

Strong Foundations: Building Surgical Technologist Expertise Through Preceptorship

Alex Hughes, BSN, CNOR, USA; Mary Ijiwande, ST, USA; Steven Nelson, ST, USAF; Andrew Rankin, ST, USAF; John Mckenzie, ST, USA; Bethany Atwood, DNP, AGCNS-BC, CNOR, USA;
Operating Room, Landstuhl Regional Medical Center, Germany

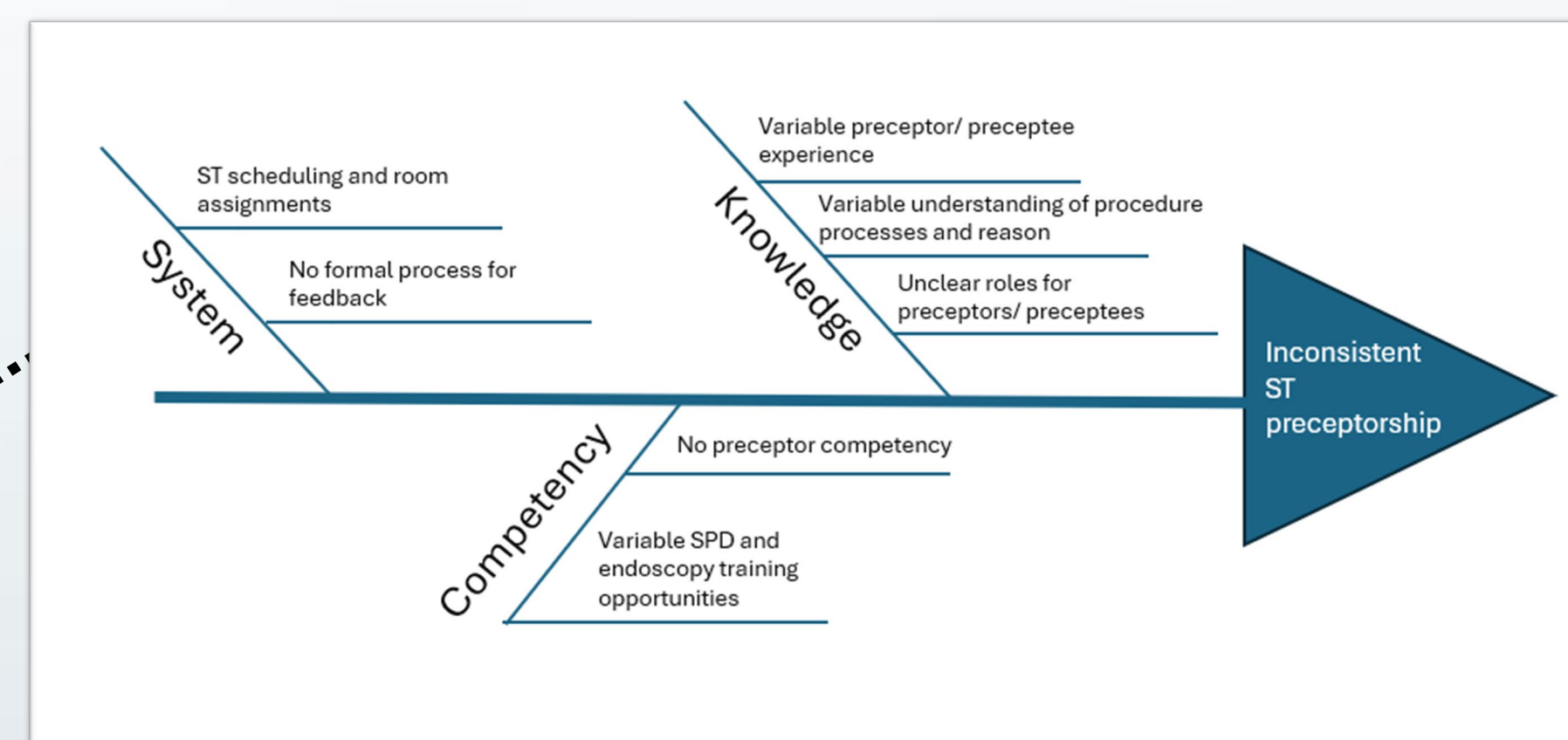
Problem Statement

- Landstuhl Regional Medical Center (LRMC), the largest U.S. hospital overseas, faces a critical shortage of experienced Surgical Technologists (STs), intensified by its remote location and complex hiring processes
- The current ST workforce has an average experience level of less than 24 months, increasing the demand for effective and rapid training.
- Inconsistent and non-standardized preceptorship for novice STs leads to diminished confidence and a lack of competency for independent practice in the operating room.
- This training gap wastes valuable resources, undermines surgical efficiency, and creates a direct operational risk by limiting the availability of mission-ready personnel.

Method

Using the 8-Step Practical Problem-Solving Model, a multidisciplinary team developed an evidence-based performance improvement project running from May 2025 to February 2026

- Identified the triggering issue** and established a multidisciplinary team
 - The multidisciplinary team included: OR nurse and ST managers, OR educators, experienced staff STs and nurses, clinical nurse specialist
- Identified performance gaps**
 - Staffing experience level
 - Inconsistent precepting techniques across the department
- Set the targets**
 - Increase the number of trained preceptors
 - Standardize the precepting process and expectations
 - Safe independent practice after 12 week
- Determined Root Causes** using a Fishbone Diagram
- 5 / 6. Developed and Implemented Countermeasures**



Performance Results & Impacts

7. Monitored performance and confirmed results

- Leadership and OR education direct observation
- Team meetings to assess outcomes and remove barriers

Measure	Baseline	Project Results
Shifts with assigned preceptor	n/a	85%
Weekly Huddles	n/a	28
GI Clinic and SPD Rotations	n/a	5
Case study completion	n/a	110
Trained Preceptors	2	7
Preceptees trained using SAM	n/a	9

Project Impacts

- Enhanced surgical readiness
- Accelerated skill progression and skill development
- Standardized clinical practice and expectations
- Increased staff ownership and professional accountability
- Improved interdepartmental collaboration

8. Sustained success and transferred knowledge

- Update local policies to sustain change

Future Opportunities

- Integrate hi-fidelity simulation for high-risk, low-volume procedures
- Establish a structured surgeon feedback mechanism to systematically capture team performance information to inform ongoing training opportunities

Project Goal

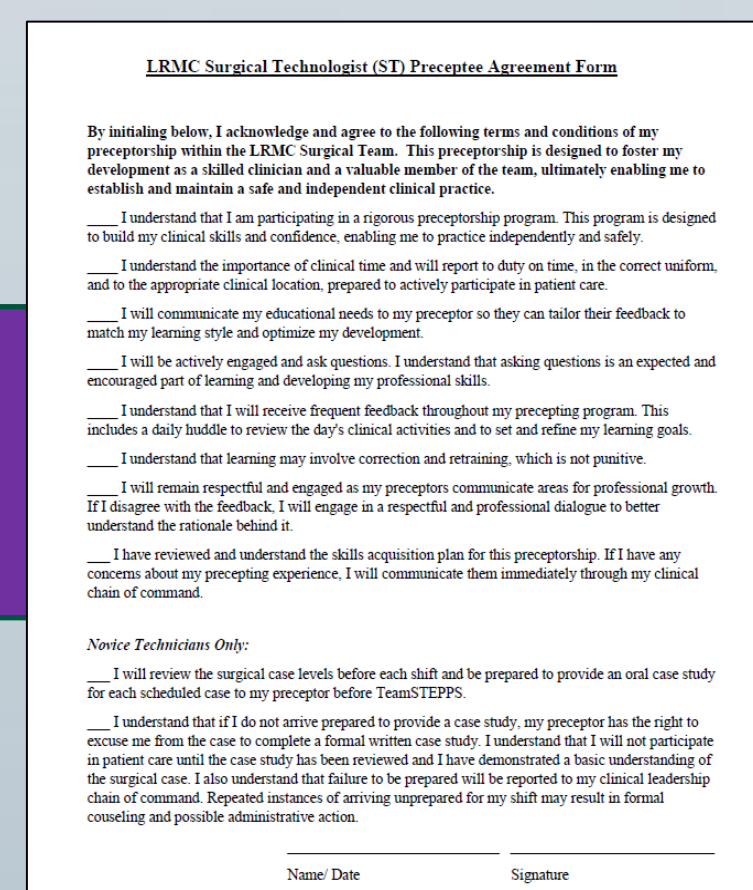
To implement an evidence-based preceptorship program in the LRMC operating room supporting safe, independent novice surgical technologists practice within 12 weeks.

Root Cause	Project / Countermeasure	Owner
System	Refine unit schedule to align preceptors and preceptees	Lead ST
System	Weekly huddle education, preceptors, preceptees	OR Educators and Lead ST
Knowledge	2-week rotation through GI Clinic and SPD	OR Educators
Knowledge	Implement case studies	OR Educators and ST manager
Knowledge	Establish preceptor and preceptee expectation letters	Nurse and ST manager
Competency	Preceptor computer-based training, competency assessment	Education RN and Lead ST
Competency	Implement Skills Acquisition Matrix (SAM) with learning objectives	Education RN and Lead ST

Precepting in Action



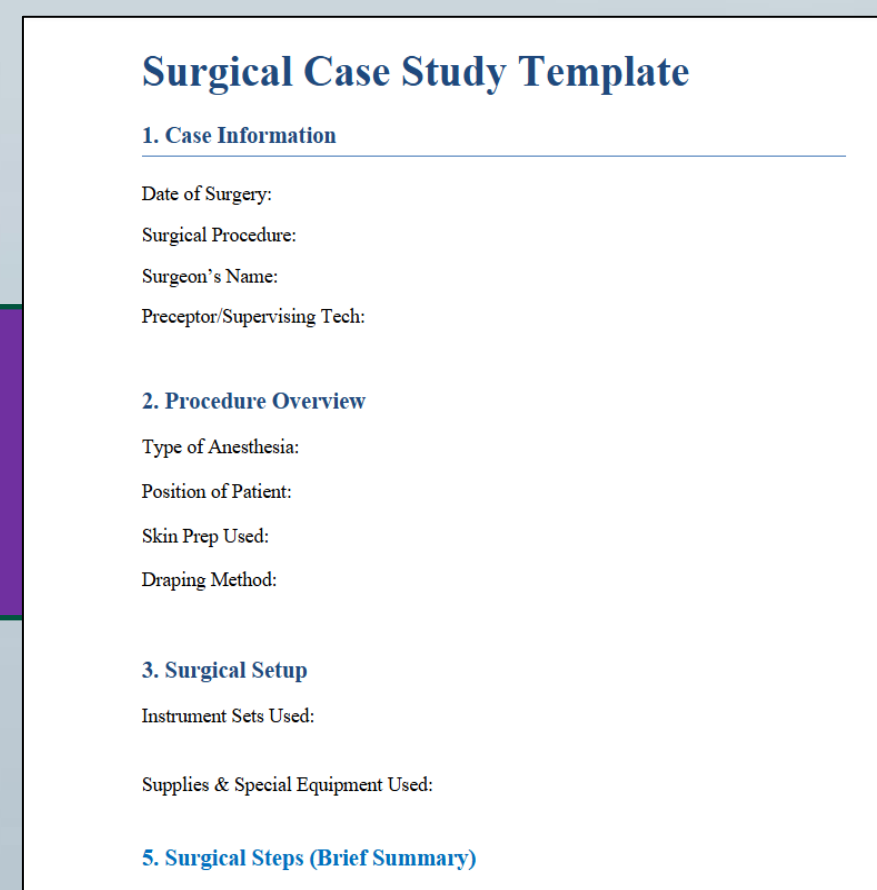
Week 1-4:
Direct Preceptor/Preceptee in case instruction



ST preceptor agreement form drives clear role expectations thereby improving team accountability



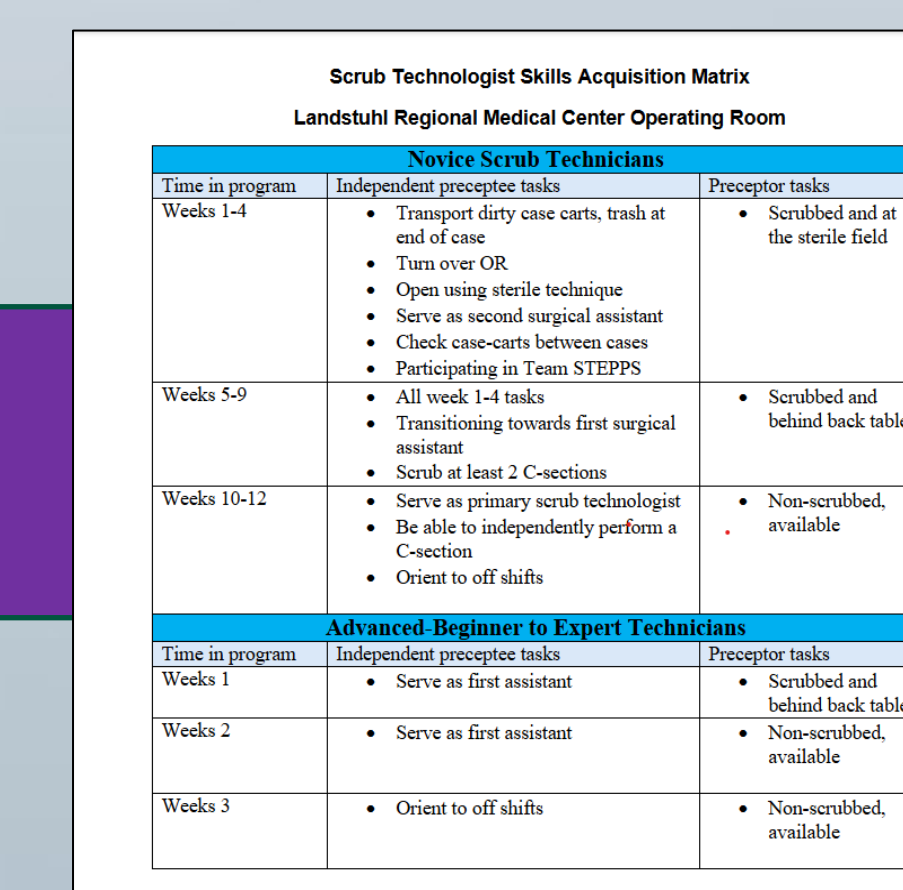
Weeks 5-9:
Transitioning towards primary technician role. Optimizing back table set up and organizational strategies.



Surgical case study template designed to drive procedural knowledge and improve anticipation



Weeks 10-12:
Serving as primary technologist with ongoing preceptor feedback



Skills acquisition matrix drives shared understanding and professional accountability across each preceptorship phase