

**UT SOUTHWESTERN DEPARTMENT OF SURGERY
TECHNICAL SKILLS COURSE OUTLINE**

**Course Title: R1 Laparoscopic Module II: Fundamentals of Laparoscopic Surgery (FLS)
Course**

Course Director: Name: Daniel J. Scott, MD
Specialty: Surgery

Additional Course Faculty: Name: Seifu Tesfay, RN, MS
Specialty: Senior Education Coordinator

Name: Lisa Hollett RN, MA
Specialty: Education Coordinator

Name: Debbie Hogg, BS
Specialty: Clinical Study Coordinator

Name: Nancy Gardner RN
Specialty: Research Nurse

Participants: Specialty: Surgery Residents
Level: R1
Number of participants for the entire course: 39

Curriculum duration: 2 months

Expected Attendance:

of Wednesday Morning Sessions Assigned to Each Trainee: 1
Duration of Each Session (max 2 hrs): 2 hrs
of Trainees per session: 39

Course Completion Verification - How do you know when a trainee has completed each component of the course and the overall course itself? Please specify for each course component, if applicable – *for example, assigned reading component verified by written testing and skills component verified by attending 2 course-instructor led sessions.*

X Attendance-based - based on the trainee attending all designated sessions
 Entire Course - Is the entire course solely based on attendance?
X Part of the Course – Is attendance to designated sessions required in

addition to other components, as listed below?

Repetition-based - based on the trainee performing a specified number of repetitions

Component(s): _____

of Repetitions: _____

X Proficiency-based - based on the trainee reaching a specified level of proficiency
Component(s): FLS Tasks 1-5 _____

Method for determining proficiency: FLS metrics with proficiency levels reached on all 5 tasks, as verified by a proctor according to score sheets, plus formal post-testing once proficiency has been reached. Timeline: curriculum completed by designated date. This is a two month curriculum. OR Privelege-linked: Trainees cannot serve as surgeon of record on a Lap Chole until post-tested.

Written Testing - based on passing a written test

Component(s): _____

Documentation of Watching Videos/CD's/Web-based Materials - based on proctor or instructor verification that the trainee has watched the specified videos/CD's/Web-based materials

Component(s): _____

Other Methods (specify method) _____

Component(s): _____

Self-study or Self-practice (Is self-study or self-practice an expectation of this course?)

No

X Yes (specify)

Self-study component(s): _____

Estimated time requirements for self-study: _____ hrs.

During what phase(s) of the course is self-study to be completed? _____
Training Phase

Self-practice component(s): FLS Tasks _____

Estimated time requirements for self-practice: 5-10 hrs.

During what phase(s) of the course is self-practice to be completed? _____
Training Phase

Training Location(s): Skills Lab

Equipment/Simulator(s): FLS Training Boxes

Other Resources (Textbooks, CD-ROMS, Videos, etc): FLS Disk 2

Educational Scope:

- X Skills – does this course teach technical skills?
Component(s): FLS tasks: eye-hand-coordination, cutting, endoloop, extracorporeal knot tying, intracorporeal knot tying
- X Cognitive - does this course teach cognitive (knowledge) material?
Component(s): Fundamentals of Laparoscopy cognitive components
- X Judgment – does this course teach trainees judgment (intraoperative or clinical decision-making)?
Component(s): Fundamentals of Laparoscopy cognitive components

Learning Objectives:

Acquire proficiency in laparoscopic skills contained in the FLS Module, including eye-hand-coordination, cutting, endoloop, extracorporeal knot tying, and intracorporeal knot tying. Acquire knowledge related to Fundamentals of Laparoscopy cognitive components

Summary of Curriculum, Teaching Methods, and Resource Utilization (*For each component, please specify what material will be taught during each session, how will the material be taught, and what teaching materials will be used. Please also specify the overall format of the course including expectations required for successful course completion*):

Each trainee will be required to have successfully completed the Laparoscopy I module prior to starting on this module.

All trainees will attend a single Wednesday morning session. This is held concurrently with Lap I orientation. During this session, an introduction to FLS tasks and the curriculum will be afforded and an orientation to the video tutorial, the trainer box materials, and the scoring system will be provided.

SKILLS TRAINING

Trainees will be expected to self-practice on the tasks, with data on performance recorded for each repetition, until proficiency levels are reached for all 5 tasks. Trainees must log in and log out of the attendance system to track total training time. Training will be conducted in a self-study fashion and trainees will be encouraged to repetitively watch the video tutorials during training to review appropriate techniques and tricks for performing the tasks. Proctors will be available upon request to provide additional feedback.

Once proficiency has been achieved, each trainee will notify the education coordinator, who will verify achievement of proficiency on all 5 tasks according to the documentation on the score sheets. Each trainee will then schedule a 30 minute post-test session with the proctor and will

perform 1 repetition of each task while being graded according to FLS metrics by the proctor. Score sheets will be collected and filed.

COGNITIVE TRAINING

Trainees will be expected to view all modules on FLS disk 1 & 2. Proctors will be available upon request to provide additional information and to answer questions

Methods for giving feedback to learners (Formative and Summative):

Training will be conducted in a self-study fashion and trainees will be encouraged to repetitively watch the video tutorials during training to review appropriate techniques and tricks for performing the tasks. Proctors will be available upon request to provide additional feedback.

Methods for Assessment of Learners:

FLS metrics for pre and post-testing and modified FLS metrics for skills training.

Methods for Remediation: *(How are individuals who need remediation identified and how is remediation facilitated?)*

Anyone who cannot achieve proficiency on any of the 5 tasks will be remediated by proctored training sessions.

Methods for Course Evaluation:

By Learners: E-Value online system
Other Methods (*specify*) Post-test questionnaire

By Faculty: E-Value online system
Other Methods (*specify*) _____

Materials: Specify the types of materials, manufacturer (if pertinent), and total quantity needed.

FLS training boxes (5 stations)

FLS disk 2 set-up on skills lab computers

Needle drivers (5 sets)

Knot pushers (5 sets)

Laparoscopic Instruments

Endodissect, 2 per station x 5 stations = 10, + 1 replacement = 20

Endoshears, 1 per stations x 5 stations = 5, + 1 replacement = 10

Endograsp, 1 per stations x 5 stations = 5, + 1 replacement = 10

Penrose drains: 42 reps x 39 trainees = 1,638/10 reps per drain = 164 penrose drain models

Endoloop foam: 15 reps x 39 trainees = 585/20 reps per foam = 29 endoloop foam models

Trainees (n=39)	Test Gauze (2 each)	Training Gauze (25 each)	Endoloop (13 ea + 2 test)	Suture* (40 ea + 2 test)
R1 (39)	78	975	585	1640

*Long suture must be cut to 12 cm and saved after each extracorporeal repetition for use again during intracorporeal knot tying task

Suture: 2-0 silk, V-20 needle, 120cm long, ES-439

Endoloop: Surgitie 0-polysorb, EL-21-L