He Who Has an Ear: Reflections on Lecturing to the Impaired

by Theodore Plantinga

During the past few years I have been involved in many discussions and formal meetings about the benefits and drawbacks of introducing new computer-based technologies into university-level education. I have talked with doubters who maintain that the tried-and-true methods of the past have served us well for such a long time that we should be most reluctant to abandon them. There is an effective counterargument, and I have used it often: the new technologies are needed for people who are impaired in terms of the five senses or basic mobility. Because of these technologies, new opportunities have opened before them, opportunities to participate in higher education and other sectors of culture. If the new technologies have the potential to help people who need an extra dose of our loving concern, should we not look upon them with favor? And should we not extend their availability to people with no special needs?

It was reasoning of this sort that first led to me to make computer-based study materials available to students. Not long after I began to use a personal computer for lecture preparation and other such functions, I made it a practice to reproduce parts of my lecture notes as class handouts for students. I also began to make lists of definitions available, along with study tips, bibliographies -- indeed, anything inside my computer that I thought would help the students, especially the ones taking my Introduction to Philosophy course. Once I had properly organized the process of preparing such materials in advance, I saw to it that they were printed in a two-column format, using a fairly small typeface. The package of materials would then sold to the students at the beginning of the term via the college bookstore.

Sometimes a student would complain that the typeface was too small for easy reading. I usually ignored the complaint. But when a staff member responsible for helping students with special needs approached me about my study
materials, I quickly agreed to make the material available in digital form as computer files, so that it could be read using a special computerized reader designed for the visually impaired, or printed in a much larger typeface.

But as I made these provisions for students with special needs, I asked myself why I should not do the same for the rest of the students. In other words: why not let them all have the material in the form of computer files which they could then read and/or style and print as they saw fit? I decided to act on this idea, and so, for some time, my course materials were made available as Word Perfect 5.1 files or as Word for Windows Version 2 files or as files containing straight ASCII text. The students were invited to choose the format that would work best for them. Many then printed the material as they saw fit, adding formatting to suit themselves; some chose to hire someone to print the whole works for them. The latest stage in the distribution of my course materials involves HTML: the students can access and read the files I make available as HTML documents, with hypertext links to definitions, etymological hints, and so forth. They are also given the option of reading and/or printing the same content via an ASCII-only version in which HTML tags and indicators are replaced by text indicators which I call "manulinks."

Recently I was reminded of how the new technologies can help the impaired student. The occasion for this reminder was the continuing discussion of technology in education. As part of this discussion, I have had the opportunity to listen to lectures -- perhaps better called presentations -- in which the new technologies were not just described and recommended but actually used.

Having just sat through another one, it strikes me that such oral presentations resemble the closed captioning feature on today's television sets. People who are hearing-impaired can turn on closed captioning and see the words that are being spoken projected onto the bottom of the screen, somewhat like subtitles in a foreign movie.

Now, this feature is usually billed as intended specifically for the hearing-impaired. Yet, what is made for people with special needs may also benefit people whose hearing is in the normal range. Thus it sometimes happens, when I am seated in my living room watching a movie with my wife, that we turn on closed captioning. Our living room is at the front of the house and picks up some street noise, kitchen noise (if someone is preparing food there) and also noise from the filtering system in our two aquaria. And so we use closed captioning if we feel it will help. (British movies are more likely to sound muffled than movies made in Hollywood.) If we are watching elsewhere in the
house we do not use closed captioning, for only the living room TV set is equipped for it.

Using closed captioning is a lot like watching a foreign movie with subtitles. Now, the foreign film is not my favorite type of movie, even though I greatly appreciate the diversity which foreign movies can add to a viewing diet that is saturated with Hollywood fare. In many cases one must strain to read the subtitles. Sometimes the foreign film will contain such rapid-fire dialogue that it is hard to keep up via subtitles. But in some movies the subtitles are excellent and the pace is such that one has time to attend to visuals while reading subtitles. Watching such movies is a positive pleasure for me.

Once in a while, as an experiment, I turn off the sound altogether and follow the movie via subtitles and visuals alone. It is not a satisfying experience, for there are audio components apart from words which one would not wish to miss. Even so, the sound of the voices is usually significant as well (perhaps even pleasant) and is able to convey feeling to some degree. Indeed, if the language is one of which I have some knowledge, the combination of hearing it spoken while reading the subtitles can be very enjoyable. This I find to be the case with some of the better French movies. If the language is one I can understand with comparative ease, such as German or Dutch, I have little sense of whether I am getting the meaning through what I hear or through what I read on the screen. There are also fine foreign movies made in languages which I have never studied formally but which I have come to appreciate anyway, such as Swedish and Italian. When I watch subtitled movies in these languages, I find myself listening for the words. Occasionally I watch a movie in a foreign language whose words seem like genuine gibberish to me, e.g. Finnish. I then find myself trying to disregard the spoken words while still listening for sound effects and voice tones.

I make a point of these movie-watching experiences because they lead me toward a certain educational conclusion that has a bearing on the current discussions of technology and education, namely, the value of orality in lecture presentations. A little earlier I indicated that some of the "lectures" I now attend as demonstrations of the new presentation technologies seem to add an elaborate version of closed captioning to the stream of words. But whereas closed captioning generally contains a bit less than what is spoken, the slides in the high-tech presentation lecture typically contain more than what is spoken. Thus one listens to the speaker but reads the slides, trying to take in the extra information. It can be a tiring and taxing experience.
Although I am no psychologist and cannot point to careful experiments to back up my conclusion, I do believe that the rather busy presentation style favored by skilled users of the new technologies leads to some distraction and lack of focus. Another TV comparison can help here. I often watch a news broadcast that originates with the BBC, hoping thereby to get a fresh slant on the international scene and also to keep up with British developments. The Canadian news station that shows BBC news sometimes reduces the BBC feed to a window and then adds some news of its own (usually about Canada) in printed form below. I almost invariably find my eye drawn to the printed news below, and as I read it I lose track of what the BBC announcer is saying. Since this is annoying, I decide I will not read the stuff below the window and will instead focus exclusively on the BBC announcer. But the next time I watch such a broadcast, I forget my resolve and find myself reading the Canadian stuff, until I remember that I had decided not to do that. The reason I am instinctively drawn to it is that I seem to assume unconsciously that it represents an enrichment of what the BBC announcer is saying.

Of course I have the option of closing my eyes and just listening to the BBC announcer as though I had a radio before me. Likewise, I can close my eyes during a high-tech presentation lecture and just listen. But if I open my eyes, I am drawn to the screen and the information projected onto it in written form or as graphs or as dynamic visuals. If the oral information is not adeptly synchronized with the visual information, my ability to focus on the speaker's words seems to fade. Yet when I hear an academic paper presented while holding a copy of the paper in my hands, I do not have such difficulties. Perhaps the difference is that one senses that the interesting information projected onto the screen may vanish at any moment, before one has had a chance to absorb it. What is printed on the paper in my hand, of course, is not liable to disappearance.

While I find the "lectures" that draw on presentation software impressive and interesting, I am reluctant to switch to such a lecture style for my own philosophy classes. Four reasons for my reluctance are worth mentioning here.

The first is cost. I am informed that just as adding closed captioning to movies and TV broadcasts costs time and money, so it is time-consuming (and therefore expensive) for professors to duplicate the content of a lecture on a series of slides prepared by computer. I fear that the new "lecture" style is setting a higher standard for presentation; it also seems to make of lecturing a more formal and time-consuming business than it has been traditionally.
Secondly, some spontaneity is lost, and spontaneity is valuable. Although I provide a good deal of outline material to my students when I lecture, I warn them that I may deviate from the order they have before them, or add something that is not in their outline, or skip something. Sometimes I announce that I'll skip over what comes next since they can get it from the study materials. I skip the oralizing step especially with definitions, which I usually do not belabor in class. I ask the students to look at them in advance.

Thirdly, I want the students to take some notes during my classes. I recommend especially that they take down the gist of any story or example that may make an abstract point clear to them. I believe that someone whose eyes and ears are engaged taking in separate streams of roughly equivalent content will have trouble taking notes on a sustained basis. He may also feel less impetus to do so if he is told that the stuff on the screen, which comes from a computer, is available to him. This is roughly the argument against turning one's lectures into finished papers which are then read aloud in class (the literal meaning of "Vorlesung," which is the German word for lecture).

If a professor makes his lectures available in the fullest possible printed or computerized form, the student will be inclined to suppose that he should collect the lecture material and have it available when the next test or the examination comes along. But he might not feel obliged to think about the material in the meantime. Collecting the material is a task he can easily delegate to someone else. (A student may also photocopy the notes of some other student, but this does not mean that he will get around to studying them.) What the student cannot delegate is the hard work of transferring the material to his brain.

Fourthly, because I believe strongly in the power of the spoken word (I am something of a romantic on this subject), I would still like to see students listening intently to what the lecturer says. And if the lecturer is an effective speaker, he will pace his delivery in somewhat the manner of a seasoned actor. Now, I readily admit that this is hardly a description of what happens in my class whenever I am lecturing. Yet I do believe that some of the time, at least, when I am in my best form and students are appropriately motivated, something of this sort occurs.

I base my observations on my experiences as a teacher of philosophy. And philosophy is about ideas more than about information or "facts." It is especially when I appear to be saying something contrary to what students would expect from me that the dramatic can enter the lecture hall. Those moments are precious in a philosophy class. I would not wish to see them
eliminated because the presentation style has grown too "busy," like a three-ring circus where there is more to watch than the eye can take in, with the result that some of the children miss precious antics of the clown because they were watching the bear on the bicycle instead.

This essay is not intended to be a debate. Yet I feel constrained to take on the role of my own opponent at this juncture, by mentioning that there are two objections to the teaching ideal I have just pointed toward. Those objections deserve a response.

The first is that some people are hearing-impaired and cannot respond to the potential of the dramatic in an old-fashioned oral lecture in which the instructor has even *rehearsed* some of his key lines and segments, like an actor preparing for a stage presentation. That there are indeed hearing-impaired people in the ranks of the students is true; the question is whether their presence among us should lead us to abandon the old ideal. It's a bit like the question whether we should have a law that all buses must be wheelchair-accessible. Such a law raises the cost of busing substantially, and many vehicles once used to transport people for a fee then have to be taken out of service. The eventual result is that bus service become more widely accessible *in principle* (in the sense that a greater range of people are able to use it), but *in practice* it gets used less.

My own approach to this issue is practical. Occasionally I have a hearing-impaired student in the class who needs to try to read my lips as I lecture. I then oblige by staying in one place, reducing my gestures, and speaking more directly (less use of irony and other subtleties). I'm not sure whether all the students realize that I am deliberately limiting myself in this way; they are probably much less conscious of the needs of the hearing-impaired student than I am. But if I come to class one day and notice that the hearing-impaired student is absent, I resume my usual lecture style. Thus I am willing to reduce and limit my speaking style, but I don't do actually so unless there is a good reason. And I don't believe that old-fashioned lecturing should be ruled out of order *altogether* simply because there are some students who have great difficulty following it. Likewise, we should not try to eliminate ice skating because there are some people who do not have normal use of their legs and simply cannot engage in it.

The second objection to my teaching ideal as mentioned above (i.e. preference for orality, along with use of the dramatic) has to do with class size. If a class becomes very large, the instructor finds himself decked out with a microphone. He is then less of a performer for the students in the farthest reaches of his classroom, to say nothing about those who may be watching him somewhere in
an overflow facility. Many actors like a reasonably small and intimate theater space in which to perform, feeling that they cannot project effectively into a huge auditorium. Most lecturers feel the same way about the dramatic element they may seek to inject into their lectures. Now, it happens that I am not called on to teach extremely large classes, and so I never face this issue in my own teaching at Redeemer College. Hence I do not accept this second objection as a principled reason why I should eliminate the dramatic from my class presentations and instead add "captioning" to reinforce my oral presentation with a stream of printed words and stimulating visuals.

Now that I have stated my preferences in terms of teaching, I should consider the opposite possibility, namely, the classroom as a multi-modal paradise, with all sorts of special aids for special people. For one thing, we could help the hearing impaired by providing someone in every class who reproduces the lecture in sign language. Secondly, we could add simultaneous translation facilities for some students from other parts of the world, e.g. Spanish for those who hail from Central or South America. (Of course Brazilians would need Portuguese.) The instructor could have an assistant to project the content of his lecture onto a screen in the form of striking visuals, decked out with graphs, the occasional cartoon character to add humor, and here and there a movie clip (not forgetting to secure permission first). The lecture itself could be read off a teleprompter by the instructor, as though he were a politician delivering a speech at a major convention. Perhaps his delivery would be improved thereby. Naturally, the stream of words on the teleprompter could also be projected somewhere for people to read if they have a mind to do so. And if the instructor fell ill, his understudy could presumably be trusted to perform a dramatic reading of the lines on the teleprompter.

Would this rich and expensive teaching environment be the ideal? Not to me: I still prefer simplicity in this regard. And my reason is not just financial, although cost is by no means a factor to be shrugged off. I would like to feel that I am competent to address the students directly, without needing to depend on any technology whatsoever -- not even a microphone.

Unless we assert such competence, we will eventually begin to feel that we cannot instruct one student or two in the office without making technology-based preparations first. Just as an early-morning visitor to our home may catch us not yet dressed for the day and therefore will need to cool his heels while we prepare to receive him, so the student who drops by our office may find us unprepared to speak with him; we would first need to prepare something in the computer to fill out what we wish to say to him. I, for one, would not like to be captive to technology to such an extent as this.
In the back of my mind there is a lifelong model as to what oral presentation can be -- the preached Word. I find it significant that although some churches have introduced technology-dependent oral presentations in the place of traditional sermons, a great many, including the one I attend each Sunday, have not. Traditional oratory is still prized in churches like my own. And I believe there is an element of preaching, or traditional oratory, in at least some university-level teaching, including philosophy classes.

There is a place for passion, for the demonstration of conviction, in our teaching. Especially when information sources become more and more plentiful, with the result that the lecturer gets fewer inquiries of a strictly factual nature, the role of the teacher as advocate, as the one who embodies a passion for the subject-matter and for the issues, continues toloom large. I want to be such a teacher -- at least part of the time. And so I want to avoid distractions that will keep me from such teaching.

In conclusion I will grant freely that it is especially the Christian teacher who will want to include some passion, some advocacy, some preaching, in his teaching. But there are also university lecturers who believe that religiously-grounded presuppositions need to remain buried or even be eliminated altogether. In the teaching of such lecturers we will presumably not see the desire to function as advocate or as preacher. For such lecturers, a "busy" presentation environment in which students let their attention wander from one item to another, as though they were engaged in "postmodern" reading, may seem normal. For my part, I want the undivided attention of my students -- at least for part of the time they are in my class.

There is a place for Kierkegaardian intensity in philosophy. Can a technology create or deliver such intensity for us at the flick of a switch? I think not. Indeed, I hope not.