

The World Health Organization (WHO) Surgical Safety Checklist Frequently Asked Questions

Why should we use a checklist?

Many facilities do most of the safety steps listed on the WHO Surgical Safety Checklist most of the time. Yet we have found that in most places there are opportunities for improvement in consistency. In evaluating the checklist, facilities from around the world thought they were performing all these safety checks but missed one or more with shocking frequency. The checklist helps ensure that important safety steps are followed for each and every operation.

What is the evidence to support using the WHO Surgical Safety Checklist?

According to an article published in the January 14, 2009 online edition of the [*New England Journal of Medicine*](#), a WHO study that included hospitals in eight cities around the globe successfully demonstrated that use of the Checklist during major operations can lower the incidence of deaths and complications by more than one third. Even more dramatically, inpatient deaths following major operations fell by more than 40 percent with implementation of the checklist.

How can I use the WHO Surgical Safety Checklist and meet the Joint Commission Universal Protocol requirements for 2009?

Your organization might consider using the version of the Checklist the WHO team adapted for use in the US (found on the IHI.org website) that includes some common elements, such as SCIP. For the most part, the US version aligns with the Joint Commission Universal Protocol. There are two differences to note:

1. The Joint Commission Universal Protocol includes documents, blood products, implants and special equipment in the pre-op verification. These are not noted on the WHO Checklist. They could, however, substitute for or be added to the item for pulse oximeter. (Please consult the detailed instructions that accompany the US Checklist for details.)
2. The Joint Commission Universal Protocol applies to non-surgical procedures that do not involve anesthesia, such as central line insertion. The WHO Checklist is designed for surgical procedures in the operating room and, thus, might not be the appropriate tool for those other procedures; however, a few items might be extrapolated to a smaller checklist you could create for such instances.

The WHO Surgical Safety Checklist was designed as a tool to improve communication and the items included are considered the most widely applicable in all surgical settings (not just those in the US). For more details on use of the Checklist and the Universal Protocols, read the [Joint Commission February 2009 newsletter](#).

How do I know whether the checklist we already use meets the goals of the WHO Surgical Safety Checklist?

Conduct a small test. Print out the WHO Checklist, take it to the OR to follow one case, and note the following:

- 1) Does the entire team stop all other activity for a few moments at three critical points, i.e., pre-anesthesia, pre-incision and before the patient leaves the OR? The goal is for the entire team to participate in each pause. (The surgeon may not have to be present for the pre-anesthesia check.)
- 2) Does the entire team verbally confirm each item on the WHO Checklist? The goal is for the entire team to participate. At a minimum, every item on the WHO Checklist should be confirmed. Other items may also be addressed.

- 3) Are the items verified without reliance on memory? The goal is to use a tool for reference to ensure every item is covered, e.g., a form, poster, or computer screen.

If you can answer “yes” to all of these questions, then the spirit of the WHO Checklist is being met. Consider running through this exercise with several more cases to see if this occurs with every patient every time. If not, redesign your processes to ensure this occurs.

Improving teamwork and communication is one of the main goals for using a checklist. Many hospitals in the US are already doing most of the items on the list but not reviewing them as a team. If there is no designated point when these items are reviewed, it is common to find that they are verified *most* of the time, but not *every* time, i.e., not reliably. The results of the WHO pilot study appear to confirm the conclusions of a number of earlier studies that indicate preoperative team introductions and briefings and postoperative debriefings contribute to improved processes and outcomes.

Our surgical teams don’t want to use the WHO Surgical Safety Checklist unless they can change a few of the elements. Is it okay to make changes to the Checklist?

The WHO team that developed the Checklist recommends and encourages modifications for local use. The Checklist template adapted for the US is designed to allow adjustments while retaining the headers and the WHO logo.

The Checklist, while intended to be universally applicable, is not always a perfect fit for all institutions. Modifications can be made to include items that are deemed essential. However, please avoid making the checklist too comprehensive. The more items added to it, the more difficult it will be to successfully implement.

Please refer to the [Starter Kit for Implementing the Surgical Safety Checklist](#) and the [Guidelines for making modifications to the WHO Surgical Safety Checklist](#) on the IHI.org website for recommendations on adapting the Checklist.

My team often stays together for the whole day. Must we introduce ourselves before every surgery?

The most critical time for introductions is at the beginning of an operative day. There is no need to repeat introductions if they have already been made. However, if new members join a room, they should introduce themselves as should every member of the team present. Even if everyone knows each other, introductions are important as they serve to reinforce team communication (and can help avoid embarrassment at having to ask someone’s name with whom one has been working for a prolonged period of time!).

My facility is quite large with many operating rooms. How can I implement a checklist in this environment?

The key to successful implementation is to start small. Start with a single operating room on one day and see how it works. This will guide you to strategies for altering the checklist to fit your needs, as well as identify potential barriers to adaptation.

Our budget is very tight. How can we implement the checklist?

Using the checklist requires minimal resource commitments. Reproduction and distribution of the checklist is the main financial cost. There is some need for personnel commitment at the beginning, but once the checklist has spread it should sustain itself.

How much does it cost to implement the checklist?

The checklist is free to use, but will require input of human resources in order to implement it hospital-wide. Many of the elements of the checklist, such as a verification of patient’s identification, require no money to

implement and can save money and harm by preventing surgical mishaps. Other items on the checklist, such as the appropriate timing of antibiotics within 60 minutes prior to incision, ensure that resources already in place are used to their fullest potential.

We are already very busy in the operating room. Isn't this just one more task using up valuable time?

Once the checklist has become familiar to the operating teams, it requires very little extra time to perform. Most of the steps are incorporated into existing workflow and the remainder will add only one or two minutes to the OR time. However, the checklist can also save time by ensuring better coordination between the teams, minimizing slowdowns for tasks like retrieval of additional equipment.

While there is enthusiasm amongst some clinicians for the checklist, there are others who do not see the value of this initiative. Can we still use the checklist?

Yes. Implementation should always begin with the most enthusiastic. Start with those who are interested in improvement. The checklist can be implemented by an individual clinician in cases in which he or she participates, a selected service or operating room suite at a hospital, or on a hospital-wide or even system-wide basis. Focus energy on those areas and individuals who are receptive to the idea at first and as they become accustomed to the checklist and its benefits, they will help it spread to their peers.

Who should be in charge of running the checklist?

Although every member of the operating team – surgeons, anesthesiologists, nurses, technicians, and other operating room personnel – is involved in its execution, a single person should be responsible for leading the discussion of all components of the checklist and is essential for its success. This will often be a circulating nurse, but it can be any clinician or healthcare professional participating in the operation. This individual can and should prevent the team from progressing to the next phase of the operation until each step is satisfactorily addressed.

Do we need to actually check the boxes on the checklist?

No. The checklist was not designed as an audit tool; however, an institution can use it as such if this is likely to improve the safety of surgical care. In addition to a piece of paper, the checklist can be converted into a poster, incorporated into electronic records, or laminated for reuse.

We are interested in improving our performance in some perioperative measures not included on the checklist. How can we do this?

The checklist, while intended to be universally applicable, is not always a perfect fit for all institutions. Modifications can be made to include items that are deemed essential. However, we would caution against making the checklist too comprehensive. The more items added to it, the more difficult it will be to successfully implement.

Should we memorize the checklist?

No. Checklists are created to avoid the pitfalls of memorization and omissions that occur when standardized processes are not clearly written and defined. The goal of the Checklist is to help ensure that teams consistently follow a few critical safety steps and thereby minimize the most common avoidable risks endangering the lives and well-being of surgical patients.

Who came up with the checklist? Why are certain items on it?

The checklist was developed by a team of international experts in surgery, anesthesia, nursing, and patient safety. Each item on the checklist was selected to make surgeries safer and every single item is important. The

WHO Guidelines for Safe Surgery, available on the IHI website, contains background information supporting each item on the checklist.

For more FAQs, please see the [*Starter Kit for Implementing the Surgical Safety Checklist*](#) on the IHI.org website.

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