CHAPTER 2

IMPACT OF TECHNOLOGY ON MEDICAL PRACTICE

DR. SPIRO: Technology raises a lot of questions. Social utility and cost containment are going to be big issues for doctors in the 1980's and we should discuss them more seriously and more frequently.

I proceed from the assumption that the new technology is very helpful to the clinician and that the technological advances of the past few years have made our jobs as clinicians easier. How we use this new technology and how we physicians view our task is what really needs changing. The physician has to adapt his habits to the realities and benefits of technological advances. To some extent all of us physicians in our compulsive ways perpetuate habits which were once important when physicians were not as generally well trained as they are today and when technology was little more than the stethoscope.

DR. TISDALE: Dr. Spiro mentioned the importance of cost containment in medical practice, and I would like to refer to a way of reducing cost by the use of allied health professionals for tasks formerly performed only by highly paid physicians.

Dr. Weed at Vermont, over a 10 year period using the problem oriented record in the department of medicine plus the two year study under the NCHSR on a computerized ward, has shown that if one takes a problem-oriented approach to care and then audits the problem-oriented approach and these problems range from

social issues to domestic issues to technical issues to medical issues, one can break problems into tasks or goal achievements. It is becoming more and more obvious that a second year student who performs a given stage of data collection and history taking or an LPN who does the very same thing with a computer terminal, if that job is audited and has been done well, it is very hard to argue that a physician doing the same job should get four times the amount of money.

DR. WOLF: Dr. Tisdale, you have the data and I have the bias, but I would guess that this computerized history taken by a paramedic is a very primitive kind of history and not the detective work that turns up crucial information while talking to a patient. Is there the application of knowledge, experience and insight into pathophysiology required in a shrewd and skillful exploration? If that function can be accomplished as well by an LPN as by someone who has a medical education, how much clearer it is that many of the technological procedures can be done by trained assistants as Dr. Spiro suggested. If physicians are needed only to sign the forms, we are wasting enormous amounts of money on medical education. In my view, the one thing that only a physician can do with requisite skill and incisiveness is talking with the patient, taking a history, pursuing leads and bringing the data together to conclude a penetrating exploration. If you have reliable data to the contrary it is something of spectacular interest and of very vast importance.

DR. TISDALE: All I can say is that a symptom, whether it is a burning epigastric pain or a headache has certain dimensions such as onset, duration, "relieved by," provoked by, associated with, etc. If you have an information retrieval system that addresses all these the recorded data can be clearly precise and accurate. This is not interpretation, this is recording what the person says to you. I would submit that about 90 percent of the clinical data could be captured in this way. The interpretation is then left to the consultant.

I would like to emphasize that the computer system is a single basic history recording, one which can then be