# SRG 101 - INTRO TO SURGICAL TECHNOLOGY

### **Course Description**

In this course students will learn the primary functions of the surgical technologist in multiple roles within the operating room environment. Points of focus will include effective communication, professional interactions with the patient and surgical team, proper personal protective equipment, introduction to asepsis, safety precautions, All-Hazard preparation, instrumentation, equipment, supplies, stapling devices, suture, and infection control and wound healing. Group 2 course.

### **Credit Hours**

3

### **Contact Hours**

3

### **Lecture Hours**

3

## **Required Prerequisites**

BIO 227, BIO 227L, HAH 101, HPD 110 or equivalent; SRG 102 and SRG 103 may be taken concurrently

### **Corequisites**

SRG 101L

# Recommended Prerequisites or Skills Competencies

BIO 228

# **Course Learning Outcomes**

#### Knowledge:

- Describe, compare and contrast the characteristics, roles, responsibilities, and acceptable professional behavior of the professional surgical technologist.
- · Describe proper attire.
- Identify the goals of communication and the different types of communication relationships. Describe the significance of content and tone in communication and distinguish between assertive and aggressive behavior.
- Describe sterile and aseptic technique, infection control, and methods of surgical instrument decontamination and sterilization.
- Identify communication skill requirements for interactions with patients, family and surgical team member of varying cultures, ethnic and religious backgrounds, as well as varying socioeconomic statuses.
- Identify the types of risks that are present in the operating room.
- Describe the fire triangle with fuels and sources of ignition commonly found in the operating room.
- · Describe toxic substances in smoke plume.
- · Describe the symptoms of true latex allergy.
- Describe the, safety precautions, risk reduction methods, and proper response protocol associated with safety risks associated with the perioperative environment.
- · Describe how to respond appropriately to patient fire.

- Identify methods associated with preventing fires in the operating room
- Describe measures to safely store, transport, and use compressed gas cylinders.
- · Identify precautions to prevent exposure to ionizing radiation.
- · Describe methods to avoid chemical injury.
- · Identify the practice of Standard Precautions.
- Identify the practice for transmission-based precautions.
- Identify methods of properly handling and disposing of hazardous waste in the operating room.
- Identify precautions needed to prevent latex reaction in allergic patients.
- Describe proper body mechanics for lifting, pulling, and pushing objects.
- Describe the usage and safety protocol for varying types of equipment found in the perioperative environment.
- Describe the standards, principles and recommendations related to aseptic technique.
- Clearly define terms related to aseptic technique and the principles of asepsis.
- · Describe the concepts of barriers and containment.
- · Describe the concept of a surgical conscience.
- Describe instrumentation and use in surgical procedures during perioperative care.
- · Understand how instrument names are used in the operating room.
- · Describe the instrument manufacturing process.
- Identify the different types of finishes on surgical instruments.
- Describe how to inspect instruments for defects.
- · Identify the role of the surgical technologist in wound management.
- · Describe Halstead's principles of surgery.
- · Identify different methods of hemostasis.
- · Identify and describe the different types of surgical sponges.
- Describe the suture and properties of sutures, suture needles, and packaging.
- · Identify safety precautions for needlestick injuries.
- · Describe different types of tissue and synthetic implants.
- Describe common wound drains and when they are used.
- · Describe different types of dressings and the indication for their use.
- · Describe the process of wound healing and complications.

#### Application:

- · Exhibit effective communication skills.
- Work cooperatively to become an integral member of the health care team.
- · Classify instruments by tissue type.
- · Differentiate types of instruments by their design.
- · Differentiate types of instruments by their function.
- Analyze the importance of the following concepts and practices: preventing injuries, wound irrigation, retraction, thermal and high-frequency coagulation, the pneumatic tourniquet, and autotransfusion.

#### Integration:

 Recognize the importance of appropriate communication inside/ outside the surgical environment in order to maintain patient confidentiality and work/life balance.

- Compare and contrast the roles of the surgical technologist in every aspect of patient care as it pertains to the advocacy needed on behalf of the patient.
- Connect learned skills with real world application through observation of surgical procedures.
- · Connect the relationship between personal hygiene and asepsis.

#### **Human Dimension:**

 Identify a sense of responsibility, self-discipline, pride, teamwork, and enthusiasm.

### **Caring - Civic Learning:**

- Demonstrate the need for cultural, ethnic, gender and religious understanding as it applies to differing medical practices and interpersonal communication scenarios.
- Identify the culture of a mutually beneficial operating room environment as it applies to all team members in a professional setting.

#### Learning How to Learn:

- Learn to effectively communicate within a team dynamic as well as with one on one interpersonal situations.
- Learn internal and external resources for communication assistance and situational troubleshooting.
- Assume responsibility for self-direction by participating in activities that contribute to personal and professional growth.
- · Learn positive stress relieving techniques.