

INSTRUCTIONAL PACKAGE

AHS 141 PHLEBOTOMY FOR THE HEALTHCARE PROVIDER

Effective Term Fall 2025/Spring 2026/Summer 2026

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Part I: Course Information

Effective Term: Fall 2025/Spring 2026/Summer 2026

COURSE PREFIX: AHS141 251 COURSE TITLE: Phlebotomy for the Healthcare Provider

CONTACT HOURS: 2-3-3 CREDIT HOURS: 2-3-3

RATIONALE FOR THE COURSE:

AHS 141 is intended to prepare the student for their clinical rotations. The student will learn the proper form for venipuncture, with an emphasis on safety. They will also learn the proper technique on using the evacuated tube system, the winged infusion system, and capillary lancets. The students will learn CLSI recommendations for special handling during transport of blood specimens when specific tests are requested.

COURSE DESCRIPTION:

This course contains the essential theory, skills, and special procedures required to meet venipuncture needs in hospitals, clinics, and other healthcare settings.

PREREQUISITES/CO-REQUISITES:

COREQUISTES INCLUDE: BIO 110 or BIO 112, or BIO 211 AHS 106

REQUIRED MATERIALS:

Please visit the **<u>BOOKSTORE</u>** online site for most current textbook information.

Enter the semester, course prefix, number and section when prompted and you will be linked to the correct textbook.

TECHNICAL REQUIREMENTS:

Access to Desire2Learn (D2L), HGTC's learning management system (LMS) used for course materials.

Access to myHGTC portal for student self-services.

College email access – this is the college's primary official form of communication.

CLASSROOM ETIQUETTE:

As a matter of courtesy to other students and your professor, please turn off cell phones and other communication/entertainment devices before class begins. If you are monitoring an emergency, please notify your professor prior to class and switch cell phone ringers to vibrate.

PLAGIARISM & CHEATING:

Refer to the College catalog & Student handbook. The student may be assigned a failing grade for the course or may be required by the professor to withdraw from the course and/or the phlebotomy program.

Part II: Student Learning Outcomes

COURSE LEARNING OUTCOMES and ASSESSMENTS*:

Module #1 Test #1

Material Covered: Chapters 4, 8, 9

Chapter 4 Infection Control

- 1. Explain the infection control policies and procedures that must be followed in specimen collection and transportation
- 2. Define the terms health care-associated, health care-acquired, and nosocomial infections.
- 3. Identify the basic programs for infection control and isolation procedures.
- 4. Explain the proper techniques for handwashing, gowning, gloving, masking, double bagging, and entering and exiting the various isolation areas.
- 5. Identify steps to avoid transmission of blood-borne pathogens.
- 6. Identify ways to reduce risks for infections and accidental needlesticks.
- 7. Describe measures that can break each link in the chain of infection.
- 9. Describe the components for the chain of infection.
- 10. State the central purpose of hand hygiene.

11. Describe the CDC procedure for collection and transport of specimens for Ebola virus testing.

12. Describe the major organisms responsible for healthcare-associated infections.

Chapter 8 Blood Collection Equipment

1. Describe the latest phlebotomy safety supplies and equipment and evaluate their effectiveness in blood collection.

2. List the various types of anticoagulants and additives used in blood collection, their mechanisms of action on collected blood, examples of tests performed on collected blood, and the vacuum collection tube color codes for these anticoagulants and additives.

3. Identify the various supplies that should be carried on a specimen collection tray when collecting blood by venipuncture or skin puncture.

4. Identify the types of safety equipment needed to collect blood by venipuncture and skin puncture.

5. List substances that can interfere in clinical testing of blood analytes.

Chapter 9 Preexamination/Preanalytical Complications Causing Medical Errors in Blood Collection

1. Describe preanalytical (preexamination) complications related to phlebotomy procedures and impacting patient safety.

2. Explain how to prevent and/or handle complications in blood collection.

3. List at least five factors about a patient's physical disposition (i.e., makeup) that can affect blood collection.

4. List examples of substances that can interfere in clinical analysis of blood constituents, and describe methods used to prevent these interferences.

5. Describe how allergies, a mastectomy, edema, and thrombosis can affect blood collection.

6. List preanalytical complications that can arise with test requests and identification.

7. Describe complications associated with tourniquet pressure and fist pumping.

8. Identify how the preanalytical factors of syncope, petechiae, neurological complications,

hemoconcentration, hemolysis, and intravenous therapy affect blood collection.

9. Describe methods used to prevent these interferences.

Module #2 Test 2

Material Covered

Chapters 10, 11, 12

Chapter 10 Venipuncture Procedures

1. Describe the steps a health care worker should take in preparing him- or herself for a venipuncture procedure.

2. List supplies and equipment used in a typical venipuncture procedure.

3. Describe detailed steps in the patient identification process and what to do if information is missing.

4. Describe methods for hand hygiene.

5. Identify the most appropriate sites for venipuncture and situations when these sites might not be acceptable.

6. Identify alternative sites for the venipuncture procedure.

7. Describe the process and time limits for applying a tourniquet to a patient's arm.

8. Describe the decontamination process and the agents used to decontaminate skin for routine blood tests and blood cultures.

9. Describe the steps of a venipuncture procedure using the evacuated tube method, syringe method, and butterfly method according to the CLSI Approved Standard.

10. Describe the "order of draw" for collection tubes.

11. Describe how to react when the patient has fainted or experiences nausea, vomiting, or convulsions.

12. Define and explain the clinical reason for the terms *fasting*, *STAT*, and *timed specimens*. Chapter 11 Capillary Blood Specimens

1. Describe the reasons for acquiring capillary blood specimens for adults, children, and infants.

2. List common laboratory tests for which capillary specimens may be collected.

3. Explain why capillary blood from a skin puncture is different from blood taken by venipuncture and the impact on laboratory tests.

4. Identify the proper sites for performing a skin puncture procedure and explain why it is necessary to control the depth of the incision.

5. Describe the procedure for performing a skin puncture.

6. Describe the purpose and procedure for making blood smears and and the characteristics of an acceptable blood smear.

Chapter 12 Specimen Handling, Transportation, and Processing

1. Describe at least three sources of preexamination error that can occur during blood specimen handling.

2. Describe at least three sources of preexamination error that can occur during blood specimen transportation.

3. Describe at least three sources of preexamination error that can occur during specimen processing or storage.

4. Name three methods commonly used to transport specimens.

5. Describe at least three basic shipping requirements for the safe transportation of infectious substances.

Module #3 Test 3

Materials Covered

Chapters 1, 2, 3

Chapter 1 Phlebotomy Practice and Quality Assessment

1. Define phlebotomy and identify health professionals who perform phlebotomy procedures.

- 2. Identify the importance of phlebotomy procedures to the overall care of the patient.
- 3. List professional competencies for phlebotomists, the role in delivering, collecting and/or

transporting specimens the laboratory, and key elements of a performance assessment.

4. List members of a health care team who interact with phlebotomists.

5. Describe the roles and qualifications of clinical laboratory personnel and common laboratory departments/sections.

6. Describe the health care delivery system and settings in which phlebotomy services are routinely performed.

7. Describe the clinical laboratory workflow pathway, or testing cycle, from beginning laboratory requests to reporting laboratory test results.

- 8. Explain components of professionalism and desired character traits for phlebotomists.
- 9. Describe coping skills that are used to reduce stress in the workplace.

10. List the basic tools used in quality improvement activities and give examples of how a phlebotomist can participate in quality improvement activities.

11. Define the difference between quality improvement and quality control procedures.

Chapter 2 Communication, Computer Essentials, and Documentation

- 1. Outline the basic communication loop.
- 2. Describe methods for effective verbal and nonverbal communication, active listening, and written communication.
- 3. List examples of positive and negative body language.
- 4. Describe methods to achieve cultural competence and sensitivity in the workplace.

- 5. Describe the basic components of the medical record and provide examples of how to maintain confidentiality and privacy related to patient information.
- 6. Describe essential elements of laboratory test requisitions, specimen labels, and test results.
- 7. Identify potential clerical or technical errors that may occur during labeling or documentation of phlebotomy procedures.
- 8. Identify essential components and functions of computers in health care and list ways that health care workers use them to accomplish job functions.

Chapter 3 Professional Ethical, Legal, and Regulatory Issues

- 1. Define basic ethical and legal terms and explain how they differ.
- 2. Differentiate ethics and bioethics.</para></objective>
- 3. Describe types of consent used in health care settings, including informed consent and implied consent
- 4. Describe how to avoid litigation as it relates to blood collection.
- 5. Define standard of care from a legal and a health care provider's perspective.-
- 6. Identify key elements of the Health Insurance Portability and Accountability Act (HIPAA).
- 7. List key factors common to health professional liability insurance policies.
- 8. List common issues in lawsuits against health care providers and prevention tips to avoid lawsuits in phlebotomy.
- 9. Explain the term liability and what it means for health care providers.

Module #4 Test #4

Materials Covered

Chapters 5, 6, 7

Chapter 5 Safety and First Aid

- 1. Discuss safety awareness for health care workers.
- 2. Explain the measures that should be taken for fire, electrical, radiation, mechanical, and chemical safety in a health care facility.
- 3. Describe the essential elements of a disaster emergency plan for a health care facility.
- 4. Explain the safety policies and procedures that must be followed in specimen collection and transportation.
- 5. Describe the safe use of equipment in health care facilities.
- 6. List three precautions that can reduce the risk of injury to patients.

Chapter 6 Medical Terminology, Anatomy, and Physiology of Organ Systems

- 1. Define medical terminology using word elements such as roots, prefixes, and suffixes.
- 2. Define words commonly used in the clinical laboratory.
- 3. Describe how laboratory testing is used to assess body functions and disease,
- 4. Define the differences among the terms anatomy, physiology, and pathology.
- 5. Describe the directional terms, anatomic surface regions, and cavities of the body.
- 6. Describe the role of homeostasis in normal body functioning.
- 7. Describe the purpose, function, and structural components of the major body systems.
- 8. Identify examples of pathologic conditions associated with each organ system.
- 9. Describe the types of specimens that are analyzed in the clinical laboratory.
- 10. List common diagnostic tests associated with each organ system.

Chapter 7 Cardiovascular and Lymphatic Systems

- 1. Define the functions of the cardiovascular and lymphatic systems.
- 2. Identify and describe the structures and functions of the heart.

3. List pathologic conditions and common laboratory tests associated with the cardiovascular and lymphatic systems.

4. Trace the flow of blood through the cardiovascular system.

5. Describe different types of blood vessels, the properties of arterial blood, venous blood, and capillary blood.

- 6. Identify and describe the cellular and noncellular components of blood.
- 7. Describe the differences and similarities between whole blood, serum, and plasma.
- 8. Locate and name the veins most commonly used for phlebotomy procedures.
- 9. Define hemostasis and describe the basic process of coagulation and fibrinolysis.

*Students – please refer to the Instructor's Course Information sheet for specific information on assessments and due dates.

Part III: Grading and Assessment

EVALUATION OF REQUIRED COURSE MEASURES/ARTIFACTS*:

Students' performance will be assessed, and the weight associated with the various measures/artifacts are listed below.

EVALUATION*

Homework	10%
Quizzes/Competencies	10%
Tests	45%
Final Exam	<u>35%</u>
	100%
	Students must make a 70% to pass AHS 141

*Students, for the specific number and type of evaluations, please refer to the Instructor's Course Information Sheet.

GRADING SYSTEM:

State the College's or departmental grading system as delineated in the Catalog. Please note the College adheres to a 10-point grading scale A = 100 - 90, B = 89 - 80, C = 79 - 70, D = 69 - 60, F = 59 and below. You must have your Dean's approval if changes in the scale are made.

Grades earned in courses impact academic progression and financial aid status. Before withdrawing from a course, be sure to talk with your instructor and financial aid counselor

about the implications of that course of action. Ds, Fs, Ws, WFs and Is also negatively impact academic progression and financial aid status.

The Add/Drop Period is the first 5 days of the semester for **full term** classes. Add/Drop periods are shorter for accelerated format courses. Please refer to the <u>academic calendar</u> for deadlines for add/drop. You must attend at least one meeting of all your classes during that period. If you do not, you will be dropped from the course(s) and your Financial Aid will be reduced accordingly.

Part IV: Attendance

Horry-Georgetown Technical College maintains a general attendance policy requiring students to be present for a minimum of 80 percent (80%) of their classes in order to receive credit for any course. Due to the varied nature of courses taught at the college, some faculty may require up to 90 percent (90%) attendance. Pursuant to 34 Code of Federal Regulations 228.22 - Return to Title IV Funds, once a student has missed over 20% of the course or has missed two (2) consecutive weeks, the faculty is obligated to withdraw the student, and a student may not be permitted to reenroll. **Instructors define absentee limits for their class at the beginning of each term; please refer to the Instructor Course Information Sheet.**

Students are responsible for all course work and class assignments; therefore, they are expected to regularly and promptly attend each meeting of classes for which they are enrolled. Students should limit absences to those that are unavoidable and, with the professor's consent, should make up all work missed. If a student is absent on test day, they are responsible for contacting the professor and making that test up within one week of original date taken. It must be made up prior to the following classroom lecture. The test will be made up at the testing center. The student is responsible for making an appointment with the testing center to make up the missed test. The student must also let the professor know the day, date, time, and which testing center the test will be made up at. If they do not take the test before the next lecture, they will receive a 0 grade for that test. A student may miss 10% of the total lecture classroom hours for any reason. The student should also understand that arriving to class late or leaving class early counts towards the allotted hours of time missed. Once the student misses more than 10% of the hours either lecture or lab, the student will be terminated from the course. Tardiness should be avoided. Three tardies count as one absence. If tardy more than 7 minutes, it will count as an absence. If a student leaves early from lecture or lab, it will also count as an absence.

Attendance records begin on the first day of class for both new and returning students, regardless of when he/she registers during the five-day registration and add/drop period at the beginning of each term.

Lab Attendance Requirements

The lab meeting times are included in the attendance policy in the same manner as a regular lecture meeting. This means that a student may miss 10% of the lab hours and will be withdrawn from the course if more time is missed.

The student will be expected to pass the lab competencies, with a grade of no less than 80%. The lab competencies include hand washing, PPE's, tourniquet tying, venipuncture procedures, and butterfly procedures. All competencies will include "criticals." If any critical is missed during the competency, the competency will be stopped, and the student will receive the grade at that point of the competency. All competency grades will be given by the first attempt. If on the second attempt, the student shows they are competency after three attempts, they will be withdrawn, with a "W", from the AHS 141 course.

If a student skips a semester between AHS141 and AHS 167, they will be responsible for all requirements, including immunizations, to proceed to the next course.

Part V: Student Resources



THE STUDENT SUCCESS AND TUTORING CENTER (SSTC):

The SSTC offers to all students the following **<u>free</u>** resources:

- 1. Academic tutors for most subject areas, Writing Center support, and Academic Coaching for college success skills.
- 2. Online tutoring and academic support resources.
- 3. Professional and interpersonal communication coaching in the EPIC Labs.

Visit the <u>Student Success & Tutoring Center</u> website for more information. To schedule tutoring or coaching, contact the SSTC at sstc@hgtc.edu or self-schedule in the Penji iOS/Android app or at <u>www.penjiapp.com</u>. Email <u>sstc@hgtc.edu</u> or call SSTC Conway, 349-7872; SSTC Grand Strand, 477-2113; and SSTC Georgetown, 520-1455, or go to the SSTC <u>Online Resource</u> <u>Center</u> to access on-demand resources.



STUDENT INFORMATION CENTER: TECH Central

TECH Central offers to all students the following <u>free</u> resources:

1. Getting around HGTC: General information and guidance for enrollment, financial aid, registration, and payment plan support!

2. In-person and remote assistance are available for Desire2Learn, Student Portal, Degree Works, and Office 365.

3. Chat with our staff on TECH Talk, our live chat service. TECH Talk can be accessed on the student portal and on TECH Central's website, or by texting questions to (843) 375-8552. Visit the Tech Central website for more information. Live Chat and Center locations are posted on the website. Or please call (843) 349 – TECH (8324), Option # 1.



HGTC LIBRARY:

Each campus location has a library where HGTC students, faculty, and staff may check out materials with their HGTC ID. All three HGTC campus libraries have librarians and staff who can aid with research, computers to support academic research and related school-work, and individual/group study rooms. Printing is available as well at each location. Visit the <u>Library</u> website for more information or call (843) 349-5268.

STUDENT TESTING:

Testing in an **online/hybrid** course and in **make-up exam** situations may be accomplished in a variety of ways:

- Test administered within D2L.
- Test administered in writing on paper.
- Test administered through Publisher Platforms (which may have a fee associated with the usage)

Furthermore, tests may have time limits and/or require a proctor.

Testing candidates must make their appointments 24 hours in advance.

Students must bring a physical ID in order to take a test.

Proctoring can be accomplished either face-to-face at an approved site or online through our online proctoring service. To find out more about proctoring services, please visit the <u>Online</u> <u>Testing</u> section of the HGTC's Testing Center webpage.

The **Instructor Information Sheet** will have more details on test requirements for your course.

DISABILITY SERVICES:

HGTC is committed to providing an accessible environment for students with disabilities. Students seeking accommodations are encouraged to visit HGTC's <u>Accessibility and Disability</u> <u>Service webpage</u> for detailed information.

It is the student's responsibility to self-identify as needing accommodations and to provide appropriate documentation. Once documentation is submitted, the student will participate in an interactive process with Accessibility and Disability Services staff to determine reasonable accommodations. Students may begin the accommodations process at any time; however, accommodations are **not retroactive** and will only be applied from the point at which they are approved. Students must contact the office **each semester** to renew their accommodations.

For assistance, please contact the Accessibility and Disability Services team at <u>disabilityservices@hgtc.edu</u> or 843-796-8818 (call or text).

COUNSELING SERVICES:

HGTC Counseling Services strives to optimize student success through managing personal and academic concerns that may interfere with achieving educational goals. Staff are available to every student for assistance and guidance on personal matters, academic concerns and other areas of concern. HGTC offers free in-person and telehealth counseling services to students. For more information about counseling services, please reach out to <u>counseling@hgtc.edu</u> or visit the website the <u>Counseling Services webpage</u>.

STATEMENT OF EQUAL OPPORTUNITY/NON-DISCRIMINATION STATEMENT:

Our sincere commitment to both effective business management and equitable treatment of our employees requires that we present this Policy Statement as an embodiment of that commitment to the fullest.

Discrimination is conduct that includes unjust or prejudicial treatment based upon an individual's sex, race/color, religion, national origin, age, disability, service in the uniformed services (as defined in state and federal law), veteran status, political ideas, marital or family status, pregnancy, childbirth, or related medical conditions, including, but not limited to, lactation, genetic information, genetic identity, gender expression, or sexual orientation that excludes an individual from participation in, denies the individual the benefits of, treats the individual differently, or otherwise adversely affects a term or condition of a person's working or learning environment. This includes failing to provide reasonable accommodation, consistent with state and federal law, to persons with disabilities.

INQUIRIES REGARDING THE NON-DISCRIMINATION/TITLE IX POLICIES:

Student and prospective student inquiries concerning Section 504, Title II, Title VII, and Title IX and their application to the College or any student decision may be directed to the Vice President for Student Affairs.

Dr. Melissa Batten, VP Student Affairs *Title IX, Section 504, and Title II Coordinator* Building 1100, Room 107A, Conway Campus PO Box 261966, Conway, SC 29528-6066 843-349-5228 <u>Melissa.Batten@hgtc.edu</u>

Employee and applicant inquiries concerning Section 504, Title II, and Title IX and their application to the College may be directed to the Vice President for Human Resources.

Jacquelyne Snyder, VP Human Resources Affirmative Action/Equal Opportunity Officer and Title IX Coordinator Building 200, Room 205B, Conway Campus PO Box 261966, Conway, SC 29528-6066 843-349-5212 Jacquelyne.Snyder@hgtc.edu

TITLE IX REQUIREMENTS:

Title IX of the Education Amendments of 1972 protects students, employees, applicants for admission and employment, and other persons from all forms of sex discrimination.

HGTC prohibits the offenses of domestic violence, dating violence, sexual assault, and stalking and will provide students, faculty, and staff with necessary information regarding prevention, policies, procedures, and resources.

Any student, or other member of the college community, who believes that they have been a victim of sexual harassment, domestic violence, dating violence, sexual assault, or stalking may file a report with the college's Title IX Coordinator or campus law enforcement*.

*Faculty and Staff are required to report these incidents to the Title IX Coordinator when involving students. The only HGTC employees exempt from mandatory reporting are licensed mental health professionals (only as part of their job description such as counseling services).

Student and prospective student inquiries concerning Title IX and its application to the College or any student decision may be directed to the Vice President for Student Affairs.

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PREGNANCY ACCOMMODATIONS

Under Title IX, colleges must not exclude a pregnant student from participating in any part of an educational program. Horry-Georgetown Technical College is committed to ensuring that pregnant students receive reasonable accommodations to ensure access to our educational programs.

Students should advise the Title IX Coordinator of a potential need for accommodations as soon as they know they are pregnant. It is extremely important that communication between student, instructors, and the Title IX Coordinator begin as soon as possible. Each situation is unique and will be addressed individually.

Title IX accommodations DO NOT apply to Financial Aid. Financial Aid regulations do not give the College any discretion in terms of Financial Aid eligibility.

Certain educational programs may have strict certification requirements or requirements mandated by outside regulatory agencies. Therefore, in some programs, the application of Title IX accommodations may be limited.

To request pregnancy accommodations, please complete the *Pregnancy Intake Form* that can be found <u>here</u>.

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