This booklet is designed to help people improve their vocabulary. Four principles of vocabulary development are outlined: language development and vocabulary development are closely related; language development is concept development; vocabulary development is an ongoing process; and vocabulary is the basis for most tests of I.Q. The author argues that vocabulary development takes place in the context of the communication triad: reading and writing, speaking and listening, and visualizing and observing. These language development skills concern all teaching and learning. Such topics are discussed as the utilization of words for communicating, sharing ideas, conceptualizing, comparing, contrasting, classifying, reading, writing, and metaphorizing. Also discussed are learning techniques; learning roots, prefixes, and suffixes; pronunciation and spelling; mispronunciation; riddles; and slang. (TS)
THE WORD GAME: IMPROVING COMMUNICATIONS

Fastback 60

by Edgar Dale

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Introduction

I have asked hundreds of students and teachers whether they want to increase their vocabularies. Most do. Further, many think that with a systematic plan for word study they could increase their vocabulary by at least 5 percent. Some say by 10 percent.

We don’t now have such a systematic program in our schools and colleges. Why not? Partly because students have been turned off by the typical method: Look up these fifteen words in your dictionary and write a sentence with each. In one study students checked this approach to vocabulary study as one of the most disliked activities in the study of high school English.

We don’t have a systematic program of general vocabulary instruction because we assume that words will be learned incidentally. And they are. But the incidental method often becomes an accidental method, as it has in the teaching of spelling.

Further, teachers have not sensed the possibilities for better reading through improved vocabulary. Indeed, many studies have shown that vocabulary is the key factor in determining reading levels. To get meaning out of the printed page you must put meaning into the printed page. Just pronouncing the words isn’t reading. Years ago psychologist Lewis Terman pointed out that the correlation between I.Q. and vocabulary level was around .80.

How many words are known by the average eighth-grader, high school graduate, and the graduate of a college?

The average eighth-grader knows at least 15,000 words, the average high school graduate about 20,000, and the average college graduate not fewer than 35,000. But even college graduates
have trouble with such words as adumbrate, attenuate, avuncular, deprecate, egregious, germane, ingenuous, jejune, plethora, serendipity, synergy, symbiosis, temerity, unconscionable, unctuous. An able reader increases his vocabulary well beyond the college graduate's 35,000 words. But size of vocabulary depends on how you define a word and what it means to know it.

The difficulty in determining the size of one's vocabulary is shown by the fact that the word make has about 100 definitions in the Shorter Oxford English Dictionary. The more common the word, the more likely it will have multiple meanings. One simple way to check on the size of vocabulary is to note the unknown words in a dictionary or a list.

Principles of Vocabulary Development

Let me first state some principles about learning words:

First, language development and vocabulary development are parts of the same fabric. All vocabulary development is language development. Language includes syntax, the way words are arranged in a sentence—sentence structure.

Second, language development is concept development. Every word is a concept but many concepts include related concepts. Think of the huge variety of animals classified under the concept animal.

Third, vocabulary development is an ongoing process. Hence the need for a concentrated, systematic effort to improve the way we learn words. A systematic program of vocabulary development from grade one through college is one of the best ways to increase reading ability.

Fourth, vocabulary is the basis for most tests of I.Q. The best readers have the best vocabularies. Our vocabulary is an index of our lives. It tells where we have been, what we have done, and how we think about these experiences.

When teachers organize and plan a vocabulary development program, they will change their own lives and those of their students. They will read more, and differently; put their concepts into better order; and discover new and different arrangements.

The Communication Triad

Vocabulary development takes place in the context of the com-
munication triad: reading and writing, speaking and listening, and visualizing and observing. These are the language development skills that concern all teaching and learning.

Children come to school with a vocabulary of 3,000 words and more which they learned without reading and without formal training. In an interview study of the vocabularies of inner-city children, we found that three-fourths of them had a vocabulary of 1,500 words by the middle of their first school year. We noted that most of these words are sensed, are necessary to speak most sentences, and are in the everyday vocabulary of most people. They have been experienced, hence internalized, and will never be forgotten. They are at the lower end of the concrete/abstract scale.

How did these children learn these words? They heard them from their parents, their playmates, on television and radio, at stores. They experienced them, they ate things, they touched things, smelled things, drank things. Their vocabulary was circumscribed only by their experiences and their available models.

If these children had grown up in richer neighborhoods, if their parents had been able to provide richer experiences for them such as trips, vacations to different settings, exhibits, concerts, their vocabularies would have been larger and more varied. Hence remedial experiencing becomes an important part of their learning. Even when they can pronounce words, the sounds they hear may not be meaningful. Blind Milton’s daughters read Greek to their father but they did not understand what they were reading. To read is to communicate, to share the ideas of an author.

Let us examine the communication triad that accompanies language development—speaking and listening, visualizing and observing, writing and reading. When we speak and listen we interact, exchange ideas and feelings, share as equals. Each person in a dialog or discussion is both creator and interpreter. There is feedback, so important in effective communication.

A second major way to communicate is by visualizing and observing. The visualizing may be through film, television, drama, simulation, exhibits, models, paintings, drawings, photographs, and maps. The observing may range from intense firsthand experiencing by a one-year-old to the subtle symbolic analysis of a
sophisticated observer. A professional sees what the amateur misses.

Think of the named animals which have appeared on regular television shows. An able photographer wished to record his four-year-old daughter’s reaction to seeing a giraffe for the first time. So at the zoo he went ahead, got his camera ready, but his daughter did not respond as he thought she would. “I see giraffes all the time on TV,” she explained.

A third way to communicate is by reading and writing and this includes abilities which not only reinforce speaking and listening, visualizing and observing, but also make their own contribution to effective communication. No matter what the mode of communication, words are explicitly or implicitly present. Hence the importance of a closer look at words, an analysis of what they can do, what they are for.

**What Are Words For?**

When Polonius asked Hamlet, “What do you read, my lord?” he replied, “Words, words, words.” Shakespeare also used such expressions as “mere words,” “words that are no deeds,” which “pay no debts.” He tells us about “harsh words,” “the power of the word of Caesar.” He suggests that we “give sorrow words” and thus lessen “the grief that does not speak.”

But whether words are good or bad, sincere or insincere, empty or full, powerful or weak, lead to deeds or do not, they are ever-present. Each day we read and speak thousands of words all combined in simple or complex patterns.

Words connote and denote. Some have clear-cut, precise, tenced-in definitions, others are diffuse, rich with reminding. Words in poetry are used with studied imprecision. Abstract words like democracy, creativity, home, love, envy, pride must be “suffused with suggestiveness,” a phrase used by philosopher Alfred North Whitehead.

For the most part we use words without being constantly conscious of their use. Words are as natural to us as thinking, but the quality and quantity of our word banks will determine how orderly and well developed our thoughts are. Our use of words may be rich and meaningful or limited and inadequate to the tasks of communicating.
To understand better the need for a mastery of words, we need to analyze some of the ways we use words. What are words for?

1. **Words are for communicating, sharing ideas, understanding the world.**

   It is a critical and almost unique function of the school to foster the complicated ability of learning to read and write, speak and listen with fluency, grace, and with discrimination. The schools are the agency of society for teaching specific and general communication skills to the young learner as well as the older one.

   Therefore we can conclude that the effective use of words in reading and writing, in speaking and listening, and visualizing and observing, is a major job of the school. Some of these words symbolize and crystallize the key concepts of our intellectual life. Others will convey our deep emotions. Some will be light, gay, playful, and humorous, and some sombre and serious. We work and play with words and above all—think with words.

   The chief problem of this generation and succeeding generations is to put people in touch with each other—in mind and heart. We must understand the world's great scientific, technical, and humanistic breakthroughs. The scientist must talk to scientists as well as to the layman. But we want more than an intellectual transmission of ideas; we must have the sharing of hopes, ideas, common joys, and common tragedies. We need to develop a sense of our common humanity. We need to recognize the demagogue's rhetoric and the plain speech of the prophet. To do so, we must be sensitive to words, their meanings both connotative and denotative.

   Many words arise out of our special experiences or occupations. An elevator in North Dakota does not resemble an elevator in downtown Peoria, Illinois. One is filled with grain, the other with people. A male graduate student from the South asked a young woman: “What are you doing this evening?” She replied: “Nothing. What did you have in mind?” To him evening meant afternoon. In Maine a milk shake may get you a milk drink without ice cream. You should have asked for a frappe... not frappé. And to have a tonic may merely mean to get a soft drink.
2. Words are for conceptualizing.

We feel comfortable when we can put a verbal label on an experience. We like to give names to persons, things, or events so that we can put everything in its “proper” place, conceptualize and file it for later retrieval. Naming, however, is hazardous. It may be premature, thus freezing the name as final, conclusive, definitive, causing the individual to suffer from hardening of the categories. For example, we may label a person as a liberal or conservative, a Catholic or a Protestant, as able or inept, a dove or a hawk. The either/or attitude does not produce discriminating nuances in the meaning of words. The Greeks used the word atom, meaning without cutting, indivisible. But the atom was divisible—fissionable as well as fusible.

A concept, a word, then is a labeling device which, in turn, relates to other labels. To have a chief you must have Indians. A hierarchy is a ranking of persons or positions one above the other. You can’t have a hierarchy (a concept) without the elements which you have judged as lower or higher in some kind of classification scheme. If you have a concept, there are usually subcategories. A large vocabulary gives us many concrete instances out of which to build new and broader concepts.

There is confusion in our thinking about vocabulary and concept. Every word is a concept, but a concept is usually more than the meaning of a single word. All words are concepts, but some concepts may not be words, e.g., skills. A concept tends to be abstract, made up of specifics. Indeed, many concepts take thousands of words to explain them, for example, democracy, civil liberties, communication.

I have noticed that students vary sharply in their ability to classify raw data even though they might have the same other abilities. I have asked many able students how they learned to classify. They usually say: “I don’t know. I always seemed to be able to do it.” Critical thinking is required to see likeness in difference and difference in likeness. Jean Piaget would suggest that there is a maturing phase to such an ability which can be directly studied and noted.

Psychologist William James once said: “You can’t see any farther into a generalization than your knowledge of its details extends.” He wrote this more abstractly when he stated “that
the significance of concepts consists always in their relation to perceptual particulars.”

I walk down a road in Maine and see many different kinds of mushrooms, some on trees. Merely calling them mushrooms is already a concept, an abstraction—but it is one made up of basic sense experiences with mushrooms. A morel, for example, is a great delicacy. When I study about mushrooms in a book, I learn that they are called fungi. I learn that they are also conceptualized with a group called ferns and lichens, because they are nonflowering. They are related, hence connected by similar characteristics. The concrete becomes generalized when connections are made linking the concrete things, the perceptual particulars. The linking words are relationships, not concrete sense experiences.

Growth in vocabulary comes not only by getting more sense experiences, but also by linking or connecting (in John Dewey’s term) these sense experiences with all our previous experiences. We classify and then we reclassify. it is like learning the names of the persons who are related to us—father, mother, brother, sister. Our father’s brother is called uncle. We call our uncle’s children cousins, and our parents’ fathers and mothers are called grandfathers and grandmothers. We say that the son, the father, and the grandfather are linked into three generations (or hierarchies). Linguists use the word cognate which means coming from the same word or root. Cognate also means related by family on either father’s or mother’s side.

Vocabulary or concept development is more than merely additive. It is integrative and multiplicative. It is not arithmetical in its growth but logarithmic. You get more than simple interest on your capital fund of known words, you get compound interest—interest on interest. There is a synergetic effect—two and two make five.

In each of the communication triads, we must use words. Words are our written and spoken symbols for concepts and objects. Education is a process of developing and refining concepts, applying them to old and new situations. A concept is a generalized idea about a class of objects or events. Concepts are the distilled essences of our experiences—tangible or intangible, concrete or abstract.
To master a field of subject matter is to learn its key concepts, that is, its words, its language. These concepts include not only its technical terms but also its principles or generalizations. A concept may be a word, a principle, or a combination of the two. A concept may be limited or it may be an overarching concept, a basic design for learning. I repeat: All words are concepts, but not all concepts are words.

Some concepts are readily mastered—the 3,000 or so words that children bring with them to the first grade. Others are developed in the formal education process. Some require the priceless ingredients that only age or mature reflection can provide, e.g., the meaning of justice, love, friendship, responsibility. In all concept development there is a process of refinement, a moving from imprecision to precision. There is a “reduction of uncertainty.” The concepts may be denotative, with high fences around them, or connotative, rich with reminding.

Concepts may be verbal or nonverbal. The earliest experiences of infancy are unverbalized—hot-cold, wet-dry, hungry-full. Mature experiences, however, include complicated mathematical, philosophical, or scientific concepts, expressed either as principles or as single terms.

Words are informative or emotive, sometimes both. Were the words spoken to you informative or were they veiled in irony, sarcasm, or satire? We are familiar with the comment from O. Wister’s The Virginian, “When you call me that, smile!” A psychiatrist meets a fellow psychiatrist and says, “Good morning.” The second psychiatrist says to himself, “I wonder what he meant by that.”

Words are for building a good mind, one that compares, contrasts, and classifies.

A good mind is one which can conceptualize. This means the ability to see difference in likeness and likeness in difference. This requires, as educator Maria Montessori put it, “a fineness of differential perception.” Linguist Roger Brown says: “Cognitive development is increasing differentiation.”

This search for the “unapprehended relations of things” is what distinguishes a first-rate mind from an ordinary or a commonplace one. The subtleties that one sees in nonverbal behav—

*Familiar Quotations, John Bartlett (1955) p. 795
ior, the raising of an eyebrow, the shadow of a frown, the almost imperceptible shrug of a shoulder, have their counterparts in vocabulary. Hence a good mind sees a difference where less perceptive persons may see likeness. The good mind is concerned with the differences that make a difference, uses relevance as the touchstone for learning. And relevance may be covert, not overt.

A good mind is curious, avid for experience, has a flair for classification. It uses words to index experiences, file, rearrange, and retrieve them. A good mind readily puts ideas into structures, models, outlines, paradigms, frames of reference, categories, matrices, grids, summaries. The good mind has “an eye for the essential.” And unless the essential ideas are classified, placed in labeled categories and hierarchies, they do not become readily available for use; they remain inert and are soon forgotten.

There is merit in possessing such a well-stocked mind. A good mind requires the development and ready use of a rich reservoir of sense impressions, ideas, concepts, hypotheses—a memory bank from which to draw. The memory bank is constantly replenished by reading, conversation, observation, by a never-ending curiosity about the world and one’s role in it. Central to any effective program of vocabulary development is ready access to excellence in books, magazines, and newspapers. You can’t be well-read unless you read well. The way to develop a first-rate vocabulary is to associate either directly or indirectly with people who have first-rate minds. There must be models to imitate, experts to converse with.

A superior vocabulary also requires the constant nourishment available in experiences provided by television, films, radio, recordings, study trips, simulations, displays. There are no meaningful abstractions without concretions. Hence, concrete, firsthand, and mediated sense experiences are a necessity as a source of ideas. Further, the images and sounds available in media provide the raw material out of which concepts are fashioned. A good mind creates a constant and judicious interplay between the concrete and the abstract, between the thing or the event and its signs or symbols.

4. Words are for filing, retrieving, and reorganizing information.
One of the great wastes in education is the forgetting that plagues all teaching and learning. We forget what we study in school because we underlearn it. We forget because what we learned was irrelevant to our purposes or, at least, was not made relevant. We don't remember what we would just as soon forget. We file and forget information because we don't adequately organize and reorganize it for later use.

If the essence of education is this ability to file, reorganize, retrieve, and use ideas, how can we develop an effective and efficient mental file? Why is it of such great importance?

I believe a systematic, planned program of vocabulary development is a major step in developing an efficient mental file. If we can show the interrelationships of words, the practices that govern the formation of words and concepts, we provide ourselves with helpful indexes to our bank of knowledge.

Biologists file plants and animals in the degree of their complexity: species, genus, family, order, class, phylum. They conceive and file the gnawing animals in an order labeled Rodents, which includes the squirrel, rat, beaver. They also file them in the class which nurse their young—the Mammalians—and further file them as eaters of flesh, (carnivorous), grass (herbivorous), fruit (frugivorous).

These last three words seem like hard ones, but if we were to ask children to classify animals as eaters of meat, grass, or fruit, they could do so. Their difficulty is not that of understanding the concept but of learning a Latinized label to describe it.

A classification is a system of interrelated particulars. Thus one term in such a system can evoke interrelated concepts. Temperature is related to thermometer; to boiling points and freezing points; to weather and climate; to moisture, humidity, clouds, precipitation; to movement of air, which may be wind, tornado, cyclone. Barometer is related to isobar as thermometer is related to isotherm. We have a reservoir of concepts which are interrelated and can be cross-indexed.

Thus in learning the vocabulary of baseball, we must learn the related terms which describe it. There is no batter without a pitcher or a catcher. The pitcher transacts his business with the batter and the catcher and with all the infield. The pitcher is directly concerned with walk, balk, foul, strike, curve, fastball.
The batters fan out, hit three baggers, and bunt. Every term noted has relationships with all other terms.

Here we must contrast the development of interrelated terms with the sterile approach to vocabulary instruction in which we ask students to define difficult, unrelated words and use them in a sentence. These words don’t reinforce each other. Given a word bank of terms which “go together,” practice on one term will tend to revive and give practice on others.

ROOT WEB OF RELATIONSHIPS

PATHOS (suffer)

Toward a Science of Vocabulary Development by Joseph O’Rourke (Mouton, 1974) page 99.

A classification is, in short, a web of relationships. Our skill in “webbing” determines in great measure whether our vocabulary is meager or expansive. For example, a simple web can be created with the root pathos, meaning suffer. Note the lines of relationship which illustrate the webbing process on page 99 of Toward a Science of Vocabulary Development by Joseph Patrick O’Rourke (Mouton, 1974). A much more complicated web is
found on page 113. Here twenty-eight different words are linked using a classification of opposites: *andr* (man) and *gyn* (woman).

There are many ways to web. Consider the webbing of the key characters in *The Iliad*.

The wide range of adjectival synonyms can be effectively webbed. Note the varied meanings of *dull* in this web.

**Synonymic Web of Relationship**

![Synonymic Web of Relationship Diagram]

*Toward a Science of Vocabulary Development*, by Joseph O’Rourke (Mouton, 1974) page 75.

5. **Words are for reading.**

You can’t get meaning out of a book unless you put meaning into it. The richness of one’s responses to reading is conditioned by the rich associations of the words read. These words are reminders of our past experience arranged in such a way as to suggest new meanings. Further, rich experiencing in one medium will carry over beneficially to all media. Improve listening and you improve reading, and vice versa. Good thinking, like good
reading, is a way of rearranging our old experiences in fruitful ways.

However, you can sharply improve your vocabulary by reading more, and increase the meanings you bring to the printed page. You will see the hard words more often and in a variety of contexts. Of the many ways to increase your vocabulary by indirect experience, reading is the best.

The 3,000 or more words which first-graders know when they enter school are obviously not learned by reading. Adults learn by reading, by firsthand experience, or through pictures the meaning of such words as *trillium*, *pollen*, *spore*, *birch*, *fungus*, *carburetor*, *dinosaur*, *caryatid*, *inning*, *strike*, and *retro-rocket*. Visualizing by photograph, painting, drawing, model, or by actual construction is an excellent way to get new meaning. Thus if we define reading as getting meaning from the printed page by bringing meaning to the page, we realize that many of these meanings will be gained by experiences other than reading. Later, by writing and by reading we record and consolidate the words secured by looking/listening and by visualizing/observing.

The varied ways of communication help us increase our background of concepts. And the richer the background of concepts one can bring to the word symbols, the richer and the more evocative one's reading will be.

The best readers usually have the best vocabularies. No really good reader has a poor one. A good reader is word-conscious, word-sensitive. One way to improve our reading is to improve our vocabulary, and vice versa.

If we accept the late John Erskine's theory that we have a moral obligation to be intelligent, we will improve our vocabularies so we can read magazines and books that wake us up mentally. We can "argue" with the authors. We can discuss what we have read, improve our conversations, be more interesting people.

We need to see reading as thinking about the meaning of words. Edward L. Thorndike developed this point in a brilliant but neglected article in the *Journal of Educational Psychology* for June, 1917, titled "Reading as Reasoning: A Study of Mistakes in Paragraph Reading." One quotation may give the tone of his approach.
reading is a very elaborate procedure, involving a weighing of each of many elements in a sentence, their organization in the proper relations one to another, the selection of certain of their connotations and the rejection of others, and the cooperation of many forces to determine final response.

Reading can be roughly divided into three levels. The first level is simple, uncritical reproduction, a duplication of what has been read. It is reading the lines—literal comprehension. The reader knows what the author “said,” no small accomplishment. But what did he mean?

The second and higher level of reading involves drawing inferences from what is read—discovering the implications. It is reading between the lines. It requires critical thinking, an analysis of what the writer really meant. Did he write ironically? With tongue in cheek? Was his tone helpful? cynical? an exaggeration for effect?

A third level of reading involves evaluation and application of what is read and requires vigorous, critical judgment. It is reading beyond the lines.

But, let us remember that reading is both a means and an end. We could overemphasize the instrumental phases of reading and underemphasize its consummatory phases. Reading is for fun as well as for instruction and vocabulary growth. After all, one of the great values of reading is its power to communicate delight, joy, pleasure. Reading is both an instrumental and a consummatory experience, a means and an end, for business and for pleasure.

It may be the pleasurable joy of rhymed words in the following jingle of Mark Twain:

Conductor, when you receive a fare
Punch in the presence of the passenjare!
A blue trip slip for an eight-cent fare,
A buff trip slip for a six-cent fare,
A pink trip slip for a three-cent fare,
Punch in the presence of the passenjare!
Chorus: Punch, brothers! punch with care!
Punch in the presence of the passenjare!

6. Words are for writing.

The best ideas in the world are often expressed in words that can’t be read by half the adults in the world. They are
illiterate. Many specialists have not yet learned how to put important political, health, and economic information into interesting, easy-to-read prose. There is an urgent need for writers who can write to the reading level of most Americans. These writers will be word conscious. They will have studied readability levels and will know the importance of giving their reader contextual clues to necessary but hard-to-understand words. They will use the short, simple, vivid, concrete, easily understood words instead of the longer, more abstract equivalents. Instead of confronting problems, they will just face them. Rather than proceed on the assumption, they will assume. They will excise obese phraseology—cut out the fat.

Clear, to-the-point writing is not confined to the mass media. The great writers wrote not to confuse or confound their audiences, but to enlighten them, to share with them their discoveries and feelings. They sought clarity and concreteness. Too many writers write to impress rather than to express.

The able writer will have at his elbow both an unabridged dictionary and a small one. One is for a quick, easy reference, the other for finding more complicated information. Obviously you won’t look up every hard word you see in your reading, but the time does come when you will finally want to check on it. If Mark Twain thought it necessary to carry an unabridged dictionary with him as he traveled west by stagecoach, perhaps we can motivate students to use the dictionary, the encyclopedia, a thesaurus, an Atlas, a gazetteer, as a source of ready reference. Thus when a student wants to differentiate various ways of walking, he can easily find synonyms such as amble, scramble, ramble, scoot, scuff, wander, wobble, lurch, mince, prance, stumble. Was the person being described scornful, irascible, petulant, irritable, picky? Here we can web these various meanings—using the thesaurus as an aid.

7. Words help to improve the range and depth of our experiences.

An excellent and necessary way to improve your vocabulary is through firsthand experiences. If you are experienced in cooking, you know such words as dredge, sear, draw, marinate, parboil, sauté, braise, frizzle, coddle. A sports fan will know baseball terms, such as fungo, Texas leaguer, infield fly. You don’t usually learn such vocabularies by reading books or maga-
zines. You do something. But cooks and sports fans do read in their own fields and hence increase their vocabularies.

A basic rule in improving vocabulary is to increase the range and depth of your experiences. Visits to museums, art exhibits, the legislature, or Congress bring increased vocabulary. So does volunteer work with the various community agencies, a nature hike, political activity, or a visit to the seashore. Think of the terms that sailing may bring into your active vocabulary: scupper, topsail, dinghy, starboard, luff.

We can seek out the rich experiences that will make the abstract more concrete for us, that add color and meaning to our sometimes bookish, unreal learnings. Many of our effective words come through metaphors of animals: whale, shark, piggish, assine, skunk, foxy. Or edibles: carrot top, lettuce, tomato, top banana, cabbage head. Did you ever see an exaltation of larks, a gaggle of geese, a pride of lions, a brace of ducks?

A rich experience is often the culmination or fulfillment of earlier experiences. The memorableness of an event depends on what you bring to it. Many Americans expecting to have rich experiences in Europe find the trip dull and wearisome. They are not ready to draw from the experience what it offers to those who have been adequately prepared, they don’t notice. They cannot absorb the potentially rich experience facing them. Auguste Rodin had thought and studied so much about the sculptures of the cathedral in Chartres that when he finally saw them he fainted.

I visited Athens in 1959. I knew about the Acropolis, and I had seen the color slides of friends who had visited Athens. But when I climbed the Acropolis with a Greek professor, something new was added. It was the real thing, not a representation, not a picture, still or moving. I was there. My limited secondhand experiences now became poignantly meaningful. The previous symbolic experience became tangible and was sharply intensified.

Distinguished writers and dramatists have felt the great power of the concrete sense experience as contrasted with that of the abstraction. Sir Arthur Quiller-Couch, writing on “Jargon” in On the Art of Writing, says: “So long as you prefer abstract words, which... express other men’s summarized concepts of
things, to concrete ones which lie as near as can be reached to things themselves and are the first-hand material for your thoughts, you will remain, at the best, writers at second-hand.”

Ludwig Lewisohn, the novelist and critic, said in The Magic Word that “he who grasps the particular in vivid fashion is given the general, whether he is aware of it or becomes aware of it only later.” Sense experience, then, can be artistically shaped to make our communications vivid, alive, evocative. Dostoevski demanded of a writer who had described a man throwing money to an organ-grinder: “I want to hear that penny hop and chink.” Vivid words create vivid pictures and vivid pictures create vivid words.

8. Words are for metaphorizing.

Nearly everyone has studied figurative language in a course on English. Unfortunately, the terms simile, metaphor, metonymy, synecdoche, oxymoron, personification, hyperbole, and parables and myths are often seen as quaint words or phrases in a dull textbook.

Language grows through lively metaphors. Figures of speech, especially those in slang, represent innovation and creativity in language development. They can provide the seasoning (a metaphor) for flat, tasteless writing, perk up commonplace expressions. They give a word extra work to do. G. K. Chesterton says, “All slang is metaphor and metaphor is poetry.”

Metaphors move out of the language as well as in. If you see a lousy television show, you are sharing a metaphor which has been in use for over a hundred years. “Hayseed,” “blockhead,” “champing at the bit” are now dated metaphors. I used the term “snow job” in an Air Force manual written during World War II and wondered then whether it would survive. It did. And similes which once were fresh and inviting may turn into clichés through overuse. Some examples are: “slow as molasses in January,” “blind as a bat.”

The word metaphor comes from meta meaning “across” and phor meaning “carry.” When you metaphorize you carry a meaning across, transfer it, apply it in a fresh new way. Sometimes the comparison is stated using such words as like, as, than, and we label it a simile, the exact word for like in Latin. When the comparison is implied, we call it a metaphor.
Today we use metaphor as the general term and include under it similes and other figures of speech. Aristotle declared that the use of metaphor indicated an eye for resemblances. Shelley said that “the language of poets is vitally metaphorical . . . it marks the before unapprehended relation of things and perpetuates their apprehension.” Indeed, poetry abounds in metaphor. The poet reflects on an object, such as a chambered nautilus, a daffodil, a lark, a tiger, a lamb, and draws conclusions, all of which involve stated or implied comparisons.

Charles Dickens spoke of a man as like a signpost, always pointing the way but never going there. A five-year-old describes a cattail as a hot dog with fur on it.

A little boy stands on the rocks at Pemaquid Point in Maine and watches the waves breaking against the rocky shore. “Look, Daddy,” he says, “the water is mad.” Here he likens the wild sea to an angry person. Walt Whitman uses a similar metaphor but adds to it when he says, “O madly the sea pushes upon the land, with love, with love.”

We commonly metaphorize parts of the body, plants and vegetables, fruits, animals. We make old words do new work. Edna St. Vincent Millay said: “O world, I cannot hold thee close enough!” Here she extends the idea of loving a person by putting one’s arms around him, to that of embracing the whole world. Embrace is a metaphor deriving from the literal Latin meaning of “in the arm of,” as in this sentence which can be read either literally or metaphorically: “Man embraces woman.”

The head is a part of the body commonly used in metaphors—perhaps because it is the seat of the brain. The World Book Dictionary devotes three pages to the word head and its various combinations. Many of these “head” words are denigratory (hence blackening). Such terms include blockhead, dunderhead, bonehead cabbage head, clunkhead, dumbhead, fathead, meathead, pinhead, swellhead. Egghead usually refers to an intellectual, often disapprovingly.

Other parts of the body are metaphorized in such terms as toothsome, lippy, loudmouth, jawbreaker (meaning a big word and also a marble-like hard candy), eye of the hurricane, taking it on the chin, bald truth, hair-raising, skull practice, at
arm's length, put the finger on, knuckle down, thumb a ride, elbow your way in, footloose.

Animals figure prominently in metaphors: monkey on your back, lion-hearted, weasel out of, foxy, wolf down food, a social butterfly, catty, a bear hug, a whale of a good time, get skunked. Plants and vegetables produce many metaphors: clinging ivy, cauliflower ear, tomato, string bean, lettuce (folding money), corn, in clover, rhubarb. Many fruits are metaphorized: top banana, apple-cheeked, a peach, lemon, pear-shaped, raspberry.

A parable is a metaphor which presents a story or event to illustrate a point, thus making it comparable. Well-known Biblical parables include that of the sower, the lost sheep, the good samaritan, a certain rich young man, the prodigal son, the mustard -ed, and many others. Fables, too, are metaphors, giving us terms like sour grapes, crying wolf, dog in the manger, the hare and the tortoise, or killing the goose that laid the golden egg.

Shakespeare favored the oxymoron, another type of figure of speech. Oxymoron comes from two Greek words—oxys (sharp) plus moros (foolish). An oxymoron is a seeming self-contradiction, as “Parting is such sweet sorrow.” Some other examples are priceless unessentials, guilt-edged insecurity, masterly inactivity, prudent failure, sophisticated irresponsibility, dynamic bore, silent applause, studied imprecision, fatiguing leisure, broadly ignorant, laborious indolence, precise misinformation, successful failure, trained incapacity, a hotbed of apathy, gentle strength. A famous recent oxymoron was “benign neglect,” originated by Daniel Moynihan, then a presidential adviser.

I have said that words have these characteristics:

1. Words are for communication, sharing ideas, understanding the world.
2. Words are for conceptualizing.
3. Words are for building a good mind.
4. Words are for filing, retrieving, and reorganizing, information.
5. Words are for reading.
6. Words are for writing.
7. Words help to improve the range and depth of our experiences.
8. Words are for metaphorizing.
Next, I want to discuss the ways that schools and colleges can teach vocabulary development as a phase of language development.

We must have a systematic plan and program for the development of vocabulary. The teacher must work this plan and engage students in developing their own plans for growth of words. Incidental teaching of vocabulary tends to become accidental. There must be some organized vocabulary instruction every day. This is only saying that conceptual development, the building of language power is a continuing activity. This applies not only to the child but also to the able professional teacher.

There are four stages in learning a word. First, you see a word and are confident that you have not seen it before, hence you don’t know it. Have you seen anergy, flan, fustian, flibbertigibbet, fichu, klutz? Some years ago I went through a dictionary which had 80,000 entries. Here are some of the words I then checked as not known to me: abatis, abomasum, Ac (chem), ac-cidence, acetabulum,aconite, addax, adsorb, advert (I didn’t see its relationship to advertisement), agave, ai, Ainu (whom I saw later in Japan), alewife (a fish, not a beer drinker), alternative (causing change, viz: altering), americium, ampoule.

Second, some words have moved past stage one and we think we have heard or seen them before. We are fairly sure they exist as words but don’t know what they mean. For example, we sometimes say to a “stranger,” “I think I have met you before but I’m not sure.” The child says, “I know we have a mortgage on our house but I don’t know what a mortgage is.” We think the word exists, but we don’t know its meaning.

Do you think you have seen the word pornograffiti before? You haven’t because I just coined it. You can see that it is a combination of pornography and graffiti.

Which of the following words are at the second stage level for you? mnemonics, eleemosynary, klutz, shish kebab, dik-dik, freebie, torque, bouillabaisse?

Third, is the stage of the twilight zone. Here are words of which we have some knowledge but whose meanings are a bit foggy, not sharply focused. They are words we almost know and they will require little effort to learn. Gainsay was such a word for me. It means to contradict, literally to say against. Penulti-
mate and antepenultimate may be twilight zone words for you. If you think of the word ultimate whose meaning you know, plus the prefix paene (almost) you get the meaning of just before the last, almost last. Penultimate is sometimes wrongly used as meaning absolutely the last, as “the penultimate insult.” Antepenultimate means just before the penultimate one.

Another class of twilight zone words can furnish many new words. This includes the opposites of words which are already known. You may know ameliorative but not its opposite pejorative.

Superior is easier than inferior, posterior than anterior; exterior and interior are about the same difficulty.

If I may extend the family analogy, some of us recognize members of a family when we see them together. The resemblance is great. “Oh, you’re one of the Olson boys.” Hence the student may not see the relationships between excision, decision, incision, scission, scissile until he is reminded of the word scissors. They are first cousins, cognates.

At the fourth stage, the word is known and we understand it when written or spoken. You could either define it or pass a multiple-choice test on it.

At this stage one can use the word or the root part in learning other words. If a student knows hydro, he or she can easily understand the meaning of hydroelectric, hydrometer, hydrophobia, hydrant, etc. Actually, in an unabridged dictionary such as World Book there are over 150 words beginning with hydro. And the reader would know that they all had something to do with water.

Obviously, all words do not pass neatly through these four stages. Sometimes we learn the word just by seeing it once and then looking it up. This may be true of you with such words as pogonip (winter fog with ice particles), zits (pimples), ossuary (urn for bones), cassowary (ostrich-like bird), adit (entrance, opposite of exit), daymare (opposite of nightmare), estivate (opposite of hibernate).
Learning Techniques

You can become a systematic student of words in several ways. Underline the hard words you run across in your own magazines, books, or newspapers. You need not look them up. Just fix your attention on them, guess their meaning from any external clues (context of the sentence) or internal clues (root word, prefix, or suffix), and go right ahead with your reading. The next time you see one of these words, test your previous guess about its meaning. And you will be surprised by the number of times you will see the word again when you have become aware of it and interested in its meaning.

Maybe your guess fits the meaning, and maybe it doesn’t. Check it with your desk dictionary. You might also note the origin of the word and get an additional memory hook on which to hang this word. If you check the pronunciation and say the word aloud, you get another memory boost. You can also check on words you may mispronounce, such as archipelago, niche, orgy, condolence, schism, succinct.

I can’t recall a new word which I learned that did not soon appear again in my reading. This has happened to me with such words as alb, valerian, scutwork, googol, degression, rodomon-tade, anergy, zits, litotes, tour de force, in hoc signo vinces, and hundreds of others.

A person who is learning to learn new words searches for regularities—for ways by which he can put these experiences together more meaningfully. For example, nearly every college student has come into contact with such words as dystrophy, eugenic, dyspeptic, euphoria, euthanasia, dysentery, eulogy, euphony. If he has learned a method of word attack which searches for meaningful similarities and differences in roots, suffixes, and prefixes, he will notice here the use of two prefixes eu and dys. He discovers that they apparently mean good and bad.

He will now test out his hypothesis. If eulogy means “good words,” is there a word dyslogy which means “bad words”? There is such a word. One might experiment further and create such words as dysphoria, dysgenic, eupeptic, eutrophy, dysphony. When he meets the word eudemonic, he can check the context to see if it means a good demon. It might be hard to work
"eutrophy" into a dinner table conversation, but we ought to learn some words just for our own amazement. Many adults know such words as neuritis, appendicitis, anemia, toxemia, alcoholism, morphinism, claustrophobia, hydrophobia, psychosis, arteriosclerosis. But some have not learned through discovery the following meanings: itis-inflammation; emia-blood; ism-excess; phobia-fear; osis-diseased or abnormal condition.

Vocabulary growth through reading should not be accidental or incidental. You need some proven techniques for study. One is to train yourself to look for context clues when you meet new or twilight-zone words. In addition, as noted above, you need to notice the internal clues of the word—its root, prefix, suffix, or compound elements. Incidentally, as reading material becomes more abstract, the number of words that are compounds of key roots and affixes increases. The names of inventions and political and medical terms are often compounds of Greek and Latin roots—television, impasse, bipartisan, osteopath.

The great literature of this and other countries is an excellent source of new words. Mythology has a special vocabulary spin-off because the names of the men and women portrayed there have entered our vocabulary: amazon, erotic, Procrustean, pygmalion, vulcan, chaotic, herculean, Atlas, jovial, Mnemosyne (mnemonic), Sisyphus, Cyclops, March (from Mars).

Psychologist Neal Miller has stated that to learn you must want something, notice something, do something, and get something—be rewarded. Many of us do not notice the parts of a word that seem strange to us. The reader may not notice the non in nonsense, the penitent in penitentiary, the erg in anergy or energy, the cult in occult, the sept in September. Can you guess what the word anergy means? an (without), energy (work)—lack of energy. Notice the derm (skin) in dermatitis, pachyderm, taxidermist, hypodermic; the corn (horn) in cornucopia—the horn of plenty; the quint (five) in quintessence—the fifth and highest of all the essences: earth, air, fire, and water.

Use your new words, sometimes in writing, sometimes in conversation, sometimes in reading. This need not be considered as showing off, it is rather practicing something you are trying to learn. Time in an English class should be devoted to using these "fancier" words. There is an appropriate time, ordinarily, for
using new words. Some are what Shakespeare called "household" words. But some may be reserved for reading only, or for "stately speech" when "choice word and measured phrase" are desired.

Careful listening will help you discover new words. This may happen in conversation with your friends who have interests like your own. It is pleasant to discover that some of our rarer vocabulary actually appears in the speech of others. I first heard tour de force (a brilliant feat) in a comment of my high school principal upon a play which he had seen. A mathematician referred to Basic English as a tour de force meaning merely ingenious. Read aloud, hopefully to someone else, but sometimes to yourself, just to savor the flavor of poetry or swinging prose. Why don't we read aloud more plays in our speech or drama classes?

Students enjoy hearing something read well either by a teacher, fellow students, or in a recording. Years ago, when I read Penrod and Sam by Booth Tarkington to a seventh-grade class, I discovered that my speaking vocabulary was way behind my reading vocabulary. I did not know how to pronounce such words as conversant, dolorous, primordial, flaccid, solaced. Indeed, I didn't even know their meaning. Take time to check pronunciation in your dictionary.

Don't make a big chore out of this. If you are a teacher of English, you are probably reading and teaching plays. These readings will usually be informal or students may be playing roles in a drama. Here the pitch, the tone, and the emphasis of the words become important. You must pronounce correctly and not say "No siree," when the script says "No, sire," (as a friend of mine once did as a boy). Sometimes students can read informally to each other, sometimes as partners. It works!

**Learning Roots, Prefixes, and Suffixes**

Increase your word power by becoming conscious of key roots and important suffixes and prefixes. Many of our English words are derived from Greek and Latin words. Knowing the most commonly encountered roots will give you important clues to word meanings at sight. For example, the root graph (to write) appears in paragraph, telegraph, autograph, biography, and of course in the graphite we write with.
Learning the roots of words is a shortcut to learning hundreds of words. Knowing the root *culp* (fault or blame) helps you analyze or remember the words *inculpate*, *culpable*, *exculpate*, *exculpatory*, *culprit*, *mea culpa*.

When you know the word elements it is much easier to unlock the meaning of big words. A single root such as the Greek *nym* (name) gives us *antonym*, *homonym*, *acronym*, *pseudonym*, *synonym*, *anonymous*, *heteronym*, *eponym*.

Here are some root-forming words often used in high school and college level reading. Familiarity with them will release significant numbers of new words into your potential vocabulary.

<table>
<thead>
<tr>
<th>Root</th>
<th>Meaning</th>
<th>Derived Words</th>
</tr>
</thead>
<tbody>
<tr>
<td>acer, acr</td>
<td>sharp, bitter</td>
<td>acrid, acrimony, acerbity, exacerbate</td>
</tr>
<tr>
<td>acu</td>
<td>a point</td>
<td>acute, acuity, acuteness, cute</td>
</tr>
<tr>
<td>agon</td>
<td>a contest, struggle, actor</td>
<td>agony, antagonist, protagonist, deuteragonist (second character)</td>
</tr>
<tr>
<td>alb</td>
<td>white</td>
<td>albumen, albino, albatross, alb</td>
</tr>
<tr>
<td>anthro</td>
<td>man</td>
<td>misanthrope, anthropology, anthropoid, philanthropist</td>
</tr>
<tr>
<td>astro</td>
<td>star</td>
<td>disaster, astronomical</td>
</tr>
<tr>
<td>cis</td>
<td>cutting apart</td>
<td>scission, scissle, excision, incision</td>
</tr>
<tr>
<td>crypt</td>
<td>secret</td>
<td>cryptic, crypt, cryptogram, cryptography</td>
</tr>
<tr>
<td>culp</td>
<td>fault, blame</td>
<td>culpable, exculpate, inculpate, culprit, mea culpa</td>
</tr>
<tr>
<td>dicho</td>
<td>in two, divided</td>
<td>dichotomy, dichotomous, dichoptic, dichogamy</td>
</tr>
<tr>
<td>greg</td>
<td>herd, flock</td>
<td>egregious, gregarious, congregation</td>
</tr>
<tr>
<td>hydro</td>
<td>water</td>
<td>hydrant, hydrogen, hydrophobia, hydrolysis</td>
</tr>
<tr>
<td>tele</td>
<td>distant</td>
<td>television, telemeter, telescope, telephone, telegraph</td>
</tr>
</tbody>
</table>

*noted earlier that to learn something you had to notice*
something. We may have very inadequate habits of noticing. Do you know the word *reice*? Most people say they do not until they relate it to hockey. They do not see the *pre*side in president; the *erg* in energy, synergy; the agony (struggle) in antagonist or protagonist. Creativity and self-discovery are useful here.

Sometimes self-discovery comes when we develop the concepts of opposites—e.g., *diurnal*-nocturnal, nightmare-daymare, *apogee*-perigee, condense-dilate, *pre*-post, sub-supra, hibernate-estivate, internal-external, eso-exo as in esoteric and exoteric.

Another key element in mastering vocabulary is to notice prefixes and suffixes that we did not "see" before, e.g., *ad* verb, *pre* position, *ad* noun, *com* position, *pre* dicate, *inter* dict, *inter* regnum, *per* suade, *dis* suade.

When you recognize prefixes and suffixes you will get clues which multiply, negate, enlarge, or diminish. Prefixes can multiply concepts, such as *multi* or any of the important number indicators—*bi*, *dec*, *tri*. Look at the number words that are easily understood by the person who knows his number prefixes, e.g., *bi* cuspid, *bi* focal, *di* phthong, *deca* thlon, *mono* theism, *bi* lingual, *nov ena*, *deca* log, *pent* agon, *di* lemma, *quint* essential, octagonal. *Con* means angle as in trigon, nonagon, bignal, agonic.

Suffixes which diminish are found in such suffixes as *less* (ageless, homeless, fearless, spotless, beardless), *cule*, *icle*, *ling*, ette, as molecule, icicle, underling, dinette.

Prefixes can negate concepts as in *unaware*. However, not all negative prefixes are as easily recognized as *un*. Others are *in* (inert), *ir* (irrational), *im* (immaterial), *il* (illiterate), *an* (anergy), *mis* (misshapen).

It would be helpful in studying a new subject to have available a glossary or list of the important technical terms in that field. In English, under figures of speech you would find simile, metaphor, metonymy, alliteration, hyperbole, personification, irony, oxymoron, synecdoche, litotes.

In geography, there would be terms like latitude, longitude, eclipse, plateau, Torrid Zone, Antarctica, syncline, anticlyne, and many others. Students will know some of these terms well, others they may never have heard of. As the subject is pursued, however, these terms will be used and hopefully learned.
By becoming familiar with prefixes and suffixes we can move from some knowledge to increased knowledge. If we recognize the meaning of the prefix *auto* in automobile, or automatic, we might be able to infer the meaning of an unfamiliar word such as autonomy, autopsy, autointoxication.

Suffixes too change the meaning or the function of a word. Two of the more common suffixes are *ment* (the state of) used to form nouns such as contentment, enjoyment, arrangement, treatment. The suffix *ology* (the study of) opens the door to many science words: agrology, craniology, seismology, oology.

The Greek suffix *itis* means inflammation when referring to diseases. Combined with other word elements referring to parts of the body, it is easily recognized by all of us through television advertising: arthritis, bronchitis, bursitis, neuritis, sinusitis. *Ectomy* means cutting out as in hysterectomy, appendectomy, gastrectomy, and others.

It is well to remember that the suffix *ette* has also taken on the meaning of feminine (usherette, majorette) or substitute for (leatherette, flannelette, satinet or satinet).

The suffix *fy* means to cause to be or become—glorify, beautify, terrify. The suffixes *able*, *ible* mean can be, worthy of, or deserving of—reliable, blamable, admirable, contemptible, illegible.

Gender can also be indicated by suffixes such as *ess* (princess), *trix* (aviatrix), *a* (sultana), *ine* (heroine), *etta* (Henrietta), *enne* (comedienne), *ette* (usherette).

Knowing useful suffixes helps reduce verbosity. Familiarity with the suffix *oid* means you need not say "like a sphere" but rather "spheroid."

**Pronunciation and Spelling**

Do you ever hesitate to use certain words because you’re afraid you’ll mispronounce them? Sometimes we’re afraid to pronounce *valet* as VALit (a correct pronunciation) because our friends might think we don’t know enough to say *vaLAY* (also correct).

Some words have only one pronunciation and don’t cause trouble once we’ve learned them. Some change pronunciation according to their part of speech. For example, refuse as a verb
is reFUSE, as a noun it is REFuse. We must make a distinction between verb and noun when we say conVICT and CONvict.

Obviously the chief reason for discriminating between speech sounds, pronouncing words correctly, is to communicate clearly. Bad pronunciation may result in misunderstanding or embarrassment. We can point out to students that accent often changes the meaning of a word. We can list troublesome words that are spelled alike but have different meanings, for example: ABsent, abSENT; COMpress, comPRESS; CONduct, conDUCT; CONflict, conFLICT; DIgest, diGEST; esCORT, ESCort; INtern, inTERN; INvalid, inVALID. Some words, of course, do not change their meaning because of accent. For example, address may be accented on the first or last syllable. Pronunciation is sometimes a matter of preference. Debatable points can be settled by consulting the dictionary.

A teacher might ask the members of the class to prepare their own lists of pronunciation demons, words they aren’t sure about. Some of the words in such a list for high school seniors might include: affluence (AFFluence), altimeter (alTIMeter), antipodes (ANTIPodes), archetype (ARKetype), bestial (BESTyal), crevasse (creVASS), desultory (DESSultory), devotee (devvaTEE), diphtheria (difTHERIA), effete (ehFEET), ephemeral (ehFEMeral), facade (fehSAHD), harbinger (HARbinjer), hedonism (HEEDonism), heinous (HAYnus), lichen (LIKEN), maniacal (manEYEacal), mischievous (MISchevus), ophthalmologist (OFFthalMOLLogist), cerulean (sehRULian), respite (RESSpit), succinct (SUCKsinct), taciturn (TASSiturn), forte (fort)—what you do well, your strong point. Forte (fort) is often confused with forté (forTAY), meaning loud or strong as in music.

Pronunciation often depends on where you live. There are regional dialects. The people in certain sections of the country or the world prefer pronunciations not used in other sections. Some people prefer to pronounce abdomen as (ABdomen), others prefer (abDOEmen); decadent may be (DEKadent) or (deKAYdent); despicable may be (DESpickable) or (desPICKable); hospitable (HOSpitable) or (hosPITable); gondola (GONdola) or (gonDOLA) but only the latter if you’re a railroader. An Englishman pronounces laboratory (laBORatory) and schedule as (SHEDule).

But as I noted earlier, the main aim of pronunciation is to
communicate clearly. Some of us may pronounce words in a certain way for the sake of social acceptance. We may want to adhere to accepted standards of school, profession, business, culture group, family, or friends. But primarily we need to send and receive messages and ideas effectively and we can remind students that poor enunciation and mispronunciation distract the listener and impair effective communication.

Students might be asked to listen for and write down mispronunciations they hear in conversations or on radio and television. They may hear ever for every, chimley for chimney, liberry for library, attacked for attacked, drownded for drowned, ast for asked, escape for escape, and asterick for asterisk. Indeed pronunciation is a key factor in oral language development and is closely related to the problem of spelling. Many words are misspelled because they are mispronounced. This is true of words such as government, pronounced goverment, quanity for quantity, probly for probably, and artic for arctic. Actually the pronunciation artic is now acceptable as is government, but the spellings are not.

Spelling is word formation. Thus spelling is a significant part of vocabulary development. Spelling involves word structure and cannot be minimized as a skill in the development of vocabulary and language growth. Spelling English words is sometimes difficult because many words are not highly phonemic, that is, there is not a one-to-one correspondence of phoneme and grapheme, no high degree of relationship between sound and letter. Notice the k in knee and knife, or the g in gnarl and gnash.

Spelling could be the basis of a short study of the history of English words. For example, why a k in knight? Actually the k was pronounced in Chaucer’s time, but although the meanings and pronunciations of English words have changed over the centuries, the spelling has stayed the same. Thus we have silent letters in light, bright, night, flight. Students might be asked to trace the origins of several words to find out why they are spelled the way they are, for example, the silent w in two and answer. Many good dictionaries provide such information.

Obviously, spelling and vocabulary go hand in hand. Spelling cannot be dissociated from reading and writing. If you don’t know a word, you probably won’t read it. Vocabulary acquisi-
tion precedes reading skill. If you don’t know how to spell a word, you probably won’t write it.

Reading is decoding written symbols. Writing is encoding. To encode the student must gain skill in letter discrimination. That is, he must spell (place the graphemes—letters—of a word in conventional order) before he can write, or encode with skill. He must make letter discrimination and learn letter placement. It matters a great deal where the letters go. It’s the difference between quite and quiet, complaint and compliant.

The effective spelling program will accompany vocabulary study. Students can learn to spell meaningful syllables, roots, and affixes such as anti (against), ante (before), tele (distant), graph (write), phon (sound). Thus they learn to make generalizations about the regular patterns of letters that make up meaningful syllables.

Just as teachers help students generalize about word formation, they can also help students generalize about spelling. Words can be arranged in groups that help the student make visual and aural associations, for example:

<table>
<thead>
<tr>
<th>Prefixes</th>
<th>Sent</th>
<th>Fund</th>
<th>Symphony</th>
</tr>
</thead>
<tbody>
<tr>
<td>ab duct</td>
<td>re</td>
<td>mit</td>
<td>sym pathy</td>
</tr>
<tr>
<td>ab erration</td>
<td>reflect</td>
<td></td>
<td>sym biosis</td>
</tr>
<tr>
<td>Suffixes</td>
<td>tonsillitis</td>
<td>sanit</td>
<td>icicle</td>
</tr>
<tr>
<td>appendicitis</td>
<td>audit</td>
<td>orium</td>
<td>part icle</td>
</tr>
<tr>
<td>neutritis</td>
<td>natat</td>
<td>orium</td>
<td>cut icle</td>
</tr>
<tr>
<td>Roots</td>
<td>telegraph</td>
<td>visible</td>
<td>aster oid</td>
</tr>
<tr>
<td>auto graph</td>
<td>television</td>
<td></td>
<td>dis aster</td>
</tr>
<tr>
<td>steno grapher</td>
<td>supervision</td>
<td></td>
<td>aster isk</td>
</tr>
</tbody>
</table>

Spelling, seen as word formation, does not mean that the student sees the spelling of each word as a separate task unrelated to former learning. For effective learning the student will see the word *descending* as an inflected form of *descend*, and recognize the inflected forms such as *descendant, descendants*, and further, from the same root, *scend* (climb: *ascend, ascendant, transcend*, and ultimately the transfer to *descent, ascent, descention* (rare), and *ascension*).

Thus a systematic teaching of prefixes, roots, and suffixes helps the student to spell better, to see spelling as word con-
struction. The root *dict* means say as in *predict*, *verdict*, *contradict*, *dictate*. Notice the cline (lean) in *decline*, *incline*, *recline*, and *syncline*.

The student can learn helpful rules about spelling, such as *i* before *e* except after *c* (watch out for exceptions such as *weird*). They can learn the difference between *principal* and *principle* by remembering that a principle is a rule (both end in *le*). But the student who recognizes key roots and affixes finds it easier to spell hard words. He makes use of the principle of transfer.

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**Playing With Words**

A good life should have an appropriate balance between work and play, the serious and the humorous. Life, like the "Peanuts" cartoon can be both funny and deadly serious. Teachers should not try to compete with Bob Hope but the intensely serious deserves to be counterpointed with occasional good fun.

You can *play* with words and work with words. We have riddles, puns, gags, wisecracks, limericks, one-liners of various kinds. Words can be funny because they can have double and triple meanings. Ever hear of a triple pun? Here is one: A widow and her grown sons went to Montana and started a beef cattle ranch. The ranch prospered and they decided to give it an appropriate name, and called it *Focus*. Now comes the inevitable "riddle"-like question: Why did they call the ranch *Focus*? The answer: A Focus is a place where sons raise meat (sun's rays meet).

Or the triple pun of the bride and bridegroom who were moving toward the altar. The bridegroom remembered three things to do as he walked along: Go up the aisle, to the altar, and join in singing the first hymn. His bride watched him and also said to herself: "I'll alter him."

Limericks require writing skill and are often funny.

I sat with the Duchess at tea,
It was not as I thought it would be.
Her rumblings abdominal, were simply phenomenal,
And everyone thought it was me.

An employer, annoyed with the poor spelling of his secretary, said to her: "Your spelling is simply abominable." To which she curtly replied, "Please leave my stomach out of this."
Sometimes proverbs can be reversed to provide amusing statements. Time wounds all heels. The early worm gets the bird.

A witty friend wrote me a note about my book which I had given him. He said, “I must say I liked your book.”

Boners and Mispronunciations

Here are some examples: A woman interested in social security asked, “Where do I go to get my form filled out?”

A real estate dealer wrote a buyer saying, “Please execute three copies of the contract along with your wife and return to our office.”

An advertisement of a British druggist read: “We dispense with accuracy.”

A young woman showed her friends a new mink coat. “What did you do for it?” her friend asked. “Oh,” she answered, “I had to adjust the sleeves and shorten it a little.”

Multiple meanings of words are indicated by this comment: “You are early of late; you used to be behind before, but now you are first at last.”

I enjoy collecting interesting misuses and mispronunciations, such as: “He stepped on the exhilarator.” “We are studying jubilant delinquency.” “I don’t deserve all this oolagoozing.” “I don’t like to sing solo; I like to sing abreast.” “Minch pie.” “My boy can’t come to school. He has indolent fever.” “He’s still green behind the ears.”

Or, consider the young woman who had accumulated words without really understanding them. She approached President Maynard Hutchins after a lecture and said, “You were simply superfluous. I’ve never heard such an enervating speech.” “Thank you,” President Hutchins replied. “I’m thinking of having it published posthumously.” “Wonderful,” she added, “and the sooner the better.”

Speaking and listening are a dyadic component of communication. In speaking we may neglect the ability to pronounce correctly many of the words that are new to our vocabulary. As a consequence we may be embarrassed by our awkwardness in this field. I have heard such expressions as the following: He had to bear the blunt of it. He is a swado (psuedo) intellectual. It will wet my appetite for more learning. (One of
my graduate students hearing this in class said, "I'll drink to that." I recently heard a person say that the students were mulling around on the campus. That's good—the more they mull, the less they'll mill.

A student spoke of his teachers' out-molded ideas. My granddaughter once told me she felt screamish when she stepped on a frog.

Would you believe that a person could have bees in his belfry and a bug in his bonnet? A student referred to a peepsquick of a professor. He must have been related to Tom, Tom the Peeper's son, who stole a glance and away he run. "The fellow really lashed onto this girl." "The weather was fair to midland."

There are also students who write about little peccadillos (was there ever a big one?); fragrant violations of the law (must be smelly).

Riddles
Riddles involve words, often as puns. Children love them. Here is an old-time riddle which appears in several riddle books: What is the difference between a mouse and a pretty girl? One harms the cheese, and the other charms the he's.

What makes the Tower of Pisa lean? Because it never eats. (I believe, however, that the Tower of Pisa really has the inclination.)

A favorite in my childhood was: What goes up a chimney down but won't go up a chimney up? An umbrella, of course.

I also liked: What is worse than finding a worm in an apple? The answer: finding half a worm.

What word is pronounced wrong, even by the smartest teachers? The word wrong is always pronounced wrong.

What question can never be answered by Yes? Are you asleep?

What is the end of everything? The letter G, of course.

What letter occurs once in every minute, twice in every moment, but not once in a thousand years? The letter M.

Riddles get different answers over the years. What is white and black and read all over? It used to be the newspaper, but now there is a new answer: an embarrassed zebra. Why does a chicken cross the road? "To get on the other side." "For some foul reason." "Because Colonel Sanders was after him."
Why doesn’t a steam locomotive like to sit down? Because it has a tender behind.

What did the hen say when she laid a square egg? “Ouch!”

What has four legs, a back, and you sit on it? A chair? No, a horse.

If your uncle’s sister is not your aunt, what relation is she? Your mother.

If twelve make a dozen, how many make a million? Very, very few.

What has four or more wheels and flies? A garbage wagon.

What kind of fruit is red when it is green? A blackberry.

When is a door not a door? When it’s ajar.

When does a bull act afraid? When it’s been cowed.

Riddles become elaborate: What differences are there among a gardener, a billiard player, a precise man, and a church janitor? The gardener minds his peas; the billiard player minds his cues; the precise man his p’s and q’s; and the church janitor, his keys and pews.

How many animals of each species did Moses take into the Ark? None. Further, Joan of Arc was not Noah’s wife.

What do you call the kind of print that deaf and dumb people read? Clue: It isn’t Braille.

What does canst mean? Many people don’t know.

Is there a word in the English language that contains all the vowels? Unquestionably. Is there one with the letters in order? Facetious, abstemious.

What has a foot at each end and one in the middle? A yardstick.

What do you get when you cross a goat and an owl? A hootenanny.

What did the boy octopus say to the girl octopus? I want to hold your hand, hand, hand, hand, hand, hand, hand, hand.

Policeman: “You’re driving the wrong way on a one-way street. Didn’t you see the arrow?” “I didn’t even see the Indian.”

What’s black and white and has fuzz inside? A police car.

Why didn’t the symphony director get hit by lightning? He was a non-conductor.

Do you know the difference between an elephant and a pound
of butter? You don't? You would be a fine one to send to the grocery store for butter.

Slang

What about studying slang? Do you teach slang in language classes?

Slang is unconventional English and includes some words not yet fully accepted as "good English." Time makes a difference. Today you would not think of the word strenuous as slang, yet in 1601, Ben Jonson attacked it as uncouth and vulgar. Slang is novel, vivid. It plays tricks with words. It attracts attention—both favorable and unfavorable. To describe the appeal of slang in slang terms is the desire to be with it, in the know, up-to-date. Some slang will survive, some will die. Dr. Samuel Johnson in 1765, did not even record the word "slang." He used the word "low" to describe such words.

Some students might make slang dictionaries, asking their parents or grandparents for the meaning of such words as spondulicks, moola, shekels, tin, velvet, dough, boodle, brass, kale, simoleon, cabbage, folding money, the long green, chicken feed, fifty grand. And names of coins such as deemor, queetor, four bits, a fin, nest egg, and hundreds of others. They might have a section on sports, on cars (wheels), on foolish people. They might take a root like head and see how many words they could make out of it: blockhead, dumbhead, cabbage head, bonehead, mush-head, meathead.

Fifty years ago a snappy comeback might be: "Snow again," "I didn't get your drift," or "Sneeze, kid, your brains are dusty."

Here are some of Ludgin's examples of slang: cold feet, wise-crack, blurb, razz, ghostwriter, hardboiled, double-cross, stuffed shirt, haywire, ritzy, scab, scram, highbrow, lowbrow.

Slang comes from many sources—crime lingo, the jargon of special groups, musicians, publishers. Terms die. Many young adults do not now know the term Quisling as a traitor, or prexy as a college president, few have heard of 23 skiddoo. The evolution of slang words is noted by the changes from the word absquatulate, to skeedaddle, to skiddoo, to scram or beat it.
Summary and Conclusions

As we come to the end of this pamphlet, I wonder whether you, the reader, feel that it gives you a map for the road to a more powerful vocabulary. Will you find it enjoyable and rewarding to spend a few minutes a day in improving your vocabulary? Have I convinced you that you can improve your I.Q. and your reading ability by improving your vocabulary? If you are a teacher, have I helped you improve your teaching and learning of words?

I hope your answer is Yes because vocabulary growth—perhaps as much as anything you learn—will help you reach your learning and personal goals.

Indeed one might well claim that the mastery of concepts is a key outcome of all effective instruction. Our vocabulary defines and refines who we are. It tells others what we have experienced both at firsthand and indirectly through abstractions and metaphors. It indicates our ability to make subtle discriminations, to find similarities and differences. In short, it demonstrates whether we are educated persons or at least on the road to a liberal education.

Language is central in our lives, and its development should be central in our schools. Unfortunately, in schools we keep asking: Is my language correct? when we should ask: Is my language effective, alive? In order to “instruct with delight” we must look to our metaphors, study the images to which we give allegiance and devotion, realize the power of language. Ludwig Wittgenstein, the linguistic philosopher, declares, “Language is not only the vehicle of thought; it is also the driver.”

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