Authors' Response

Sir:

One of the goals of our study was to stimulate a dialogue about the use of therapeutic complication (TC) and the importance of tracking deaths due to medical complications. We thank Drs. Hanzlick, Hunsaker, and Davis for their participation in this discussion. They raise important points about the global implications and requirements of establishing a new manner of death (MOD). We adopt a more parochial view, in the sense that for medical examiners and coroners, death investigation is local. The TC approach works well in New York City. Just as with the cause of death (COD), the certifier of death should understand the needs of the Registrar but one must not certify deaths purely to satisfy statistical needs. The paramount issue, not to be obfuscated by discussions of statistical reporting systems, is the quality of medical practice. If forensic death certification is improved by the TC option, other considerations are subordinate.

Professional judgment will always be needed to distinguish a medical accident from a TC or a natural death. We have found, however, that the addition of TC helps maintain a greater consistency with these deaths. Without the TC manner as an option, the medical examiner must decide between accident and natural. As is frequently demonstrated on listservs and at meetings, there are often disparate viewpoints on deaths from medical complications. Adhering to the definition that a natural death is caused exclusively (100%) by disease, we believe that a death related to medical injury should not be certified as natural. Therefore, without the TC option, all therapy-related deaths would have to be accidents, a needlessly inflammatory practice. We believe it important for the healthcare community to know how many of these fatalities are truly accidents as opposed to known complications of proper therapy. Without the TC option, complications of proper and improper treatment are lumped into the same group.

Hanzlick et al. comment that "if a death due to therapy is certified as an accident, the certifier needs to be sure the complication of therapy is reported in the cause-of-death statement and/or in the 'Describe how injury occurred' box." This parallels our explanation of the three components of a proper TC death certificate: the complication, the therapy, and the underlying disease. Hanzlick et al. express a concern that finding therapy-related deaths in our system would necessitate searching the COD, MOD, and "how injury occurred" box. Searching the COD statement would suffice because all TC (and medical accidents) would have the foregoing components.

The use of the TC option simplifies the identification of these deaths. Currently, without the TC option, one would have to search

both the natural and accidental deaths to find all of these medical complications. In addition, if only a proximate cause is listed, one may miss medical complications in these searches. With the current system, medical complication deaths are missed even if the COD, MOD, and "describe how injury occurred" information is examined. If a death certificate states "complications of atherosclerotic cardiovascular disease," one must look at the autopsy report or medical records to find out what the complication was. It could be a ruptured myocardial infarct (natural) or a stroke following elective coronary angioplasty (TC). Our proposal of listing the three components in the COD statement of a TC along with the specific TC manner would ensure that these deaths could be clearly identified by local Registrars. What the Registrars want to do with this healthcare information is ultimately up to them.

We disagree with their notion of the need for intent (or external causes) as a reason that TC could be questioned or an unacceptable MOD. The only MOD that requires the element of intent is suicide (i.e., intentional self-destruction). Intent is unrelated to determinations of homicide and accident. Medical accidents (typically inadvertent) also do not have an intent of injury. Both TC and accidents are caused by external factors. In fact, we would not certify a death as TC but for the external cause of the medical treatment resulting in the death (the so-called "but for test").

Hanzlick et al. suggest a strategy to stretch the standard death certificate to cover TC by using the natural MOD in combination with listing the medical injury in the section entitled "describe how injury occurred." Such a suggestion is inherently contradictory; natural deaths are caused exclusively by disease, so an injury (medical or others) cannot have been a contributory factor.

We all agree that these deaths are important to track and that there are deficiencies in the current state of reporting medical complication deaths. One other factor that was not addressed is the primary audience of the typical medical examiner, i.e., the family of the decedent. By clearly stating on the death certificate that the result was a TC, we can be sure the family understands that the death would not have occurred without the therapy. If this is done by creating a new MOD or incorporating TC into the COD statement, the family of the decedent is properly served. Telling it as it is enhances our credibility and is good government.

James R. Gill, M.D.; Lara B. Goldfeder, M.D.; and Charles S. Hirsch, M.D. New York City Office of Chief Medical Examiner and Department of Forensic Medicine New York University School of Medicine New York, NY E-mail: jgill@ocme.nyc.gov