

Proposal of a Surgical Security Checklist in Podiatric Surgery

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Abstract

The authors propose a surgical security check-list adapted to the podiatric surgery. This check-list is based on the Surgical Security Checklist proposed by the World Health Organization. The proposed document contains 18 items divided into two groups: those which are checked before the surgery and those which must be verified after it, before the patient leaves the operating room. The checklist is characterized as being an easy-to-use tool, it requires a short time and permits to systematically increase the patient safety. The authors think that the result is a checklist that is easy to fill and that improves the patient safety in the podiatric surgery.

Keywords: Surgical checklist; Podiatric surgery; Podiatric patient safety

Introduction

Patient safety is a recurrent matter in recent years. Health care can cause damages; there are several authors that have already anticipated it before. Since the time of Hippocrates (5th century BC , 460 BC) with “primum non nocere” to Florence Nightingale (1820-1910) who argued the following: “ It may seem surprising that the first thing you need to ask in a hospital is to not been harmed “. In the 90s Leape et al. confirmed in a study that two thirds of the adverse effects were avoidable [1]. In 1998 the Institute of Medicine demonstrated that in the U.S. there were between 44,000 and 98,000 preventable deaths. Such statistics produced greater concern among health professionals and political organizations; this led to an increase in the performance of this kind of studies in order to improve the patient safety in Health Care. According to most studies the leading causes of the increase in adverse events [2-4] are: the use of drugs, nosocomial infection and complications in surgery.

Being the perioperative surgical complication rate in the industrialized countries from 0.4 to 0.8% and the major complications rate 3-17% [2,4]. In industrialized countries, nearly half of all adverse events are related to the surgery [5], most of them are preventable.

In 2007 the World Alliance for Patient Safety launched the Global Challenge “Safe Surgery Saves Lives” and focused on four areas: the prevention of surgical wound infections, the safe anesthesia, the safe surgical equipment and the measuring of surgical services. In 2008 the “Surgical security checklist” was launched as a simple and easy-to-use tool that ensures the patient safety. This was spread worldwide thanks to the fact that it has properties of simplicity, generalized applicability and mediation [5].

The effectiveness of the surgical security checklist is demonstrated [6-8]. The document presented in attachment emerges from the need of adapting the checklist to the podiatric peculiarities [9-11] and more specifically to the podiatric clinic area at the University of Sevilla. The specific characteristics of this podiatric field are the following: it concerns a private nature and an outpatient basis, therefore it makes difficult the preoperative control and any possible postoperative complication. We use local or loco regional anesthesia in most interventions.

We know that the performance of the professional activity predominates in the examination rooms or private centers; although increasingly more often surgery is performed in concerted hospitals and with the support of an anesthesiologist who uses a type of spinal

anesthesia or sedation. The numbers of participants that intervene in the surgical procedure depend on each professional and each center. These kinds of characteristics require an adaptation of the Surgical Safety checklist proposed by the World Alliance for Patient Safety for podiatric surgery. The aim of this work is a proposal of a checklist that has been adapted to the specific field of podiatric surgery.

Method

The proposed document contains 18 items that must be verified by the professionals involved in the surgical procedure. These items should be checked before and after the surgery, before the patient leaves the operating room (Table 1).

The checklist for podiatric surgery was designed to be completed by a person trained in patient safety. This person is responsible for the checklist and has the authority to stop the procedure if any of the items is not checked properly.

After checking the list, the person responsible for the checklist and the podiatrist surgeon must sign the document that will be attached to the patient’s medical history.

Discussion

Nowadays the need of a quality health care is not questioned; it should include strategies to ensure the safety of patients. There are many studies about the implementation of the Surgical Safety Checklist in Health Sciences, Medicine and Nursing, mostly in public and private hospital setting, and also in other disciplines such as Dentistry [11].

The checklist of podiatric surgical safety is an easy-to-use tool which does not require much time for its implementation. It entails no procedure that currently we do not make at any podiatric surgery; it is only a verification of what we already do. It offers a systematic and

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Verbal checking of the patient's identity.
Verification of the type of procedure being performed.
Verification of the area or place where it will be developed.
Verification of document fulfillment for surgery. It is important to note that the patient has understood and completed the consent and the authorization.
Verification by the staff in charge of the checklist that the pulse oximeter is placed and is running.
Verifying of the correct identification of the surgical site.
Verification of the forecast by the surgical team of a possible risk of urgency.
Verification and confirmation of the permeability of a peripheral line or on the contrary if it is not needed.
Verification by the OR team of the known allergies of the patient.
Verification of the medication that the patient is currently taking.
Verification of the need of antibiotic prophylaxis and/or anti-thrombotic.
Verification with the surgical team checking anesthetic safety.
Verification of the sterility markers and the relevant instruments.
Verification of the display of radiological diagnostic images tems to evaluate before leaving the operating room and after the end of surgery
Verification of the possible incidents that can occur during the surgical procedure in the Medical Record.
Verification of the registration of the performed procedure and continued postoperative care.
Verification of the delivery to the patient of the sheet with the postoperative recommendations and postoperative medication.
Verification of the correct identification of biological samples if applicable.

Table 1: Items to verify all the checklist of the Podiatric Surgery. Items to evaluate before the local anesthesia.

orderly way to check elements in order to increase the safety of our patients, and avoid mistakes. In our opinion the fulfillment of the surgical security checklist and its inclusion in the medical history of the podiatric patient is an important endorsement from the legal point of view, since it avoids legal claims and it takes into account the medical-legal nature of the medical history.

The proposed checklist is adapted to be used in the area of Podiatric clinical area at the University of Seville. Unlike the proposal of the World Alliance for Patient Safety our checklist is made in two different moments by the same person. Another aspect that we should take into account is the nature of outpatient podiatric surgery, which makes us pay more attention, if possible, and the importance of the preoperative and postoperative care instructions before leaving our facility. The use of local anesthesia offers a great advantage in podiatric surgery and in the postoperative period. Before the patient leaves the center, it must be verified that the patient is clinically fine and that he has understood the postoperative instructions, and also what to do in case of complications. At the end of the process, the list must be signed by the podiatrist and the person responsible for completing it. Both must verify is completed before signing the Checklist.

The effectiveness of the checklist has been recognized by other authors in the prevention of surgical complications. Takala stated in his study that the list takes into account the security aspects [12], which facilitates its recall and application. Verdaasdonk notes that the standardization of surgical procedures facilitates the implementation of care protocols instead of relying only on the memory; the result is that less errors [13] are made, and both indicate that the incorporation of this tool in clinical practice improves morbidity caused by the occurrence of surgical complications [14-16].

The checklist of podiatric surgical safety is very useful to prevent complications. On the one hand, it aids to include scientific evidence in clinical practice; this increases the number of barriers to the identification and reduction of complications of surgical practice. On the other hand, it is based on sequential checks of concrete actions that help to improve the memory and the perception of potential welfare risks. Finally it generates a culture of safety among the involved professional, encouraged teamwork and monitoring errors.

Conclusion

Checklist of Podiatric Surgery Surgical Safety is a useful and valid tool that improves the patient safety standards in the area Podiatric Clinic of the University of Seville. We believe that if we investigate more about this research area; it can bring significant advances to the profession and also it will help to propose improvements in healthcare quality in Podiatry.

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