

Anesthetic Records

Lessons about Ethics and Education

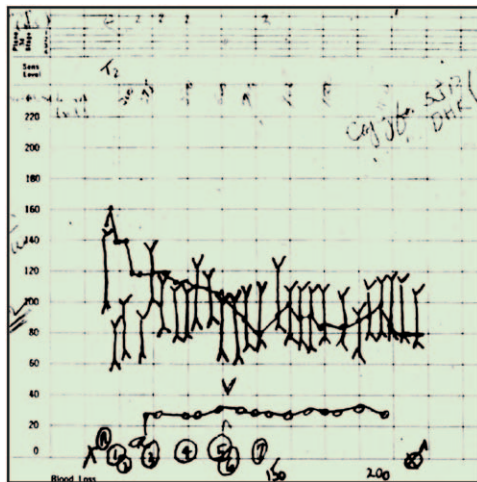
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JOHNSTONE and Fleisher's¹ special article, "A 1966 Anesthetic of Robert D Dripps, MD," published in this issue of *ANESTHESIOLOGY*, highlights two important messages. The first emphasizes the distinction between ethical patient care and ethical human physiologic experimentation. Anesthetic records document planned therapeutic actions that result in physiologic alteration. Since the clinician never knows prospectively whether the patient's physiologic responses will be typical or idiosyncratic, every anesthetic has some aspects of a physiologic experiment captured on the anesthetic record.

Dripps² characterized anesthetics as experiments and was criticized by colleagues about this viewpoint. Dripps' thinking evolved as he recognized that experimentation was the planned nontherapeutic exposure of the patient to a planned protocol. Thankfully, Dripps clarified his views and became an advocate for both informed consent for anesthesia patient care and the ethical principles outlined in the Declaration of Helsinki³ when conducting human experimentation.

Is there another important message embedded in this account of Dripps' recording of his clinical actions? Absolutely! It is the lesson about the importance of the anesthetic record's accurate documentation of the patient's physiology for the educational value that accrues from this charting.

The anesthetic record is the contemporaneous cataloging of the events of the care of the patient. It is the permanent recording of these events. It serves as a lasting story of the anesthetic and how care elicited physiologic responses from a particular patient. The anesthetic record is a "page in the clinician's textbook," and upon it, he/she writes the unique story of one patient's care. In an analogous fashion to Sanders⁴ enlightening book, "Every Patient Tells a Story," the anesthetic record is the anesthesiologist's data



"The anesthesia record from each patient encounter becomes the information from which a real problem-based lesson can be derived."

I was appropriately preoccupied with caring for the patient and therefore unable to continuously record the precise physiologic parameters, noting them from memory, which was often somewhat forgetful, tending to average the highs and lows, an unintended consequence. Those, somewhat "made-up," records did not provide complete and accurate information from which to learn. It is wonderful that today's monitors can collect and store data so that even a handwritten record can be completed at a later time with actual time-accurate data rather than remembered and inadvertently "smoothed" data.

There is an unintended consequence of the use of modern-day electronic anesthetic records that focus primarily on data collection. Clinicians may be preoccupied with checking off all of the boxes that guarantee compliance with regulatory and reimbursement requirements and may be less attuned to noting the important spontaneously recognized observations and "aha" moments the way Dripps did.

from which a diagnosis is made and prescription (anesthetic) is devised.

The anesthetic record is the faithful compilation, handwritten or electronic, of the events of the perianesthetic care, including every patient's preanesthetic status. This enables essential preanesthetic planning. If we are ever to know whether a class of patients was treated in optimal ways, we must collect all perianesthetic information to improve anesthetic processes and minimize unwanted outcomes. The anesthetic record's accurate data collection of the observed patient responses is critical for such "quality improvement education" from data mined from records of large numbers of anesthetics.

When I began residency, my handwritten anesthesia records had gaps. Gaps in recording accurate data were inevitable because

Image: Courtesy of West Virginia University School of Medicine, Department of Anesthesiology.

Corresponding article on page 1218. This article has an audio podcast.

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Handwritten records with notes added like those by Dripps and electronic records with faithful attention to adding free-text notes remain critically important as a way for the astute clinician to document a thought that might offer insight into better care of patients. These notations are particularly important for the care of the individual patient who must be reanesthetized, so similar future responses can be managed with guidance from previous noted observations. Through study of the complete anesthetic record, with data and notations, we can more accurately learn from all that took place rather than surmise what might have been occurring.

The anesthetic record is the lasting reference to which the student of anesthesiology can and must refer to learn how patients are affected, positively and negatively, by anesthetic manipulations. Each anesthetic record is a page in the quintessential textbook of anesthesiology. Each record is the documentation of the observed educational lessons of the patient care and not the listing of the experiments that took place during that patient-centered encounter. Johnstone and Fleisher intuitively recognized this when they cited Dripps' writing, which I paraphrase here to emphasize the education focus:

Each administration of an anesthetic is an [educational lesson]. The patient's reaction cannot be known in advance. The clinician [observes and documents each] drug, dosage and technique ... He keeps record of the [patient's responses] and can, if he wishes, analyze the results [to learn from them for future patient benefit] ... The opportunity is there for the dedicated ... I ask for more of [an analytic educational] attitude [by debriefing each anesthetic record] in the practice of the specialty of anesthesiology.²

As a medical student, my physiology and pharmacology laboratory exercises included "animal experiments." We got caught up in the excitement of successfully anesthetizing a dog or cat, establishing the invasive vascular monitoring lines and collecting the data to see the change in blood pressure or heart rate when we administered any one of a multitude of medications possible for our exploration. The real benefit from these "wet labs," however, was not the ability to successfully anesthetize and monitor the animal. The great benefit accrued from our ability to pore over the paper recording of what changed with the physiologic parameters to understand what happened to the animal "patient." This analysis could even be done at a later date, at our leisure and repeatedly for emphasis, without diversion of our attention as we continued to care for the animal.

Fortunately, we no longer subject animals to such experiments just so we can learn. The same educational principles and benefits, however, still exist, in the "best modern-day wet labs," the operating room, labor and delivery unit, intensive care unit, pain clinic, and all other venues where anesthesia patient care is provided AND data are collected and notations written on an anesthetic record, generated for documentation of current care, and available for our future scrutiny from which to learn. Other educational modalities, such a simulation, offer hands-on practice in no risk settings and facilitate invaluable learning. Simulation, however, employs the mimicked patient who cannot display all that a real patient can when subjected to real treatment. Simulation is time consuming, is labor and resource intensive, and does not always include a written record of the data from which continued review and learning will take place.

Clinical anesthesiology is a patient-focused, problem-based management. The educational message of Johnstone and Fleisher's review of Dripps anesthesia records is crystal clear. The anesthesia record from each patient encounter becomes the information from which a real problem-based lesson can be derived. All students of anesthesiology can learn and "experience" caring for all types of patients by dissecting the systematically collected data and notes of anesthesia records.

Competing Interests

The author is not supported by, nor maintains any financial interest in, any commercial activity that may be associated with the topic of this article.

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