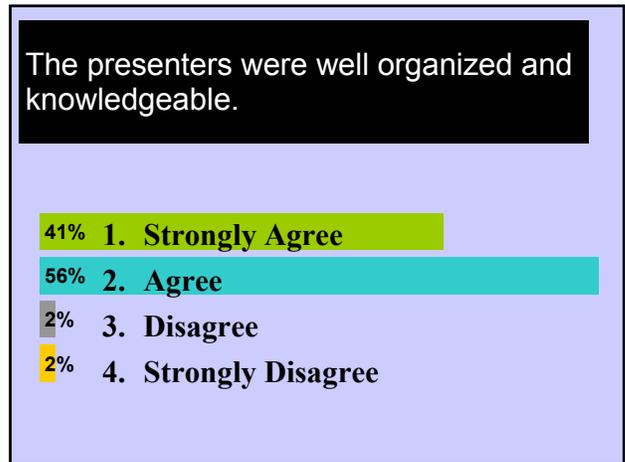
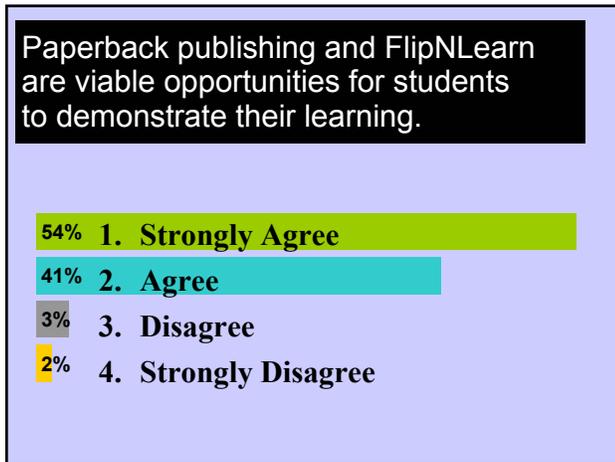
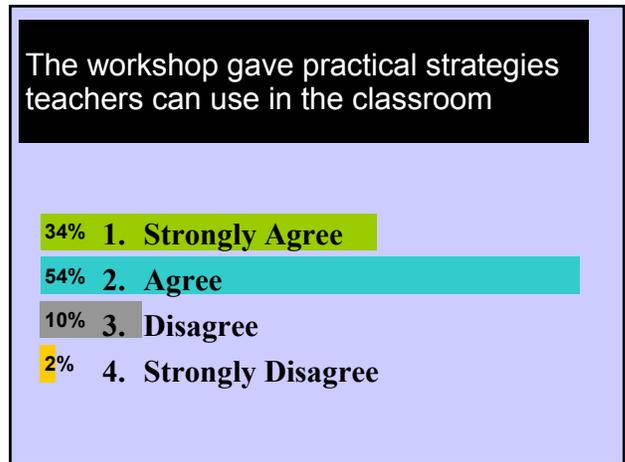
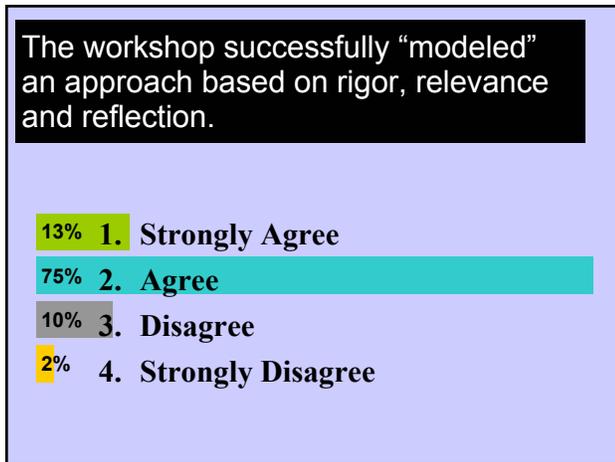
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Time for you to do some reflection and evaluation about the workshop.

Use the blog for narrative responses and suggestions

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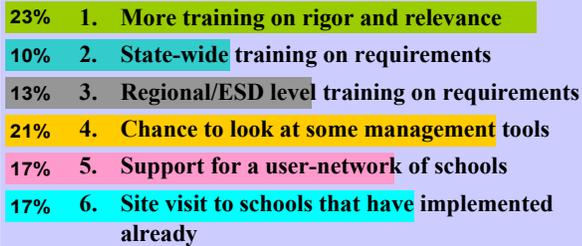
The audience response system fostered discussion and engagement.



The blog was a valuable part of the workshop.



What two next steps would you like to see to support successful implements of graduation requirements? **Pick 2**



Team time.

Don't forget to use the blog for responses and suggestions.

We'll move around for Q and A