IMPROVING ORAL AND WRITTEN COMMUNICATION

by

David M. Keithly, Ph.D.

Adjunct Associate Professor
Embry-Riddle Aeronautical University
College of Continuing Education, Norfolk Center
Recent research indicates that reading and writing ability seem more related than previously thought, that writing ability can be effectively evaluated through analysis of student writing samples, and that analytical abilities should be measured through discussion, questioning and examination of expository writing (Cashin and McKnight, 1986; Kozol, 1985). The common premise of recent linguistic research seems to be that reading and writing are natural extensions of oral language. Reading is a "meaning-getting" process, and writing is a "meaning-giving" process. Comprehension results from the interaction of the mind of the reader and the text; composition results from the interaction of the mind of the writer with his or her language in the production of text (Hall, 1976; Wangberg and Willekens, 1981-82). Still more recently, as linguistic research has continued, the term "whole language approach" has begun to be used to describe an integrated approach to the teaching of communicative skills (Shuy, 1981; Smith, 1982; Tierney and Pearson, 1983). The key purpose of this essay is to sensitize an academic audience to the uses of discussion and questioning in the classroom and to reflect briefly on the development of student writing skills.
PURPOSES OF TEACHER QUESTIONS

A teacher might be able to accomplish most instruction through pedagogical techniques other than questioning. Asking questions, however, is a direct, sensible approach focused on the topic at hand (Hyman, 1982). The following list illustrates some of the purposes teachers have in mind when posing questions:

1. Diagnose a student's degree or level of understanding of a concept or topic.
2. Involve the student, help keep the student alert, and/or provide an opportunity for the student to demonstrate knowledge.
3. Test a student's knowledge and understanding and/or determine the extent to which supplied data can be used to reason and solve problems.
4. Review, restate, and/or summarize fundamental points from previous sessions.
5. Provide a springboard for discussion, stimulate creative imagination, and/or obtain ideas to which class members can react.

Obviously, one question may serve two or more purposes simultaneously. A teacher may not be aware of all of his/her aim in asking a particular question, and the results of the question may not be clear until the responses are analyzed in the context of the lesson. Student thinking is generally concentrated on the context of the teacher's question. Consequently the student is not always aware of its multiple purposes.

Since questioning is an essential teaching tool, it makes sense to use it to best advantage by learning about different types of questions, effective tactics for asking questions, strategies to guide question asking, methods for fielding student responses, and approaches for fielding student questions.

Types of Questioning

The research literature on questioning offers several basic systems for categorizing questions according to the cognitive processes which the questions require the respondent to perform. One very useful system for categorizing questions in the college classroom is the one devised by Rodney P. Riegle (1976). Riegle specifies three main types of questions:

1. Interrogative questions, those requesting information regardless of form.
2. Rhetorical questions, those with an interrogative form but not an interrogative function (i.e., they do not request information).
3. Ambiguous questions, those that are functionally ambiguous (not clear whether they are interrogative or rhetorical) or semantically ambiguous (not clear which of the interrogative subcategories is appropriate).

Using Riegle's categories it is possible to monitor and reflect upon the types of questions a teacher and his/her students ask. For example, a teacher's questions may fall into a narrow range of categories if the instructor is interested in developing in the students the ability to perform a wide range of cognitive processes. Then the instructor will prepare and ask a variety of questions. Suppose a history teacher finds he/she generally asks for causal explanations and only rarely for teleological, functional or chronological explanations. Once aware of this pattern, the teacher can begin to ask noncausal questions aimed at obtaining noncausal explanations.
from the students.

Examination of an instructor's questions may reveal ambiguity in wording or intent. For example, a teacher may tend to elicit different types of explanations, but may phrase questions in such a way that the students do not know what type of response is sought. Suppose the teacher asks: "Why did Argentina invade the Falkland Islands in the spring of 1982?" It is not clear whether the teacher seeks a causal, functional, or chronological explanation of the Argentine action. Specifying the category of question contributes to its effectiveness.

A teacher may be asking a broad range of questions and yet find that student questions are focused almost entirely on obtaining concrete examples of the items under study. This could indicate that students find the teacher's remarks abstract, difficult to understand, or lacking in the specifics they need for comprehension.

Examining student questions might show that students seldom ask about relationships. The instructor may thus need to take time to familiarize students with the variety of possible questions, provide models, and encourage practice so that students learn to broaden their questions during discussion.

Tactics for Questioning

The current literature suggests several tactics which may assist teachers in improving the use of questioning in their teaching (Stauffer, 1970; Hyman, 1982; Napell, 1978).

1. After asking a question, wait for a response. Do not answer the question yourself, repeat it, rephrase it, modify it, or replace it with another question until you have waited at least three to five seconds. Students need time to think about the question and prepare their responses. The research indicates that with a wait-time of three to five seconds, students respond more, increase the length and number of their responses, use complex cognitive processes, and begin to ask more questions. Sometimes when teachers reword questions because they believe that the initial question is unclear, the result is greater student confusion. Students may not know which question they should respond to.

2. Ask only one question at a time. Do not ask a string of questions one after the other in the same utterance. A series of questions tends to confuse students. They may not be able to determine what the teacher is requesting of them. Even if one believes a question to be unclear, one should wait for a response. One may find that students do indeed understand the question. By attempting to clarify, one may change the meaning of the question, thereby adding to the confusion.

3. When student questions are desired, request them explicitly, wait, and then acknowledge student contributions. For example, a teacher may wish to solicit questions about certain material by saying: "Are there any questions or clarifications of points we have raised?" Indicate to students that questions are not a sign of stupidity but rather the manifestation of concern and thought about the topic. One must, of course, be careful not to subtly or even jokingly convey the message that a student is somehow stupid by asking for a clarification or restatement of an idea already raised in class or in the text.

4. Use a variety of probing and
explaining questions. One should ask questions that require different approaches to the topic, such as the causal, functional, or chronological questions specified earlier. One way to begin is to avoid the words "why" and "explain" and to phrase questions with words that give stronger clues about the type of explanation sought. Thus for chronological explanation, instead of asking "Why did we have a depression in the 1930s?" one might consider: "What series of events led up to the stock market crash of 1929 and the high unemployment of the 1930s?"

Strategies for Questioning

Beyond the tactics described above, questions need a strategic context or framework to enhance their meaning. An isolated question does not have the power that the same question has as the culmination of a sequence. For example, consider the first illustrative questions about the Falkland Islands. Suppose the instructor has asked and dealt with the responses to the following questions. "According to Argentina, what is its historic claim to the Falklands?" "What previous attempts did Argentina and Britain make to settle their dispute?" "Who did Argentina believe would support its action?" "What did Argentina believe would be Britain's reaction to the invasion?" Now, suppose one asks, seeking a functional explanation "What function, then, did the invasion serve for Argentina?" This question has impact because it is an outgrowth of the previous four questions. There is synergistic and cumulative effect when the five connected questions are asked together. The students need to consider the responses to the previous questions when they offer their explanation of the Argentine invasion of the Falklands. Their explanation is enhanced by accounting for the data presented in the previous responses. Their cognitive processes are stimulated as they grasp the direction the series of questions is taking.

The best context for a given question is a questioning strategy. A questioning strategy is a carefully planned sequence of major questions designed to achieve a teaching goal. The careful planning eliminates confusing gaps between questions and assures the inclusion of complementary questions that provide helpful insights and variety to the discussion. By planning ahead the instructor can better determine the progression of questions which serve as a model of logical thinking for the students.

Tactics for Fielding Student Responses

Of course, a natural outcome of teacher questioning is student responding. It is important to attend to student responses. The ways in which the instructor fields student responses will influence future responses. Many options are open to the teacher after a student response and there is no pedagogical rule mandating what the teacher is to do. Nevertheless, one should realize that it is helpful to reinforce good responses. Students look to the instructor for guidance and support. If the instructor ignores them or shows virtual indifference, student behavior may be inhibited. Chastised students, and especially those who feel humiliated, may become so angry or fearful that they will refuse to respond in the future.

The goal then is for the instructor to field responses in such a way that the quality
and quantity of future responses are enhanced. The following are several tactics for fielding responses.

1. Praise the student in a strong, positive way for a correct or excellent response. One might use such terms as "excellent answer," "quite correct" or "bingo." These terms differ from the common mild phrases teachers often employ such as "OK" and "alright." Especially when the response is long, the instructor should try to find at least some part that deserves strong praise and then comment on it.

2. Make comments pertinent to the specific student response. For example, suppose that a student has offered an excellent answer to the question "What function did the invasion serve for Argentina?" The instructor might say "That was excellent. You included national political reasons as well as mentioning Argentina's psychological drive to become the South American leader." Such a response gives an excellent rating to the student in an explicit and strong form. It also demonstrates that the instructor has listened to the student's response by supplying comments specific to the student's ideas.

3. Make no comment after each, specific response within a series of responses to a single question: make a general comment after the series of responses is complete. There are at least two good reasons for employing this tactic to field multiple responses. First, the teacher's comments tend to shift the focus of discourse back to the teacher. By nodding or pointing to the next student the instructor keeps the focus on the student response. Second, and more important, if the instructor praises one student immediately, another student is likely to pick up the message that the teacher expects an answer similar to the previous one. The second student may hesitate to take another tack, even though it may be a good one.

It is important that the instructor keep track of the responses in the series so that they can be reinforced at the end. Fielding the responses in this way encourages each student's own particular response. It also helps students to learn that they do not need to have the instructor's comments after each of their responses.

4. Build on the student's response. If the instructor continues to discuss a point after a student response, he/she should try to incorporate the key elements of the response into the discussion. By using the student's response, the instructor shows that he/she values the points made. By referring to the student explicitly by name, the instructor gives credit where credit is due.

5. Avoid the "Yes, but..." reaction. Many instructors use "Yes, but..." or its equivalent when a response is incorrect or at least partly incorrect. The overall impact of these phrases is negative and deceptive even though the instructor's intent may not be. "Yes, but" indicates the response is correct or appropriate with one breath and then takes away the praise with the next breath. Some straightforward alternatives can be recommended.

a. Wait to a count of five with the expectation that another student will volunteer a correct or better response.

b. One might inquire "How did you arrive at that response?"

c. One might say, "You're correct
regarding X, but incorrect regarding Y. Now we need to correct Y so we can get everything correct.

d. Another possibility is: "Thanks. Is there someone else who wants to respond to the question or comment on the response we've already heard?"

These four alternatives are obviously not adequate to fit all cases. Indeed, it is generally difficult to field incorrect or partially incorrect responses because students are sensitive to instructor criticism. Nonetheless, with these four alternatives as examples, an instructor will probably be able to generate others as needed.

Tactics for Fielding Student Questions

Unfortunately, many college teachers are ill at ease when students ask them questions. Having relied too heavily upon lectures, many have simply not learned to field questions. Fielding is in fact a broader concept than responding: responding to a question is but one fielding option. The skill of fielding students questions is vital for an instructor who wants students to think about the topic under study. One result of student thinking is student questioning (Cashin et al., 1976).

If there are few student questions, this is often a bad sign. It usually means students are not attending to the instructor's remarks and not thinking about the topic at hand. Alternatively, students may have reservations about asking questions because they fear they will be put down. It is also possible that students do not wish to ask questions because they believe, rightly or wrongly, that the instructor doesn't want them to ask questions. That is, the instructor somehow discourages students from asking questions. Generally, discouragement is implicit and springs from the negative way an instructor fields student questions.

It is difficult to explain why instructors discourage student questions, but some tentative reasons might be offered. Instructors feel the need to be in control both of the content and procedures in the classroom. They feel pressured to "cover" the established course content. Instructors feel pressured by time and there is never enough of it to cover the material. Thus, they discourage student questions because the questions may lead them away from their material. Instructors also want to appear knowledgeable to their students. Student questions may embarrass the instructor who is unable to respond adequately. In short, instructors fear they may lose control or lose face if students ask questions.

The potential for loss of control as well as loss of face is real. It surely is possible for an instructor to go off track and to appear to lack knowledge. Nonetheless, the fear of this happening is overdrawn and the probability for it to occur is low. The instructor must weigh the advantages gained by permitting and encouraging questions against the need to maintain tight control in order to be sure to cover the material and to appear knowledgeable.

Some tactics for fielding student questions in a positive way are in order. These tactics do not suit all cases, but are simply examples of the options available.

1. Praise the student for asking a question. For example, "Thanks for asking that," or "That is a good question," or "That is an insightful question everyone should consider." These are simple reactions and
yet few instructors reinforce students for asking questions. College students need this reinforcement because their previous experience has usually led them to the conclusion that student questions are not valued.

2. Answer the student's question directly as often as possible. Students ask questions because they legitimately seek a response. They seldom ask questions to be cute or disruptive. Moreover, they want a response from the instructor. One should never play games with the student by asking a question in return or by stalling. By responding directly the instructor indicates the question is worthwhile.

Too often, instructors deflect questions to other students or to the class in general. Students generally want the instructor to respond directly. If the instructor wants to hear first what other students have to say, the "deflecting move" can be prefaced with something like, "After we hear what some other students have to say, then I'll offer my answer also," or "I'll ask Joe to respond specifically since he is versed on this particular topic. If you still want my response when Joe is finished, just let me know." This way, the questioner is informed of the instructor's strategy and does not assume that the question is being avoided or discounted by the deflection to another student.

3. Let the student know if the question leads into a new area. If a student question prompts an instructor to launch into a new topic, the plan should be indicated to the class. For example, "That is an excellent question and deserves further exploration." While this might not always satisfy the student with an immediate and direct response, the instructor does indicate that the question is valued both explicitly through praise and implicitly by involving the respective student in instructional plans.

NURTURING CLASSROOM DISCUSSION

Although learning does take place during a lecture, it is more likely to occur in discussion classes where there is give-and-take (Barnes-McConnell, 1978). Defining or describing good discussion is itself challenging. Here I will use "discussion" to include a variety of instructional approaches with focus on two-way, spoken communication between the teacher and the students as well as among the students themselves.

Strengths of Discussion Approaches

Discussion approaches are well suited to a number of course goals.

* Discussions provide the instructor with feedback about student learning. A serious limitation of the lecture mode is the lack of information about what the students are learning. Discussions overcome this by using both instructor and student questions, student comments, elaborations and explanations. These interactions allow the instructor to plumb the depths of student understanding.

* Discussions are appropriate for higher-order cognitive objectives: application, analysis, synthesis, evaluation. Discussions permit and encourage the student to introduce, explore, and refine ideas in ways which are impossible in a lecture.

* Discussions are appropriate for affective objectives: to help students develop
interests and values, to change attitudes. Discussions can do more than change minds; they can change hearts, the way we feel about an issue and our appreciation of it.

Discussions allow students to become more active participants in the learning process. This increases their motivation to learn and renders learning more interesting.

Problems with Discussion Approaches

As with virtually everything else in life, discussions in the classroom have not only advantages, but disadvantages as well (McKeachie, 1986).

1. It may be difficult to get student participation. First, discussions can be threatening to students. In lectures the student's ignorance can go undiscovered. To participate in a discussion means to run the risk of being both incorrect and being found out. Also, unfortunately, there is often peer pressure not to excel. Further, in some cultures it is considered inappropriate for the individual to stand out.

2. Discussions are more time consuming. The pace might seem slower, and often not much may appear to be happening.

3. Discussions are not well suited to covering significant amounts of content. As instructors, we must wrestle with the issue of how much of the content we cover versus the depth of student learning.

4. Effective discussions require more forethought than do lectures. They are not opportunities for the instructor to take a break. Yet preparation cannot ensure that the discussion will follow the anticipated direction. After a few bad experiences, the instructor may take refuge in the more predictable refuge of lecturing.

5. In discussions the instructor has less control. To some extent we must go where the students' questions and interests take the group. We must allow the students to speak.

Recommendations Regarding Cognition

Here I will venture to offer some recommendations regarding certain aspects of discussion.

1. Define the topic. The topic for discussion should be relatively clear, that is, limited enough to focus the students' attention. "Relevant" discussions rather than abstract or academic ones are much more likely to engage the students. It is desirable to furnish students with the topic a class or two before the discussion in order that they prepare. Often, assigned readings and study questions help.

2. The instructor must be prepared. An effective discussion often requires more preparation than an effective lecture. It is often for this reason that instructors avoid classroom discussions. In a lecture the instructor can decide what he or she will cover. In a discussion one must be prepared to explore any issue reasonably related to the discussion topic. This means one must know the topic very well. It is advisable for an instructor to list possible issues or questions which the students might bring up and to outline possible answers or responses and if necessary, do some more reading or studying.

3. Use a common experience. Discussions are likely to be more focused and therefore more productive if they deal with something the students have all experienced. Choosing something from the
students' "real life" is one tactic. Providing a common experience by means of readings, a film, or slides is another. One must ensure that the students have sufficient information to make the discussion productive--simply sharing ignorance is in no one's best interest. During the discussion the instructor may have to provide additional information if lack of data is hindering or sidetracking the discussion.

4. Acting as a facilitator is the instructor's primary role in a discussion. Most of the content should be covered before the discussion, either in previous lectures, readings, films, slide shows, or other sources. The following tend to be facilitative: listening, posting and verifying, requesting examples or illustrations, encouraging and recognizing students' contributions, providing summaries.

Recommendations Regarding Participation

The following are some suggestions about what one might do to increase student involvement and interaction in discussions.

1. Create the expectation of participation. Arrange the seating so it is easy for everyone to see another, i.e., around a table or with a circle of chairs. The instructor should be part of the group, i.e., not behind a desk, and should make every effort to encourage students to talk.

2. Clarify how participation will influence grades. This should be done early on in the course and clearly.

3. Help the group to clarify its goals. Even if the goals are primarily the instructor's, it is always helpful to make them clear. In more flexible groups where the students have a major voice in determining the goals, such clarification become essential.

4. Keep the group on track. Often this can be accomplished simply by calling attention to the fact that the individual or group is getting off the point.

5. Solicit responses from the "nontalkers." One should be alert to nonverbal cues indicating students have something to say. "Would you like to say something?" or "Let's hear from some of you who haven't said anything yet."

Too many academics tend to conceive of college as primarily, if not exclusively, an intellectual or cognitive experience. Such a conception of the university ignores at least two considerations. First, individual students often bring to college feelings, interests, and values that hinder their learning or understanding of content which we may consider objective. Second, the university is about values, at least values like logical thinking, clear expression, knowing the data or literature, and even appreciating the subject and being responsible for one's own work. At a more profound level, the university is also about what kind of person one aspires to be, what kind of world the students want, and what life is about. Teaching is thus value-laden, and appropriately so. Discussion approaches are well suited to many of these concerns about feelings, interests, and values.

NURTURING WRITING ABILITY

Finally, as part of this aggregate approach to communicative skills and the articulation of ideas, I will offer a few reflections about expository writing. To begin, let there be no mistake about it, research and writing entail demanding work,
even (especially?) for the professional. One will not hear writers and scholars boast about the easiness of their craft. No matter how much they love it, and they often love it more than anything else, they find it demanding, exacting, lonely, and often painful. "Writing at its best," writes Ernest Hemingway, "is a lonely life."

In selecting a term paper topic, one must conduct a search for something worthy of study. The instructor should suggest to students that perhaps something has been puzzling them, or a topic has been inadequately covered in an earlier course or paper assignment. Curiosity is the source of many topics--the urge to understand something better, to resolve a paradox or dilemma. One must ask oneself questions about a research topic. What is the problem? What is the main idea or source of confusion? The writer must always be as clear as possible about what he/she wants to discover, prove or disprove. One should ask in what way do differing schools of thought define the problem differently, and why.

The instructor should expect students not just to describe a problem and raise offhandedly some possible solutions. Students should prepare a list of likely solutions or likely answers to research questions. They should be clear about cause-and-effect relationships. Logical reasoning is, of course, important at this point. Students should want to test, as systematically as possible, the plausible explanations they have raised.

It is essential for the writer to have a map of where he/she is going. No wind is the right wind if one doesn't know where one is headed. If one doesn't know where one is headed, one just might end up there, in fact. The moral is important. In the past you might have sat down and typed out a first draft, throwing together by cutting and pasting odd descriptions and definitions and tagging on a rough conclusion. This is hardly conducive to developing expository skills, however.

The writer should always ask crucial questions. What is the main theme? How clear is my thesis? Have I presented it clearly and forcibly in the first few pages? Will the paper persuade the readers? Have complicated terms and concepts been explained in clear English? Have I brought a freshness to the analysis that both informs and enlightens?

One must write, write, write--then revise, revise, revise. No writer can expect to get the words or flow exactly right on the first try. One must concentrate on writing it down and getting the ideas on paper in any way one can. One must focus on the main ideas and revise afterwards.

In evaluating student writing style, I recommend the personal narrative writing scale developed by C. R. Cooper (Cooper, 1976). Cooper describes the values for syntax like this:

HIGH The sentences are varied in length and structure. The author shows a confident control of sentence structure. The paper reads smoothly from sentence to sentence. There are no run-on sentences or sentence fragments.

MIDDLE The author shows some control of sentence structure and occasionally writes a sentence which is awkward or puzzling. There are almost no run-ons or sentence fragments.
LOW There are many problems with sentence structure. Sentences are short and simple in structure, somewhat childlike and repetitious in their patterns. There are many run-on sentences and fragments. The instructor should not only employ this scale for purposes of evaluating composition, but should explain to students that it is being used and how its is being used.

The most common student writing deficiency is an overly casual approach to the use of words. One should ask oneself: why am I using this word? Is there a more appropriate word? Shorts words, short sentences and short paragraphs are preferable to their opposites. The challenge for the writer is to avoid oversimplification as well as mindless complexification. Carefully selected nouns and verbs seldom need a string of adjectives and adverbs to amplify their meaning. When in doubt, one might consult stylist E. B. White, who advised: "Write with nouns and verbs; do not overwrite; do not overstate; avoid the use of qualifiers; do not explain too much; avoid fancy words; prefer the standard to the offbeat; make sure the reader knows who is speaking."

In the longer run, learning to conduct research and to write well correlate with extensive reading of the best writers and the most carefully executed research projects. One should thus adopt some of the best writers as remote mentors. One should discover why they are so good. How do they outline? How do they marshall evidence? What do they do to simplify, clarify, convince and persuade?
References


