


El Monte UHSD AVID Path Training

Making the connection
"Classroom Instruction that Works"
by R. Marzano

Presented by LACOE/AVID

OBJECTIVES OF Training

- To **SHARE** research-based strategies that have a **BIG** effect on student achievement
- To **INCREASE** a teacher's **TOOL KIT** of **EFFECTIVE** instructional strategies for **EXPLICIT INSTRUCTION**.
- To **CORRELATE** these strategies to instructional strategies used in the **AVID** elective
- To **PRACTICE** the more effective strategies.
- To **MAKE CONNECTIONS** to grade level and content lessons.

<p>WRITING</p> <ul style="list-style-type: none">▲ Prewrite; DraftRespond; ReviseEdit; Final Draft▲ Class & Textbook▲ Cornell Note-taking▲ Learning Logs & Journals		<p>INQUIRY</p> <ul style="list-style-type: none">▲ Skilled Questioning▲ Socratic Seminars▲ Quickwrite/Discussion▲ Critical Thinking Activities▲ Writing Questions▲ Open-Minded Activities
<p>READING</p> <ul style="list-style-type: none">▲ PQ5R (Survey, Question, Read, Recite, Review)▲ KWL▲ SUMMARY (GIST)▲ H5W▲ Reciprocal teaching▲ "Think-alouds"		<p>COLLABORATION</p> <ul style="list-style-type: none">▲ Group Projects▲ Study Groups▲ Jigsaw Activities▲ Read-Arounds▲ Response/Edit/Revision Groups▲ Collaborative Activities

Effective Instruction by Meta-Analysis

Classroom Instruction That Works (2001, ASCD)
Marzano, Pickering, & Pollock

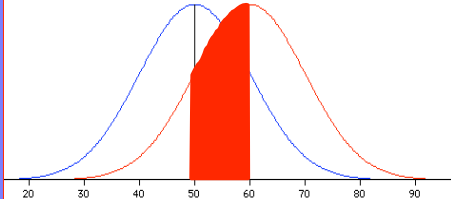
- This meta-analysis examines average effect of 1251 experimental studies
- Focuses on instructional strategies w/ high probability of success for all pupils, K-12 in all subjects
- Expresses results as effect size

Rank the following instructional strategies from: Most effective (1) to less effective (9).

- | | |
|---|---|
| • Summarizing and Note-taking | • Cooperative (collaborative learning) |
| • Generating and testing hypothesis | • Setting objectives and providing feedback |
| • Identifying similarities and differences | • Questions, cues, and advance organizers |
| • Reinforcing efforts and providing recognition | • Homework and practice |
| | • Nonlinguistic Representations |

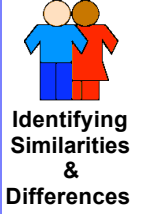
What is Effect Size?

Effect Size of 1 = 34 Percentile Point Gain



Effect Size Represents Increased or Decreased Achievement of Experimental Group in Standard Deviation Units

Identifying Similarities & Differences



- Effect Size 1.61
- Identifying similarities & differences:
 - enhances understanding and ability to use knowledge
 - includes comparison, classification, metaphors, & analogies
 - increases in positive effect when graphically represented

Summarizing & Note Taking



- Effect Size 1.00
- Effective note taking means:
 - deleting, substituting, & keeping some information
 - learning to analyze
 - becoming aware of information structures

Reinforcing Effort & Providing Recognition



- Effect Size .80
- Rewards:
 - do not necessarily decrease intrinsic motivation
 - most effective when used to attain standards of performance
 - abstract or symbolic more effective than tangible

Homework & Practice



**Homework
& Practice**

- Effect Size .77
- Homework should:
 - differ with grade level
 - keep parent involvement to minimum
 - identify & articulate purpose
 - be commented on, if assigned

Non-Linguistic Representation



**Nonlinguistic
Representations**

- Effect Size .75
- Non-Linguistic Representations:
- generated in lots of ways, including drawings, physical models, mental pictures, pictographs, kinesthetic activity
 - elaborate on knowledge

Cooperative (Collaborative) Learning



Cooperative Learning

- Effect Size .73
- Cooperative Learning works better when:
 - ability groups used sparingly
 - groups kept small
 - used consistently & systematically, but not excessively

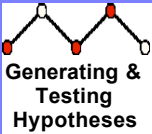
Setting Objectives & Providing Feedback



Setting Objectives & Providing Feedback

- Effect Size .61
- Effective Instructional Goals:
 - narrow what students focus on, but are not overly constrictive
 - invite students to personalize the teacher's goals

Generating & Testing Hypotheses



Generating & Testing Hypotheses

- Effect Size .61
- Hypotheses Formation/Testing:
 - may be approached inductively or deductively
 - ask students to explain clearly both hypotheses & conclusions

Questions, Cues, & Advanced Organizers



Questions, Cues, & Advanced Organizers

- Effect Size .59
- Questions/Cues work well when:
 - focused on what's important
 - asking for analysis, rather than recall or recognition alone
 - used with adequate wait time
 - given before a learning experience

Note Taking



Cornell Note Taking

- Requires Students to stay alert
- Helps students to stay engaged in class lectures and readings
- Provides a resource for making active contributions to collaborative groups

Marzano's Reminders for Note Taking

- Verbatim note taking is, perhaps, the least effective way to take notes.
- Notes should be considered a work in progress.
- Notes should be used as study guides for tests.
- The more notes that are taken, the better.

Marzano's Reminders for Summarizing

- To effectively summarize, students must delete some information, substitute some information, and keep some information.
- To effectively delete, substitute, and keep information, students must analyze the information at a fairly deep level.
- Being aware of the explicit structure of information is an aid to summarizing information.
- Require students to distill information into a synthesized form.

Cornell Note Taking STAR Strategy

Name, Class, Period, Date	
Set up Paper	
Take notes	
After Class	
Review Notes	
Summary	



CORNELL NOTES

Apply your own thinking to the notes.

- Alone or with a Study Buddy
- **Study your notes**, clarifying and completing them.
- Within **24 hrs** use the left-hand column to:
- **IDENTIFY** the **MAIN IDEAS**
- **DEVELOP QUESTIONS**
- **CONNECT YOUR NOTES** to what you've learned before in class.



CORNELL NOTES

REFLECT and **REVIEW**

- Before a test or quiz, alone or with a study buddy.
- **REVIEW** the main points.
- **SUMMARIZE** what's important.
- **SUGGEST** how you will use this information.
- **ASSESS** your learning.

**Aligned Acts of
Improvement Efforts
CONTENT TEACHERS**

- What specific strategies can be implemented by the teachers in your content area?
- What systems are in place at your site to monitor teachers' implementation of instructional strategies and students' learning?
- What are the future trainings needed?

SCHOOLWIDE STRATEGIES



**WRITE PATH
Training SERIES**

- English Language Development
- English Language Arts
- Mathematics
- Science
- History-Social Sciences
