

Montgomery County Community College
SUR 206
Surgical Technology IV
7-3-16

COURSE DESCRIPTION:

This course is designed to extend the knowledge of the Surgical Technologist. It is built on the knowledge gained from SUR 105, SUR 106, and SUR 205. Essential team skills in the operating room environment are applied to various surgical specialties and disaster/public health emergencies. Patient, equipment, and supply preparation are demonstrated in the following types of surgeries: advanced orthopedics, cardiovascular, minimally invasive cardiac, and trauma surgery. The patient preparation, instrument and equipment set-up and assembly are demonstrated. The actual procedural stages for each surgery within the specialties are presented and reinforced in the clinical setting. The concurrent clinical experience affords the student the opportunity to directly apply didactic information. This course is subject to a course fee. Refer to <http://mc3.edu/adm-fin-aid/paying/tuition/course-fees> for current rates.

REQUISITES:

Previous Course Requirement

- SUR 205 Surgical Technology III

Previous or concurrent Course Requirement

- SOC 244 Sociology of Death and Dying

LEARNING OUTCOMES Upon successful completion of this course, the student will be able to:	LEARNING ACTIVITIES	EVALUATION METHODS
1. Differentiate the role and expectations of the Surgical Technologist within the operative team delivering care to the patient having the following specialty surgeries: advanced orthopedic, cardiovascular, minimally invasive cardiac and trauma surgery.	Lecture with Visuals/ Discussion Reading/Assignments Role Playing/Simulation in the Operating Room Learning Lab Clinical Practice Professional Resources	Written Exams/Quizzes Discussion/Written Assignments Clinical Performance

LEARNING OUTCOMES	LEARNING ACTIVITIES	EVALUATION METHODS
2. Define the accountability and environmental requirements of the Surgical Technologist in caring for specialty surgical patients.	Lecture with Visuals/ Discussion including AV/Multimedia Materials Reading/Assignments Role Playing/Simulation in the Operating Room Learning Lab Clinical Practice	Written Exams/Quizzes Discussion/Written Assignments Clinical Performance
3. Recognize and apply the activities necessary to prepare and integrate aseptic technique into the preparation of the patient for surgery while demonstrating use of required instruments, equipment, and sterile supplies for the listed specialty surgeries.	Lecture with Visuals/ Discussion including AV/Multimedia Materials Reading/Assignments Demonstration/Return Demonstration with Validation Role Playing/Simulation in the Operating Room Learning Lab Clinical Practice Professional Resources	Written Exams/Quizzes Discussion/Written Assignments Clinical Performance
4. Prioritize and organize the surgical field for these cause specific surgeries, considering the urgency of patient care.	Lecture with Visuals/ Discussion including AV/Multimedia Materials Reading/Assignments/ Case Studies Demonstration/ Role Playing/Simulation in the Operating Room Learning Lab Clinical Practice	Written Exams/Quizzes Discussion/Written Assignments Return Demonstration with Validation Clinical Performance
5. Integrate knowledge of anatomy and physiology as it relates to the procedural stages of the course specific surgical interventions.	Lecture with Visuals/ Discussion including AV/Multimedia Materials Reading/Assignments/ Case Studies Assignments/Written Experiences/Case Studies Paralleling Clinical Experience Clinical Practice	Written Exams/Quizzes Discussion/Written Assignments Clinical Performance

LEARNING OUTCOMES	LEARNING ACTIVITIES	EVALUATION METHODS
6. Describe how disasters and/or emergencies can impact public health taking into consideration different types, indicators, planning, and response including safety and security risks.	Lecture with Visuals/ Discussion including AV/Multimedia Materials Reading/Assignments Assignments/Written Experiences/Case Studies Paralleling Clinical Experience Role Playing/Simulation in the Operating Room Learning Lab Clinical Practice	Written Exams/Quizzes Discussion/Written Assignments Clinical Performance

At the conclusion of each semester/session, assessment of the learning outcomes will be completed by course faculty using the listed evaluation method(s). Aggregated results will be submitted to the Associate Vice President of Academic Affairs. The benchmark for each learning outcome is that *70% of students will meet or exceed outcome criteria*.

SEQUENCE OF TOPICS:

1. Orientation
2. Orthopedic Trauma Surgery
 - A. Anatomy and Relationship to Procedure
 - B. Instruments, Set-Up, Counting
 - C. Equipment for Procedure
 - D. Procedural Stages for Surgical Intervention
 - E. Potential Complications
3. Orthopedic Joint Replacement Surgery
 - A. Anatomy and Relationship to Procedure
 - B. Instruments, Set-Up, Counting
 - C. Equipment for Procedure
 - D. Procedural Stages for Surgical Intervention
 - D. Potential Complications
4. Cardiac Surgery
 - A. Anatomy and Relationship to Procedure
 - B. Instruments, Set-Up, Counting
 - C. Equipment for Procedure
 - D. Procedural Stages for Surgical Intervention
 - E. Potential Complications
5. Minimally Invasive Cardiac Surgery
 - A. Patient Preparation
 - B. Instrument Set Up
 - C. Equipment for Each Procedure; i.e., Valve Replacement, Bypass
 - D. Procedural Stages for Each Surgical Intervention
6. Trauma Surgery

- A. Anatomy and Relationship to Procedure
- B. Instruments, Set-Up, Counting
- C. Equipment for Procedure
- D. Procedural Stages for Surgical Intervention
- E. Potential Complications
- 7. All-Hazards Preparation
 - A. Preparation and Planning
 - B. Detection and Communication
 - C. Incident Management and Support Systems
 - D. Safety and Security
 - E. Clinical/Public Health Assessment and Intervention
 - F. Contingency, Continuity, and Recovery
 - G. Public Health Law and Ethics

LEARNING MATERIALS:

Frey, K.B. (2018). *Surgical Technology for the Surgical Technologist: A Positive Care Approach* (5th ed.). Boston, MA: Cengage Learning.

Rothrock, J.C. & Alexander, S. M. (2012). *Alexander's Surgical Procedures*. (1st ed.). St. Louis, MO: Mosby Elsevier Inc.

Other learning materials may be required and made available directly to the student and/or via the College's Libraries and/or course management system.

COURSE APPROVAL:

Prepared by:	Beverly Siftar, RN, MSN, CNOR and Dr. Victoria L. Bastecki-Perez	Date:	1/2003
Revised by:	Erin White, MS, CST	Date:	1/2009
VPAA/Provost Compliance Verification:	Dr. John C. Flynn, Jr.	Date:	9/11/2009
Revised by:	Erin White-Mincarelli, Doctoral Candidate, MS, CST	Date:	5/2012
VPAA/Provost or designee Compliance Verification:	Victoria L. Bastecki-Perez, Ed.D.	Date:	5/30/2012
Revised by:	Erin White-Mincarelli, Doctoral Candidate, MS, CST	Date:	10/2012
VPAA/Provost or designee Compliance Verification:	Victoria L. Bastecki-Perez, Ed.D.	Date:	12/17/2012
Revised by:	Erin White-Mincarelli, PhD, MS, CST	Date:	9/12/2017
VPAA/Provost or designee Compliance Verification:		Date:	11/7/2017



This course is consistent with Montgomery County Community College's mission. It was developed, approved and will be delivered in full compliance with the policies and procedures established by the College.