

# Enabling access to safe surgery in rural Africa through mentorship and supervision: a case study

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## Introduction

In 2018, Tanzania launched its first national surgical, obstetric and anaesthesia plan to improve access to safe, timely and affordable surgical care, especially in rural areas.<sup>1</sup> The SURG-Africa project contributed to the plan operationalisation by establishing a regular programme of in-service training, mentoring and supervision visits to build the surgical capacity of district hospitals.<sup>2</sup> The aim of this study was to determine the efficacy of the programme.

## Methods

A qualitative case study was conducted at Hai District Hospital, one of the health facilities participating in SURG-Africa. Five mentors (in surgery, orthopaedics, obstetrics, anaesthesia and nursing) from central and regional hospitals visited Hai quarterly in 2018–2021 to teach surgical skills and mentor the local team. Data collected consisted of reports compiled by mentors after each trip (n=30 in total). A qualitative content analysis was performed.

## Results

Major improvements were reported at individual, team and unit levels. Local surgical providers were trained in essential procedures previously referred to higher level hospitals, such as strangulated hernia repair and hysterectomy. Nurses' proficiency in preparation of instruments, waste segregation, decontamination and infection prevention increased. The competency of the anaesthesia providers in paediatric resuscitation and ketamine protocol improved. At the team level, the intervention enabled improved patient management (eg through correct use of antibiotic prophylaxis) and better collaboration among team members through the use of the World Health Organization (WHO) surgical checklist. At unit level, a more efficient arrangement of the operating theatres was implemented to facilitate the work of the local team, and communication with hospital management for the procurement of surgical essentials (ie surgical drapes) improved thanks to supervisors' support.

## Discussion

Regular supervision and in-service training can increase safety and quality of surgical care in Tanzania's district hospitals. The intervention benefited hospital care by improving surgical competency, preparation and patient management. However, persistent challenges in regard to resources availability (ie cardiac monitors) and staff shortages (particularly in anaesthesia) should be addressed. ■

## References

- 1 Nyberger K, Jumbam D, Dahm J *et al*. The situation of safe surgery and anaesthesia in Tanzania: a systematic review. *World J Surg* 2018;43:24–35.
- 2 SURG-Africa. SURG-Africa project overview. 2022. [www.surgafrika.eu/project-overview.html](http://www.surgafrika.eu/project-overview.html) [Accessed 10 February 2022].

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