

# INSTRUCTIONAL PACKAGE

## CPT 168

## PROGRAMMING LOGIC AND DESIGN

Effective Term AY 2019/2020

## **INSTRUCTIONAL PACKAGE**

## **Part I: Course Information**

Effective Term: AY 2019/2020

COURSE PREFIX: CPT 168 COURSE TITLE: PROGRAMMING LOGIC AND DESIGN CONTACT HOURS: 5 CREDIT HOURS: 3

#### **RATIONALE FOR THE COURSE:**

This is an introductory course in computer programming logic that is designed to give the student the basic tools needed to solve complex programming problems on the computer. The skills taught in this course provide the foundation concepts for future programming courses and for the networking field.

#### **COURSE DESCRIPTION:**

This course examines problem-solving techniques applied to program design. Topics include a variety of documentation techniques as means of solution presentation.

#### PREREQUISITES/CO-REQUISITES:

(Credit level MAT 101 Minimum Grade of C or Credit level MAT 101 Minimum Grade of TC or Credit level MAT 110 Minimum Grade of TC or ACCUPLACER Elementary Algebra 075 or New ACCUPLACER Adv Algebra 230 or COMPANION Elementary Algebra 075 or Multiple Measures Math 1 or SAT Mathematics 460 or New SAT Mathematics 500 or ACT Math 19) and (Credit level ENG 155 Minimum Grade of C or Credit level ENG 155 Minimum Grade of TC or ( ACCUPLACER Reading Comp 075 and ACCUPLACER Sentence Skills 081) or ( New ACCUPLACER Reading 075 and COMPANION Reading 075 and COMPANION Sentence Skills 081) or ( Multiple Measures English 1) or SAT Critical Reading 480 or ( ACT Reading 19 and ACT English 19) or Credit level ENG 101 Minimum Grade of C or Credit level ENG 101 Minimum Grade of C or Credit level ENG 101 Minimum Grade of C or Credit level ENG 101 Minimum Grade of C or Credit level ENG 101 Minimum Grade of C or Credit level ENG 101 Minimum Grade of C or Credit level ENG 100 Minimum Grade of C\*)

\***Online/Hybrid** courses require students to complete the DLi Online Student Orientation prior to completing an online course. The DLi Online Student Orientation can be found in WaveNet, under the My Student tab.

#### **REQUIRED MATERIALS:**

Please visit the Bookstore online site for most current textbook information. Use the direct link below to find textbooks. BOOKSTORE.

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

#### **ADDITIONAL REQUIREMENTS:**

This class will require considerable time and effort outside of the regular class hours in order to successfully complete the project, labs, and exams.

USB Jump Drive

All assignments are due by the due date and time, no exceptions. If there is an issue with the student's home computer or the student does not have a home computer, the student must schedule time on campus in a computer lab to complete assignments until the student home computer is working properly.

#### **TECHNICAL REQUIREMENTS:**

Access to Desire2Learn (D2L), HGTC's student portal for course materials. WaveNet and D2L email access. Web browser, Mozilla Firefox or Google Chrome are preferred

#### **STUDENT IDENTIFICATION VERIFICATION**

Students enrolled in online courses will be required to participate in a minimum of one (1) proctored assignment and/or one (1) virtual event to support student identification verification. Please refer to your Instructor Information Sheet for information regarding this requirement.

#### **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 for an emergency, please notify your professor prior to class and switch cell phone ringers to vibrate.

**NETIQUETTE**: is the term commonly used to refer to conventions adopted by Internet users on the web, mailing lists, public forums, and in live chat focused on online communications etiquette. For more information regarding Netiquette expectations for distance learning courses, please visit <u>Online</u> <u>Netiquette</u>.

### **Part II: Student Learning Outcomes**

#### **COURSE LEARNING OUTCOMES and ASSESSMENTS\*:**

- Demonstrate the mastery of Sequence, Selection, Repetition, and Array programming structures using Flowcharts and Python code.
- Use variables and parameters with programmer-defined methods linked to defined events in Raptor and Python.
- Identify common terminology used in Object-Oriented Programming.
- Use Sequence, Selection, Repetition, and Array structures to solve programming problems in Raptor

and Python.

#### **Required Course Measures/Artifacts**

- Exams
  - Exam 1 (Chapters 1-2)
  - Exam 2 (Chapters 3)
  - Exam 3 (Chapters 4-5)
- Programming Challenges
  - Programming Challenges for Chapters 1-6
- Final Exam
- Quizzes for Chapters 1-6

## \*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\***

Exams	45%
Programming Exercises	30%
Quizzes	10%
Final Exam	15%
Total Points	100%

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

#### **GRADING SYSTEM:**

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 academic calendar for deadlines for add/drop (<u>ACADEMIC CALENDAR</u>). You must attend at least one meeting of all of 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.

**For online and hybrid courses**, check your Instructor's Course Information Sheet for any required on-site meeting times. Please note, instructors may require tests to be taken at approved testing sites, if you use a testing center other than those provided by HGTC, the center may charge a fee for its services.

### **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 coaches for most subject areas, Writing Center Support, and college success skills.
- 2. On-line student success and academic support resources.

Visit the SSTC website: <u>Student Success & Tutoring Center</u> and visit the student services tab in your WaveNet account to schedule appointments using TutorTrac. For more information, call: SSTC Conway, 349-7872; SSTC Grand Strand, 477-2113; and SSTC Georgetown, 520-1455 or go to the <u>Online Resource Center</u> to access on-demand resources any time.



## Student Information Center: WaveNet Central (WNC)

WNC offers to all students the following **free** resources:

- 1. **Getting around HGTC**: General information and guidance for enrollment!
- 2. Use the **Online Resource Center (ORC)** for COMPASS support, technology education, and online tools.
- 3. Drop-in technology support or scheduled training in the Center or in class.
- 4. In-person workshops, online tutorials and more services are available.

Visit the WNC website: <u>Wavenet Central</u>. Live Chat and Center locations are posted on the website. Or please call one of the following locations: WNC Conway, 349-5182; WNC Grand Strand, 477-2076; and WNC Georgetown, 520-1473.

## **Student Testing:**

Testing in an **online/hybrid** course may be accomplished in a variety of ways:

- Test administered within D2L
- Test administered in writing on paper
- Test administered through Publisher Platforms

Further more tests may have time limits and/or require a proctor.

Proctoring can be accomplished either face-to-face at an approved site or online through RPNow, our online proctoring service. To find out more about proctoring services, please visit the <u>Online 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. Inquiries may be directed to Beth Havens, Director of Student Development on the Conway Campus Jaime Davis, Counselor/Advisor on the Georgetown Campus or Kristin Griffin, Counselor on the Grand Strand Campus. These individuals will review documentation of the student's disability and, in a confidential setting with the student, develop an educational accommodation plan.

Note: It is the student's responsibility to self-identify as needing accommodations and to provide acceptable documentation. After a student has self-identified and submitted documentation of a disability, accommodations may be determined, accepted, and provided.

### Statement of Equal Opportunity/Non-Discrimination Statement

Horry-Georgetown Technical College prohibits discrimination and harassment, including sexual harassment and abuse, on the basis of race, color, sex, national or ethnic origin, age, religion, disability, marital or family status, veteran status, political ideas, sexual orientation, gender identity, or pregnancy, childbirth, or related medical conditions, including, but not limited to, lactation in educational programs and/or activities.

Inquiries regarding the non-discrimination policies: Students and prospective student inquiries concerning Section 504, Title II, 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 Coordinator, Building 1100, Room 107A, Conway Campus, PO Box 261966, Conway, SC 29528-6066, 843-349-5228, Melissa.Batten@hgtc.edu. 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, Section 504, Title II, and Title IX Coordinator, Building 200, Room 212A, Conway Campus, PO Box 261966, Conway, SC 29528-6066, 843-349-5212, <u>Jacquelyne.Snyder@hgtc.edu</u>.

#### **Title IX Requirements**

All students (as well as other persons) at Horry-Georgetown Technical College are protected by Title IX—regardless of their sex, sexual orientation, gender identity, part- or full-time status, disability, race, or national origin—in all aspects of educational programs and activities. Any student, or other member of the college community, who believes that he/she is or has been a victim of sexual harassment or sexual violence may file a report with the college's Chief Student Services Officer, campus law enforcement, or with the college's Title IX Coordinator, or designee.

\*Faculty and Staff are required to report incidents to the Title IX Coordinators 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).

Inquiries regarding the non- discrimination policies:		
Student and prospective student inquiries concerning Section 504, Title II, and Title IX and their application to the College or any student decision may be directed to the Vice President for Student Affairs.	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.	
Dr. Melissa Batten, VP Student Affairs	Jacquelyne Snyder, VP Human	
Title IX Coordinator	Resources	
	Section 504, Title II, and Title IX Coordinator	
Building 1100, Room 107A, Conway	Building 200, Room 212A, Conway Campus	
Campus	PO Box 261966, Conway, SC 29528-	
PO Box 261966, Conway, SC 29528-	6066	
6066	843-349-5212	
843-349-5228	<u>Jacquelyne.Snyder@hgtc.edu</u>	
<u>Melissa.Batten@hgtc.edu</u>		