Editorial

Iranian National Fracture Registry

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Background

One of the most important causes of disability and death in developing countries is trauma-related injuries and motor vehicle accidents. In 2016, the World Health Organization (WHO) reported approximately 15,932 road traffic deaths in Iran, with the motorcyclist and pedestrian injuries being the leading causes (1). Therefore, all trauma information must be acquired first and ultimately interpreted and analyzed to improve decision management and macro policy making. In the United States, as an increasing need, trauma specialists and medical services developed a trauma registry. Primarily, their effort was focused on the evaluation of trauma care in patients and trauma wards. The secondary goal was the utilization of documented data as a source of health surveillance. In recent decades, modern registry systems were developed based on electronic data collection and use of information technology, and had successfully recorded data in primary high-turnover trauma centers (2).

Nowadays, there are established registry systems in developed countries such as Swedish Fracture Register (SFR), Norwegian Hip Fracture Register (NHFR), Danish Fracture Database (DFDB), Registries of the German Society for Orthopedics and Trauma, among others (3). In developing countries, on the other hand, the trauma registry and its importance are still unknown to a great number of orthopedic and general surgeons (4). The lack of general guidelines for designing registry systems in these countries leads to various data collection systems adjusted based on local requirements in each trauma center. Another obstacle for establishing a trauma registry is the constant need for maintenance by well-trained personnel, and at the beginning of the project, it may affect the treatment of the patient. So, collecting only the most important variables is a financially critical issue, especially in high-turnover trauma centers (5). For this purpose, usually the following parameters are obtained: demographic data, pre-hospital data and care, diagnosis based on International Classification of Diseases (ICD) codes, and performed surgeries/procedures (6).

The vast majority of collected data in trauma patients can provide valuable medical, economic, and social information to guide the healthcare system for policy making and creation of practical prevention programs to decrease the burden of trauma-related injuries. Moreover, utilizing trauma registry data to compare with the existing international data in trauma care is another advantage. Analyzing the trauma mechanism based on the registered data is the first step to identify the cause of injury, and to implement a local or national trauma prevention program. Over the years, registered data will elucidate the cause of morbidity and mortality, helping the healthcare system to reprogram its policies. Therefore, the establishment of a national trauma registry system is an important issue for the healthcare system.

Conflict of Interest

The authors declare no conflict of interest in this study.

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