Giving Students Their Word’s Worth

In Three Parts
- What we know about vocabulary and vocabulary acquisition
- Principles of effective instruction
- Instructional strategies

What We Know
- Students from economically disadvantaged backgrounds enter school knowing fewer words (Stanovich, 1986).
- Schooling doesn’t narrow the achievement gap; students who enter kindergarten with limited vocabulary typically lose ground each year they are in school (Chall, et al. 1990).

What We Know
- The average 3rd grader knows 10,000 words.
- The average 8th grader knows 25,000 words.
- The average high school graduate knows 50,000 words.
- Do they learn 40,000 words in 9 years via direct instruction? No way!

What We Know
- Everyday speech uses only 5,000-7,000 words (Klein, 1988).

What We Know
- 95% of the texts we read consist of about 5,1000 words (Adams 1990).
- BUT the less common words carry most of the text content and are crucial for understanding that content, particularly in content area courses.
What We Know

- Vocabulary knowledge is closely related to reading comprehension and academic achievement (Chall, Jacobs, & Baldwin, 1990; Graves 2000).
- Limited vocabulary is a major factor in the achievement gap (Biemiller, 1999, 2004; Chall, Jacobs, & Baldwin, 1990; Hart & Risley, 1995).

Vocabulary and Academic Language

- "So much of what we do outside of narrative is tied to vocabulary—a water table is different from a math table is different from tabling a motion.”
  - D. Alvermann

Vocabulary Used in Social Studies

<table>
<thead>
<tr>
<th>Type of Words</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Content words pertaining to social studies (concept words)</td>
<td>legend, city-state, democracy, golden age, empire, republic, balance of power</td>
</tr>
<tr>
<td>Everyday vocabulary with special meanings in social studies</td>
<td>ancient, concept, culture, decline, rivalry, ruler, territory, estates</td>
</tr>
<tr>
<td>Difficult expressions for ELLs</td>
<td>led to, in order to, touched off, dug in for; prepositions; and words that express logical relationships.</td>
</tr>
</tbody>
</table>

Vocabulary Used in Science

<table>
<thead>
<tr>
<th>Type of Words</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Content words pertaining to science (concept words)</td>
<td>amphibian, abyssal plain, bacteria, invertebrate, asteroid belt, solar system,</td>
</tr>
<tr>
<td>Everyday vocabulary with special meanings in science</td>
<td>organ, tissue, adaptation, response, fruit, fertilize, seed, mimic</td>
</tr>
<tr>
<td>Difficult expressions for ELLs</td>
<td>in steps, draw conclusions, molecules make a sandwich</td>
</tr>
</tbody>
</table>

Vocabulary Used in Mathematics

<table>
<thead>
<tr>
<th>Type of Words</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Content words pertaining to mathematics (concept words)</td>
<td>monomial, denominator, quadratic, coefficient, polygon, equation,</td>
</tr>
<tr>
<td>Everyday vocabulary with special meanings in mathematics</td>
<td>square, power, odd, even, equality, root, slope, plot, table</td>
</tr>
<tr>
<td>Difficult expressions for ELLs</td>
<td>sum/some, whole/hole, fourths/fours, divided into vs. divided by</td>
</tr>
</tbody>
</table>
In English classes, we think about vocabulary ALL the time...but we don’t always think about the academic vocabulary in our discipline.

None of the following examples came from the literature. ALL came from introductory material in the first 30 pages of the textbook!

**Vocabulary Used in English/LA**

<table>
<thead>
<tr>
<th>Type of Words</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Content words pertaining to English/Language Arts (concept words)</td>
<td>narrative, plot, climax, exposition, foreshadowing, flashbacks, flash-forward, denouement, main idea</td>
</tr>
<tr>
<td>Everyday vocabulary with special meanings in English/Language Arts</td>
<td>sequence, story, character, conflict, complications, resolved, suspense, resolution, main idea</td>
</tr>
<tr>
<td>Difficult expressions for ELLs</td>
<td>story hangs together, hook you, draw you into...chain of events, the above steps, balancing work and family, plant hints, gets her an invitation, there is a catch</td>
</tr>
</tbody>
</table>

**What We Know**

Knowing a word CANNOT be equated with knowing a definition.

Knowing a word means being able to do things with it: to recognize it in connected speech or in print, to access its meaning, to pronounce it, and to be able to do these things within a fraction of a second.

(Stahl and Fairbanks, 1986)

**What We Know**

ACADEMIC LANGUAGE ACQUISITION is central to school success.

Teaching academic terms in a consistently effective way to all students is one of the strongest actions a teacher can take to ensure that students have the academic background they need to understand the content they encounter in school (Marzano).

**What We Know**

Academic language acquisition requires EXPLICIT instruction.

**What We Know**

Vocabulary Knowledge

- Topic Knowledge
  - Reading Comprehension
Effective Vocabulary Instruction

The old way:
- Explicit instruction of necessary words
- Memorization of word lists

**BUT...**
- Isolated instruction of individual words is ineffective.

Principles of Effective Instruction

- Effective teachers use a battery of approaches to foster learning.
- Learning vocabulary entails elaboration and discussion of word meaning and opportunities to use the words.
  - Beck and McKeown, 1991;

That is to say...

- Students have to USE new language in order to learn it.
  - Word games
  - Puzzles
  - Reading
  - Writing
  - Conversation
  - Awareness of environmental print

Principles of Effective Instruction: Choose Words Wisely

- Concept words=words for big ideas (e.g. utopia, biodiversity, republic, novel)
  - ACADEMIC VOCABULARY = concept words
- Labels=words for details and specifics (e.g. tunic, supper)

Four Components of Effective Vocabulary Programs

- Fostering word consciousness.
- Teaching word-learning strategies.
- Teaching individual words.
- Wide reading.
  - Proficient readers read 3 times as many words per week as less proficient students.
  - Add 25 minutes of reading per day = students learn an extra 1,000 words per year.

Principles of Effective Vocabulary Instruction

- Different types of words require different types of instruction.
- Students should discuss the terms they are learning.
- Vocabulary acquisition is an ACTIVE process.
Six Steps to Effective Vocabulary Instruction

1. The teacher provides a description, explanation, or example of the new term.
2. Students restate the explanation of the new term in their own words.
3. Students create a nonlinguistic representation of the term.
4. Students do activities that help them add to their knowledge of vocabulary terms.
5. Students are asked to discuss the terms with one another.
6. Students are involved in games that allow them to play with the terms.

Instructional Strategies

- Foster Word Consciousness
  - Word Walls
  - Word Games
  - Vocabulary Visuals
  - Vocabulary Stories
- Teach Structural Word Analysis
- Teach TYPES of Context Clues
- Graphic Organizers

Instructional Strategy: Word Walls

- DO the wall: develop regular instruction around particular sets of words.
- Develop word games using the wall.
- Once words are taught, it is most effective if the words remain in the same location.
- Word Walls should develop organically as students encounter or need to learn particular vocabulary.
Instructional Strategy: Word Play

Students should **play** with words.

Instructional Strategy: Word Games

Crossword Puzzles


Vocabulary Hot Potato

- The teacher tosses a word ring to a student who has to define the top word and use it in a sentence before tossing the ring to a classmate.

Instructional Strategy: Vocabulary Visuals

- Effective vocabulary instruction does NOT rely on definitions.
- Students must represent their knowledge of words in linguistic and non-linguistic ways.
Instructional Strategy: Vocabulary Visuals

Instructional Strategy: Vocabulary Visuals

Instructional Strategy: Vocabulary Competitions

Vocabulary Treasure Hunt

Instructional Strategy: Develop Structural Word Analysis

Teach root words and affixes.

- Root words are morphemes (units of meaning)
- Begin with free morphemes like port because their meaning is accessible.
- Move to extensions (porter, airport, import).

Instructional Strategy: Develop Structural Word Analysis

Understanding the morphological basis of affixes is critical to word knowledge.

- Re-, dis-, un-, and im- account for over half of all words with prefixes
- -s/-es, -ed, and -ing account for 65% of all words with suffixes (Cunningham 2002)
Teach Students HOW to Guess Word Meaning from Context

The following examples are from Reader's Choice Baudoin, et al., 1977, 1988 University of Michigan

Instructions Strategy: Teach TYPES of Context Clues

CAUSE AND EFFECT
Look for cue words (because, so) then make a guess.

Because we lingered too long at the restaurant, we missed the beginning of the movie.

The door was ajar, so the dog got out of the house.

Instructional Strategy: Teach TYPES of Context Clues

OPPOSITE/CONTRAST
Underline the two words or phrases in contrast to one another, then make a guess.

Even though I studied for hours, I flunked the test.

My last apartment was really small, but my new one is quite spacious.

Instructional Strategy: Teach TYPES of Context Clues

SYNONYMS OR PARAPHRASES (found elsewhere in the sentence or paragraph)

Samuel was deaf, but he didn't let his handicap get in the way of his success.

Sally's flower garden included dozens of marigolds, which she tended with great care.

Instructional Strategy: Teach TYPES of Context Clues

EXAMPLES IN THE TEXT

The baboon, like other apes, is a very social animal.

Instructional Strategy: Teach TYPES of Context Clues

RECOGNIZING DEFINITIONS
(common in college textbooks, newspaper & magazine articles)

Many children of normal intelligence have great difficulty learning how to read, write, or work with numbers. Often thought of as "underachievers," such children are said to have a learning disability, a disorder that interferes in some way with school achievement.
Effective vocabulary instruction involves the gradual shaping of word meanings through multiple exposures.

**Vocabulary Self-Awareness Chart**

Focus instruction on terms that have a high probability of enhancing academic success.

- INEVITABLY
- MAINSTREAM
- GLOBAL WARMING
- ADVOCATE

Focus instruction on terms that have a high probability of enhancing academic success.

- DECISIVE
- COMPLEXITIES
- ULTIMATELY

Focus instruction on terms that have a high probability of enhancing academic success.

SCRUTINY
Instructional Strategy: Use SAT Word Lists

- http://www.soundkeepers.com/SAT/

Instructional Strategy: Use Specialized Word Lists

For Example: “Said” is Dead

<table>
<thead>
<tr>
<th>added</th>
<th>demanded</th>
<th>objected</th>
</tr>
</thead>
<tbody>
<tr>
<td>advised</td>
<td>droned</td>
<td>protested</td>
</tr>
<tr>
<td>allowed</td>
<td>gasped</td>
<td>quipped</td>
</tr>
<tr>
<td>barked</td>
<td>howled</td>
<td>reported</td>
</tr>
<tr>
<td>babbled</td>
<td>interjected</td>
<td>scolded</td>
</tr>
<tr>
<td>begged</td>
<td>jeered</td>
<td>stuttered</td>
</tr>
<tr>
<td>cajoled</td>
<td>moaned</td>
<td>wailed</td>
</tr>
<tr>
<td>complained</td>
<td>mumbled</td>
<td>whimpered</td>
</tr>
</tbody>
</table>

Instructional Strategy: Multiple Meanings

Don’t neglect “simple” words.

Instructional Strategy: Multiple Meaning Words

- “RUN” has 69 meanings as defined by New Webster’s Dictionary of the English Language
- These small words often interfere with reading comprehension
- ESL students rely more heavily on direct instruction than do native speakers.

Instructional Strategy: Multiple Meaning Words

- Analyze words like hand, table, bill, change and book as multiple-meaning words.

- Challenge students to bring in ten other multiple-meaning words and present a lesson to the class on how the words can be used in a variety of contexts.

Instructional Strategy: Teach Shades of Meaning

- Attach a paint chip card to notebook paper in order to illustrate a string of synonyms.
- Definitions are written to the right of the paint chip card on which the word has been written.
Example

Remember:

"The difference between the right word and the almost right word is the difference between lightning and the lightning bug!"  
--Mark Twain  
1890

Resources

- Richard Lederer Crazy English
- www.wordsmith.org
- http://www.ohiou.edu/esl/teacher/vocabulary.html
- Google: “teaching vocabulary”

Vocabulary Game Resources

- http://www.mansioningles.com/profesores06.htm
- http://www.mansioningles.com/profesores08.htm

REMEMBER what you want to accomplish!