CENTRAL CAROLINA COMMUNITY COLLEGE

Health Sciences

Program Planning Guide

Medical Coding and Billing, Diploma (D45360)

The Health Information Technology curriculum is designed to provide individuals with the technical knowledge and skills to process, analyze, maintain, and report health information data in compliance with legal, accreditation, licensure, and certification standards.

Coursework includes diagnosis and procedure coding/classification systems, privacy and security strategies, revenue cycle management, and regulatory compliance..

Employment opportunities include hospitals, rehabilitation facilities, nursing homes, health insurance organizations, outpatient clinics, physicians' offices, hospice, and mental health facilities.

Upon completion, students may qualify to pursue the valuable and highly regarded industry credential of Certified Coding Specialist (CCS) issued by the American Health Information Management Association (AHIMA) and/or the Certified Professional Coder (CPC) credential issued by the American Academy of Professional Coders (AAPC).

Program Length: 3 semesters
Program Sites: Harnett Health Sciences (Online/Evening) required day hours during Professional Practice Courses
Career Pathway Options: Associate in Applied Science in Health Information Technology, Diploma, Certificate(s)

Suggested Course Schedule		**Class**	**Lab**	**Clinical**	**Credits**	**Notes:**
1st Semester (Fall)						
ACA 122	College Transfer Success	0	2	0	1	
BIO 163	Basic Anatomy & Physiology	4	2	0	5	16 Week (Section **LCA**)
ENG 111	Writing & Inquiry	3	0	0	3	
HIT 110	Intro to Healthcare & HIM	3	0	0	3	1st 8 Week
MED 121	Medical Terminology I	3	0	0	3	1st 8 Week or 2nd 8 Week
MED 122	Medical Terminology II	3	0	0	3	1st 8 Week or 2nd 8 Week
	Total Semester Hours	**16**	**4**	**0**	**18**	
2nd Semester (Spring)						
CIS 110	Introduction to Computers	2	2	0	3	
HIT 114	Health Data Systems/Standards	2	3	0	3	2nd 8 Week
HIT 211	Diagnosis Coding & Reporting	2	3	0	3	16 Week

Effective Term: 2021FA (revised 7/2024)

HIT 213	Inpatient Procedure Coding	1	3	0	2	16 Week
HIT 215	Revenue Cycle Management	1	3	0	2	1st 8 Week
HIT 226	Pathophysiology & Pharmacology	2	3	0	3	1st 8 Week
HIT 124	Professional Practice Exp II +	0	0	3	1	2nd 8 Week
	Total Semester Hours	**10**	**17**	**3**	**17**	
3rd Semester (Summer)						
HIT 112	Health Law and Ethics	3	0	0	3	8 Week (Summer)
HIT 214	Outpatient Procedure Coding	1	3	0	2	8 Week (Summer)
HIT 222	Professional Practice Exp III +	0	0	6	2	8 Week (Summer)
MAT 152	Statistical Methods	3	2	0	4	
	Total Semester Hours	**7**	**5**	**6**	**11**	
Total Semester Hours Credit Required for Graduation: 46						

Course Descriptions

ACA 122 College Transfer Success
Semesters Offered: FA/SP/SU
This course provides information and strategies necessary to develop clear academic and professional goals beyond the community college experience. Topics include the CAA, college policies and culture, career exploration, gathering information on senior institutions, strategic planning, critical thinking, and communications skills for a successful academic transition. Upon completion, students should be able to develop an academic plan to transition successfully to senior institutions. This course has been approved for transfer under the CAA and ICAA as a premajor and/or elective course requirement.

BIO 163 Basic Anatomy & Physiology
Semesters Offered: FA/SP
This course provides a basic study of the structure and function of the human body. Topics include a basic study of the body systems as well as an introduction to homeostasis, cells, tissues, nutrition, acid-base balance, and electrolytes. Upon completion, students should be able to demonstrate a basic understanding of the fundamental principles of anatomy and physiology and their interrelationships. This course has been approved for transfer under the CAA and ICAA as a premajor and/or elective course requirement.

CIS 110 Introduction to Computers
Semesters Offered: FA/SP/SU
This course introduces computer concepts, including fundamental functions and operations of the computer. Topics include identification of hardware components, basic computer operations, security issues and use of software applications. Upon completion, students should be able to demonstrate an understanding of the role and function of computers and use the computer to solve problems. This course has been approved for transfer under the CAA and ICAA as a general education course in Mathematics (Quantitative).

ENG 111 Writing and Inquiry
Semesters Offered: FA/SP/SU
Prerequisites: ENG 002 P1 grade or Corequisite ENG 011
This course is designed to develop the ability to produce clear writing in a variety of genres and formats using a recursive process. Emphasis includes inquiry, analysis, effective use of rhetorical strategies, thesis development, audience awareness, and revision. Upon completion, students should be able to produce unified, coherent, well developed essays using standard written English. This course has been approved for transfer under the CAA and ICAA as a universal general education transfer component (UGETC) course in English Composition.

MAT 152 Statistical Methods I
Semesters Offered: FA/SP/SU
Prerequisite: Take one set: 1. DMA-010, DMA-020, DMA-030, DMA-040, DMA-050, & DRE-098; 2. DMA-010, DMA-020, DMA030, DMA-045, & DRE-098; 3. DMA-025, DMA-040, DMA-050, and DRE-098; 4. DMA-025, DMA-045, & DRE-098; 5. MAT-003 & ENG-002; 6. MAT-003 & ENG-111; 7. MAT-003 & DRE-098; 8. DMA-010, DMA-020, DMA-030, DMA-040, DMA-050, & ENG002; 9. DMA-010, DMA-020, DMA-030, DMA-045, & ENG-002; 10. DMA-025, DMA-040, DMA-050, & ENG-002; 11. DMA-025, DMA-045, & ENG-002
This course provides a project-based approach to introductory statistics with an emphasis on using real-world data and statistical literacy. Topics include descriptive statistics, correlation and regression, basic probability, discrete and continuous probability distributions, confidence intervals and hypothesis testing. Upon completion, students should be able to use appropriate technology to describe important characteristics of a data set, draw inferences about a population from sample data, and interpret and communicate results. This course has been approved for transfer under the CAA and ICAA as a universal general education transfer component (UGETC) course in Mathematics.

HIT 110 Intro to Healthcare & HIM
Semesters Offered: FA/SP
This course introduces healthcare settings and the Health Information Management (HIM) professional's role in healthcare delivery systems. Topics include health information management operations in compliance with standards, regulations, and accrediting body initiatives; healthcare providers and disciplines; and electronic health records (EHRs). Upon completion, student should be able to demonstrate an understanding of health information management and healthcare organizations, professions, and trends.

HIT 112 Health Law and Ethics
Semesters Offered: FA/SP/SU
This course covers the study of the judicial, legislative, and regulatory standards applicable to health care and health information processes. Topics include legal terminology, Confidentiality, privacy, security, access and disclosure of health information, ethical implications, data stewardship, and the integrity of the legal health record. Upon Completion, students should be able to apply policies, procedures, and ethical standards in compliance with external forces.

HIT 114 Health Data Systems/Standards
Semesters Offered: FA/SP
This course covers concepts and techniques for managing and maintaining all health record formats including electronic health records (EHR). Topics include structure and use of health information including data collection and analysis, data sources/sets, archival systems, as well as quality and integrity of healthcare data. Upon completion, students should be able to determine compliance of health record content and governance standards within the health organization.

HIT 124 Prof Practice Exp II
Semesters Offered: FA/SP/SU
This course provides supervised clinical experience in healthcare settings. Emphasis is placed on practical application of curriculum concepts to the healthcare setting. Upon completion, students should be able to apply health information theory to healthcare facility practices.

HIT 211 Diagnosis Coding & Reporting
Semesters Offered: FA/SP
This course covers diagnostic coding and sequencing utilizing the current version of the ICD code set for inpatient, outpatient, and ambulatory care settings. Emphasis is placed on the rules and conventions of the ICD official coding guidelines in relation to anatomy, physiology, and disease processes. Upon completion, students should be able to accurately assign and sequence diagnosis codes in compliance with the ICD official coding guidelines for reporting statistical data, patient outcomes, and reimbursement methodologies.

HIT 213 Inpatient Procedure Coding & Reporting
Semesters Offered: FA/SP
This course covers the application of coding guidelines as applied to the reporting of inpatient procedures. Emphasis is placed on the rules and conventions of the ICD-PCS code set utilizing the index and tables, in relation to anatomy and physiology, to assign principal and secondary procedure codes in hospital inpatient settings. Upon completion, students should be able to accurately assign procedural codes according to the official ICD-PCS coding guidelines and evaluate compliance with regulatory requirements and reimbursement methodologies.

HIT 214 Outpatient Procedure Coding/Reporting
Semesters Offered: FA/SU
Prerequisite: HIT 211
This course covers application of coding and reporting standards as they apply to Current Procedural Terminology (CPT) guidelines and principles. Emphasis is placed on application of the coding guidelines, in relation to anatomy and physiology, for ambulatory healthcare settings. Upon completion, students should be able to assign CPT/HCPCS

procedural codes according to official guidelines and evaluate compliance with regulatory requirements and reimbursement methodologies.

HIT 215 Revenue Cycle Management
Semesters Offered: FA/SP
This course covers the revenue cycle management process used in all healthcare settings as they relate to national billing, compliance, and reporting requirements. Topics include clinical documentation improvement, prospective payment systems, billing processes and procedures, chargemaster maintenance, regulatory guidelines, fraud and abuse, reimbursement monitoring, compliance strategies and reporting. Upon completion, students should be able to perform data quality reviews to validate code assignment and comply with reimbursement and reporting requirements.

HIT 222 Prof Practice Exp III
Semesters Offered: FA/SP
This course provides supervised and/or simulated health information technology clinical experience in healthcare settings. Emphasis is placed on practical application of HIM functions and core curriculum concepts. Upon completion, students should be able to apply health information theory to healthcare facility practices.

HIT 226 Pathophysiology & Pharmacology
Semesters Offered: FA/SP/SU
Prerequisite: BIO 163 or BIO 166 or BIO 169
This course covers principles of disease and the associated pharmacological treatments. Emphasis is placed on physical signs and symptoms, prognoses, common complications, and therapeutic options. Upon completion, students should be able to relate disease processes to physical signs and symptoms, prognosis, common complications, and their management.

MED 121 Medical Terminology I
Semesters Offered: FA/SP/SU
This course introduces prefixes, suffixes, and word roots used in the language of medicine. Topics include medical vocabulary and the terms that relate to the anatomy, physiology, pathological conditions, and treatment of selected systems. Upon completion, students should be able to pronounce, spell, and define medical terms as related to selected body systems and their pathological disorders.

MED 122 Medical Terminology II
Semesters Offered: FA/SP/SU
Prerequisite: MED 121
This course is the second in a series of medical terminology courses. Topics include medical vocabulary and the terms that relate to the anatomy, physiology, pathological conditions, and treatment of selected systems. Upon completion, students should be able to pronounce, spell, and define medical terms as related to selected body systems and their pathological disorders.