

**Monitoring and Evaluation Tool for
Emergency and Essential Surgical Care**

(Reference: WHO training manual 'Surgical Care at the District Hospital')

Name and designation of respondent _____

Name, Address of Health Care Facility _____

e mail and telephone no. _____

Section A

1. Type of Healthcare Facility (please check one)

Primary health care facility /First referral level health facility/Health Centre/ District Hospital/Rural Hospital/Referral or Consultant Hospital/Teaching hospital /National hospital

2. Number of beds: less than 100/101-300/more than 300

3.

Health Personnel Available	Before Workshop	After Workshop
General doctors		
Nurse anesthetists		
Clinical/Assistant medical officers		
Technicians		
Paramedics		
Surgeons		
Obstetrician/gynecologist		
Anesthesiologist		

Section B: Emergency and essential surgical and anesthesia interventions

4. Type of emergencies, surgical and anesthesia interventions managed at your facility. (see list below)	Pre-training		One year Post training	
	Number of cases managed in one year (specify the year)	Number of deaths after procedure in one year (specify the year)	Number of cases managed in one year (specify the year)	Number of deaths after procedure in one year (specify the year)
This list is not exhaustive. It attempts to guide trainers to strengthen capacities in emergency and essential surgical and anesthesia interventions. The procedures are level dependent (refer guide to infrastructure and supplies for EESC www.who.int/surgery)				
1. Resuscitation (Control of airway & hemorrhage, establish peripheral percutaneous intravenous line, peripheral venous cut down) 2. Removal of foreign body 3. Cricothyroidotomy /Tracheostomy 4. Chest tube insertion 5. Incision and drainage of abscesses 6. Wound suturing, dressing, suture removal 7. Wound debridement 8. Burns Management 9. Contracture release 10. Skin grafting 11. Biopsies 12. Suprapubic puncture/cystostomy				

Type of emergencies, surgical and anesthesia interventions managed at your facility. (see list below) continued	Pre-training		One year Post training	
	Number of cases managed in one year (specify the year)	Number of deaths after procedure in one year (specify the year)	No of cases managed in one year (specify the year)	Number of deaths after procedure in one year (specify the year)
This list is not exhaustive. It attempts to guide trainers to strengthen capacities in emergency and essential surgical interventions. The procedures are level dependent (refer guide to infrastructure and supplies for EESC www.who.int/surgery)				
13. Fractures reduction, splinting & immobilization, cast application 14. Curettage for chronic osteomyelitis 15. Amputation elective/emergency 16. Dilatation & Curettage (OB/GYN) 17. Caesarean section 18. Obstetric fistula repair 19. Uterine rupture/ectopic pregnancy 20. Male circumcision 21. Laparotomy for acute abdomen* 22. Appendectomy 23. Hernias surgery routine/emergency 24. Hydrocoelectomy 25. Congenital anomalies** correction 26. Local anaesthetic infiltration 27. Regional blocks 28. Spinal anaesthesia 29. Ketamine intravenous use 30. General anaesthesia inhalational 35. Other procedure not listed (specify)				
5. Total number of surgeries done				

***Acute abdomen:** (non-traumatic) bowel obstruction, gastrointestinal bleeding, peritonitis

****Congenital anomalies:** cleft lip, cleft palate, club foot, esophageal atresia, hypertrophic pyloric stenosis, anorectal malformations, congenital dislocation of hip, meningomyelocele

Section C: Quality and safety

	Pre-training (please indicate number)	Post Training (please indicate number)
6. Of above surgeries total number of children (below 18 years) operated in your health facility in one year?		
7. How many cases were referred to other health facility for surgical intervention in one year		
8. Who performs surgery (please indicate number) - Surgeon - Doctor - Technicians/Clinical officers/Health officers		
9. Who provides anaesthesia (please indicate number) - Anesthesiologists Physician - Doctor - Nurse/Clinical officers/Health officers/ Technicians		
10. Infrastructure	Pre-training Yes /No	Post training Yes /No

1. Is there running water? If yes: Interrupted / Uninterrupted (please circle one)		
2. Is there an electricity source? If yes: Interrupted / Uninterrupted (please circle one)		
3. Is there an area or room designated for emergency care?		
4. Is there an area or room designated for postoperative care or recovery Room		
5. Is Oxygen supply available If yes i): Interrupted / Uninterrupted (please circle one) ii) It is supplied by Oxygen Cylinder/ Oxygen Concentrator/ Both (please circle one)		
6. Is a list of essential emergency equipment for *Resuscitation available?		
7. Equipment for oxygen administration available (tubes, masks)		
8. Equipment for *Resuscitation available		
9. Equipment for Sterilization available		
10 Is anaesthesia machine available? If yes, is it functioning		
11 Is General anaesthesia provided?		
12 Is Spinal anaesthesia provided?		
13 Is Local anaesthesia provided?		
14 Is Postoperative pain- relief provided? If yes: on demand / round the clock (please circle one)		
15. Indicate number of health staff in emergency room? - Doctors - Nurses/Clinical/Health officers/Technicians - Paramedical		
16. Are all the Essential Emergency Equipment* in working order?		
17. Is there access to repair if equipment fails? If yes within the health care facility/ outside (please circle one)		
18. Is there an agreement for the maintenance of the equipment with the supplier?		
19. Does the health care staff in the emergency room get training in the use of the equipment?		
20. Are records maintained?		

Essential Emergency (EE) Equipment* (at an entry point in any health facility such as: Emergency room/ Admission room / Treatment room/ Casualty room)

***For guidance use WHO generic list of Essential Emergency Equipment provided at the end of this document**

11. How often is 'room to room inspection' performed to ensure that EE equipment and supplies required for the essential emergency procedures are available and functioning? (please circle one) Daily / weekly / monthly / 6-monthly / yearly / once in ___ years / never

12. Are any new procedures/ interventions introduced?

If yes, which procedure/intervention: (please specify)

	Pre-training Yes /No	Post training Yes /No
13. Is there a continuing education program for Surgery		
14. Is there a continuing education program for anaesthesia		

15. Are WHO Best Practice Protocols for Clinical Procedures safety (refer www.who.int/surgery) available at the point of care for		
1.Ethics- Patient Consent		
2. Record keeping		
3. Operating Room (O.R.)		
4. Hand Washing Techniques		
5. Scrubbing and gowning		
6. Prevention of Transmission of HIV		
7.Infection Prevention and Universal Precautions		
8.Waste disposal in clinical procedures		
9.Diagnosis of Labour		
10.Diagnosis of vaginal bleeding in early pregnancy		
11.Severe Pre-Eclampsia and Eclampsia		
12.Eclampsia Management		
13.Urinary Retention: Emergency Drainage		
14.Caesarean Section		
15.Check List prior to inducing anaesthesia		
16.Managing unexpected effects of a spinal anaesthetic		
17.Post-operative management		
18.Post-operative pain- relief		
19.Cardiac life support		
20. Airway Management		
21.Surgical Cricothyroidotomy		
22.Cast Application		
23.Splint application		
24.Caring for a cast or splint		
25.Removing a cast		
26.Hand lacerations		
27.Disaster Planning		
28.Trauma Team Leader Responsibilities		
29.Abdominal Trauma		
30.Burns Management: adults and children		
31.War-related Trauma		
32.Transportation of critically ill patients		

16. Suggestions for improvements.....

WHO Generic Essential Emergency Equipment List

This checklist of essential emergency equipment for resuscitation describes minimum requirements for emergency and essential surgical care at the first referral health facility

Capital Outlays	Quantity	Date checked
Resuscitator bag valve and mask (adult)		
Resuscitator bag valve and mask (paediatric)		
Oxygen source (cylinder or concentrator)		
Mask and Tubings to connect to oxygen supply		
Light source to ensure visibility (lamp and flash light)		
Stethoscope		
Suction pump (manual or electric)		
Blood pressure measuring equipment		
Thermometer		
Scalpel # 3 handle with #10,11,15 blade		
Scalpel # 4 handle with # 22 blade		
Scissors straight 12 cm		
Scissors blunt 14 cm		
Oropharyngeal airway (adult size)		
Oropharyngeal airway (paediatric size)		
Forcep Kocher no teeth 12-14 cm		
Forcep, artery		
Kidney dish stainless steel appx. 26x14 cm		
Tourniquet		
Needle holder		
Towel cloth		
Waste disposal container with plastic bag		
Sterilizer		
Nail brush, scrubbing surgeon's		
Vaginal speculum		
Bucket, plastic		
Drum for compresses with lateral clips		
Examination table		
Wash basin		
Renewable Items		
Suction catheter sizes 16 FG		
Tongue depressor wooden disposable		
Nasogastric tubes 10 to 16 FG		
Batteries for flash light (size C)		
Intravenous fluid infusion set		
Intravenous cannula # 18, 22, 24		
Scalp vein infusion set # 21, 25		
Syringes 2ml		
Syringes 10 ml		
Disposable needles # 25, 21, 19		
Sharps disposal container		
Capped bottle, alcohol based solutions		
Sterile gauze dressing		
Bandages sterile		
Adhesive Tape		
Needles, cutting and round bodied		
Suture synthetic absorbable		
Splints for arm, leg		
Urinary catheter Foleys disposable #12, 14, 18 with bag		
Absorbent cotton wool		
Sheeting, plastic PVC clear 90 x 180 cm		
Gloves (sterile) sizes 6 to 8		

Capital Outlays	Quantity	Date checked
Gloves (examination) sizes small, medium, large		
Face masks		
Eye protection		
Apron, utility plastic reusable		
Soap		
Inventory list of equipment and supplies		
Best practice guidelines for emergency care		
Supplementary equipment for use by skilled health professionals		
Laryngoscope handle		
Laryngoscope Macintosh blades (adult)		
Laryngoscope Macintosh blades (paediatric)		
IV infusor bag		
Magills Forceps (adult)		
Magills Forceps (paediatric)		
Stylet for Intubation		
Spare bulbs and batteries for laryngoscope		
Endotracheal tubes cuffed (# 5.5 to 9)		
Endotracheal tubes uncuffed (# 3.0 to 5.0)		
Chest tubes insertion equipment		
Cricothyroidectomy		

This list was compiled from the following WHO resources:

WHO training manual: Surgical Care at the District Hospital
 WHO Emergency Relief Items, Compendium of Basic Specifications*
 WHO/UNFPA Essential drugs and other commodities for reproductive health services.
 WHO Essential Trauma Care Guidelines

* For specifications refer to this book

Clinical Procedures Unit
 Department of Essential Health Technologies
 World Health Organization,
 20 Avenue Appia, 1211, Geneva 27, Switzerland
 Fax: 41 22 791 4836,
www.who.int/surgery