## Letters to the Editor

I was very interested in your article entitled "Fallacies in the Signs of Death" by Dr. J. F. Burton, which appeared in the *Journal of Forensic Sciences* in Vol. 19, No. 3, July 1974, pp. 529-534.

In this article the author draws attention to the fallacy that rigor mortis spreads through the body from head to foot and he made the point that, in effect, its presence will depend on the size of the muscle mass involved.

For the latter statement, he cited the authority of Spitz and Fisher's book, *Medicolegal Investigation of Death*, on p. 14. No such support for this statement is to be found on p. 14. There is a reference on p. 13 to the claim that the shorter muscle fibers, as in the jaw and neck, develop rigidity sooner than the longer muscle fibers. This, of course, is irrelevant to the development of rigor in the temporomandibular joints.

This is, moreover, an inaccurate and inadequate statement of the position first described by H. A. Shapiro in his paper "Rigor Mortis," which appeared in the *British Medical Journal*, Vol. 2, June 1950, p. 304.

I am sure you would like to have the reference to this paper, as you would, no doubt, wish there to be a reference to a primary source when next there is a discussion of muscle mass in relation to fixation of joints in rigor mortis.

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## Author's Reply

I stated in the original article that there may be occasional objections and disagreements regarding certain facets, but nobody could give the time of an unwitnessed death by use of the signs of death in a court of law.

Prior to 1950, references in pathology mention the signs of death varying according to when the body was found, which in most cases was later than two or three days and yielded nothing scientific. Since that time, I have checked 45 references on this subject, all of which said essentially the same thing, give or take a few hours. In this situation, each contributor was content with his own view. All of them were correct—each in his own right.

Of all of the references reviewed, some of which included everything from religion to witchcraft, only 20 of the most applicable of those, old and recent, were chosen to represent a recent picture of the subject. The article by H. A. Shapiro, "Rigor Mortis," was not chosen as a source from this country. However, I am unmoved by the probable content of this treatise as to the fixation of joints in muscle mass, after having read so many references on this particular subject since 1950. Nevertheless, of the many references on this subject, without doubt this one source would not shed any new light on our present-day operation, especially in the courts, where a "yes" or "no" answer is required.

As for the additional comment on the Spitz and Fisher book, I am unable to understand Professor Gordon's conclusion. At any rate, again, it would mean nothing in a court of law in this country and possibly many others.

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