Health Information Technology and Cancer Information

Degrees, Certificates and Awards
Associate in Science Health Information Technology
Associate in Science Cancer Information Management
Certificate of Achievement Medical Coding Specialist
Certificate of Achievement Cancer Information Management

Program Description
Opportunities in the health information field have expanded with changes in health care delivery, utilization and reimbursement and with developments in information technology. The Health Information Technology and Cancer Information Management Department offers four exciting options to prepare for a health information career: (1) the Associate in Science in Health Information Technology; (2) the Associate in Science in Cancer Information Management; (3) the Certificate of Achievement in Cancer Information Management; and (4) the Certificate of Achievement in Medical Coding Specialist. These programs are all offered completely online.

Students must have access to the Internet to enroll in these programs and must complete online orientation activities as the first assignment of each course. Students must meet online technical requirements. Core elements of each online lecture course include successful completion of the course objectives using the Internet, textbooks, study materials and computer applications. Examinations are online. Professional directed practice, under the guidance of a clinical preceptor, is provided at facilities as close as possible to each student’s residence.

Health Information Technology
The Health Information Technology (HIT) Program prepares students for a career that places them where the expanding arena of healthcare meets the cutting edge of technology. HIT professionals are the experts on patient data that doctors, nurses and other providers rely on to perform their jobs and which consumers need to manage their own healthcare. By maintaining, collecting, analyzing and securing health information, their work makes an important contribution to the delivery of quality care.

Graduates of the program are granted the Associate in Science Degree in Health Information Technology. The program is accredited by the Commission on Accreditation for Health Informatics and Information Management Education (CAHIIM). Graduates are eligible to take the national credentialing exam to become a Registered Health Information Technician (RHIT). CAHIIM is located at 233 N. Michigan Avenue, 21st Floor, Chicago, IL 60601-5800 or CAHIIM can be contacted via e-mail at info@cahiim.org

Cancer Information Management
The Cancer Information Management (CIM) Program prepares students for positions with hospital-based and population-based cancer registries. Responsibilities typically include identification of reportable cancer cases; abstraction of pertinent cancer data from patient records and pathology, radiology and surgical reports; coding and staging primary site, histology and extent of disease; monitoring completeness, timeliness and quality of cancer data; performing cancer patient follow-up activities to identify second primaries, recurrence and spread of disease; reporting cancer data to health care officials, hospital administrators, physicians and regulatory organizations for use in cancer prevention and control; assisting the medical staff and epidemiologists in special studies and research; and supervising staff.

Graduates of this program who earn the Associate in Science Degree in Cancer Information Management are eligible to take the national credentialing exam to become a Certified Tumor Registrar (CTR). Graduates who earn the Certificate of Achievement in Cancer Information Management and who have an Associate Degree or higher in any field are also eligible to the CTR exam. The program is accredited by the National Cancer Registrars Association (NCRA).

Medical Coding Specialist
This completely online certificate program prepares students for a position as a medical coder in an acute care hospital, clinic or physician’s office, long-term care facility, and other health care settings. Coders ensure that valid codes are applied to medical diagnoses and procedures per coding classification guidelines and to facilitate reimbursement, analyze patient outcomes, and medical research.

The Medical Coding Specialist Certificate of Achievement prepares students to take the national certification examination to become a Certified Coding Associate (CCA) offered by AHIMA. This program is approved by the American Health Information
Management Association (AHIMA). AHIMA is located at 233 N. Michigan Avenue, 21st Floor, Chicago, IL 60601-5809 or at (312) 233-1100.

**Program Student Learning Outcomes**

1. Apply biomedical knowledge to the process of clinical code assignment.
2. Analyze and communicate clinical and statistical data to improve patient care and facilitate financial planning.
3. Apply and demonstrate legal, ethical, accreditation and certification standards to health information.
4. Participate in planning and implementing clinical and administrative information systems in traditional and alternative healthcare settings.
5. Apply departmental and organizational standards to data storage, retrieval, retention and security.
6. Demonstrate the ability to work effectively as an individual and collaboratively in a group to resolve health information management challenges in a changing healthcare environment.

**Department Offices**

Health Information Technology and Cancer Information Management Programs ([hitcim@sbcc.edu](mailto:hitcim@sbcc.edu), ext. 2851)

Health Technologies Counselors ([hitcimadvising@sbcc.edu](mailto:hitcimadvising@sbcc.edu), ext. 2285)

Alan Price, *Dean* (A-218, ext. 3044)

**Faculty/Staff**

Denise Harrison, BS, CTR, *Chair, and Program Director, Cancer Information Management* ([dcharrison1@sbcc.edu](mailto:dcharrison1@sbcc.edu))

Janet Robertson, RHIA, *Program Director, Health Information Technology* ([robertson@sbcc.edu](mailto:robertson@sbcc.edu))

Lynette Williamson, MBA, RHIA, CCS, CPC, FAHIMA *Program Director, Medical Coding Specialist* ([lmwilliamson@sbcc.edu](mailto:lmwilliamson@sbcc.edu))

Shawna Sweeney, MSHI, RHIA, CCS, *Faculty*

**AS Degree: Health Information Technology**

**Department Requirements (48 units)**

*Recommended sequence of courses, offered online:*

- COMP 101 — Introduction to Computer Applications ........4
- HIT 135 — Basic Medical Terminology........................3
- BMS 146 — Human Form and Function ........................3
- HIT 101 — Intro. to Health Information Management........3
- HIT 102 — Legal Aspects of Health Care.......................3
- HIT 204 — Basic Pathophysiology ...............................3
- HIT 201 — Pharmacology for Allied Health .....................2
- HIT 202 — ICD, Diagnostic Coding .............................2
- HIT 203 — ICD, Procedural Coding .............................3
- HIT 210 — CPT Procedural Coding .............................3
- HIT 255+ — Medical Insurance and Reimbursement ..........4
- HIT 220 — Health Information Management Statistics .......2
- HIT 240 — Health Care Quality Management Assessment ....3
- HIT 230 — Alternative Delivery Systems .....................2
- HIT 265 — HIM Computer Applications .......................2
- MGMT 101 — Introduction to Management .....................3
- HIT 275# — HIM Practicum .....................................3

+ This requirement may be met by HIT 150 plus 250.

# It is recommended that all HIT classes be completed before HIT 275 is begun. A background check and drug screen may be required by the host facility at the student’s expense.

*Note: Each required course must be completed with a minimum grade of “C”.*

**College Requirements**

For complete information see “Graduation Requirements” in the *Catalog Index.*

**AS Degree: Cancer Information Management**

**Department Requirements (47 units)**

*Recommended sequence of courses.*

- HIT 135 — Basic Medical Terminology........................3
- BMS 146 — Human Form and Function ........................3
- COMP 101 — Introduction to Computer Applications ........4
- CIM 100 — Cancer Registry Management I ....................3
- HIT 101 — Introduction to Health Information Management...3
- HIT 204 — Basic Pathophysiology ...............................3
- CIM 125 — Cancer Disease Management .......................4
- CIM 201 — Abstracting Principles and Practice I ............3
- CIM 150 — Oncology Coding and Staging Systems ............4
- CIM 202 — Abstracting Principles and Practice II ..........3
- CIM 225 — Cancer Registry Management-up ................2
- CIM 250 — Cancer Statistics and Epidemiology ............3
- HIT 240 — Health Care Quality Management .................3
### Certificate Requirements:
**Medical Coding Specialist Certificate**

**Department Requirements (36 units prior to ICD-10 Implementation OR 38 units as of ICD-10 implementation; see \(^\) note)**

* Recommended sequence of courses.*

<table>
<thead>
<tr>
<th>Course</th>
<th>Units</th>
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<tbody>
<tr>
<td>COMP 101 — Introduction to Computer Applications</td>
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<tr>
<td>HIT 135* — Basic Medical Terminology</td>
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<tr>
<td>BMS 146* — Human Form and Function</td>
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<tr>
<td>HIT 101* — Intro. to Health Information Management</td>
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<td>HIT 102 — Legal Aspects of Health Care</td>
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<td>HIT 201 — Pharmacology for Allied Health</td>
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<tr>
<td>HIT 200* — ICD-9-CM Coding</td>
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<tr>
<td>HIT 202^ — ICD, Diagnostic Coding</td>
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<td>HIT 203^ — ICD, Procedural Coding</td>
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<td>HIT 210 — CPT Procedural Coding</td>
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<td>HIT 255+ — Medical Insurance and Reimbursement</td>
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<td>HIT 205 — Advanced Coding Applications</td>
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<tr>
<td>HIT 280# — Medical Coding Practicum</td>
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*HIT 135, BMS 146, and HIT 101 are prerequisites to HIT 200.*

^ These courses should be taken in lieu of HIT 200 if program completion is estimated to be within one semester prior to the final ICD10 implementation date.

+HIT 150 plus 250 will also satisfy this requirement.

#It is recommended at all other classes be completed before HIT 280 is begun. A background check and drug screen may be required by the host facility at the student’s expense.

*Note: Each required course must be completed with a minimum grade of “C”.*

### Planning a Program of Study
Continually updated program information is available at [www.sbcc.edu/HIT/website](http://www.sbcc.edu/HIT/website).

### Program Cost and Outcome
For planning purposes, the following webpages provide information on the cost of attendance, program length (assuming a student attends full-time), financing options and historical student completion rates:
Health Information Technology Courses

HIT 101 — Intro. to Health Information Management (3) — CSU
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture

Introduction to the fundamental theories/practices of HIT, including health services organization and delivery; health data/record structure, content/standards; HIT functions/responsibilities; information systems, technologies/requirements; health information privacy/security.

HIT 102 — Legal Aspects of Health Care (3) — CSU
Corequisites: Prior or concurrent enrollment in HIT 101
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture

Introduction to legal issues pertaining to healthcare, health information and the health record as a legal document. Patient privacy and confidentiality, patient rights, release of information, informed consents, advance directives, compliance, fraud and abuse, HIPAA and E-Health.

HIT 135 — Basic Medical Terminology (3) — CSU
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture

Introduction to medical terminology for body structure, body systems and diagnostic work. Prefixes, suffixes, word roots and combined word forms. Includes instruction in spelling, definition and pronunciation.

HIT 200 — ICD-9-CM Coding (3) — CSU
Prerequisites: HIT 101, 135, 202, BMS 146
Corequisites: Prior or concurrent enrollment in HIT 204
Skills Advisories: ENG 110 or 110H or 110GB
Hours: 54 lecture


HIT 201 — Pharmacology for Allied Health (2) — CSU
Prerequisites: BMS 146
Course Advisories: HIT 135
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 36 lecture

Introduction to pharmacology, basic pharmacological terminology and concepts, drug categories and their uses, mechanisms of drug action, dosage forms, routes of administration, and common generic and tradename medications.

HIT 202 — International Classification of Diseases, Diagnostic Coding (2) — CSU
Prerequisites: HIT 101, 135 and BMS 146
Corequisite: HIT 204 (prior or concurrently)
Course Advisories: HIT 201
Hours: 36 lecture

Beginning overview of nomenclature and classification systems, with focus on coding inpatient clinical information from medical records. Instruction in coding diagnoses, using International Classification of Diseases, sequencing and coding conventions. Coding software applications introduced.

HIT 203 – International Classification of Diseases, Procedural Coding (3) — CSU
Prerequisites: HIT 101, 204, 135 and BMS 146
Skills Advisories: Eligibility for ENG 110 or 110H or 110GB
Hours: 54 lecture

Overview, structure and organization of International Classification of Diseases, Procedure Classification System (ICD-10-PCS). Instruction in coding procedures per national coding guidelines. Coding software applications (Encoder) will be used. Coding instruction will entail coding from cases and health records.
HIT 204 — Basic Pathophysiology
(3) — CSU
Prerequisites: BMS 146
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture
Introduction to the fundamentals of pathophysiology, with focus on essential concepts of physiologic changes and altered functions in the human body resulting from disease processes. Principles from anatomy, physiology and chemistry provide the foundation for the study of basic disease process concepts, body systems, etiology and pathogenesis of various disorders. Diagnostic procedures, preventative measures and current therapeutic regimens are explored.

HIT 205 — Advanced Coding Applications
(4) — CSU
Prerequisites: HIT 202 and 203 and 210
Course Advisories: HIT 255
Hours: 72 lecture
Advanced medical coding for addressing more complex issues related to the -CM and HCPCS/CPT coding. Lectures and assignments focus on using case studies, mock records and applying learning at a higher coding skill level. Computerized encoders and groupers emphasized.

HIT 210 — CPT Procedural Coding
(3) — CSU
Prerequisites: HIT 101 and 135 and BMS 100
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture
Beginning HCPCS/CPT coding class for ambulatory services coding related to facility and professional services, with overview of coding conventions, principles, regulatory guidance and coding software.

HIT 220 — Health Information Management Statistics
(2) — CSU
Prerequisites: COMP 101
Corequisites: Prior or concurrent enrollment in HIT 101
Skills Advisories: MATH 4 and Eligibility for ENG 110 or 110H
Hours: 36 lecture
Introduction to healthcare statistics, including a review of mathematics, interpretation of healthcare statistical formulas, presentation of data, and application of medical research tools. Use of statistics in relation to long-range healthcare planning and development, application of automated systems, integration of reports and registration of vital statistics.

HIT 230 — Alternative Delivery Systems
(2) — CSU
Prerequisites: HIT 101
Course Advisories: COMP 101 and HIT 240
Hours: 36 lecture
Introduction to Health Information Management practice in alternative healthcare delivery systems, including ambulatory, long-term and managed care, mental health, rehabilitation medicine, and hospice and home health. Focuses on regulatory and accreditation requirements, funding and reimbursement, transition to the EHR, and health data privacy and security.

HIT 240 — Health Care Quality Management
(3) — CSU
Prerequisites: COMP 101 and HIT 101
Skills Advisories: Eligibility for ENG 110 or 110H
Course Advisories: HIT 255
Hours: 54 lecture
Applies continuous healthcare quality management and performance improvement principles to the hospital setting, focusing on historical, theoretical, and practical applications and methodologies. Includes data collection and analysis; regulatory, accreditation and patient safety compliance; credentialing and utilization; case and risk management.

HIT 255 — Medical Insurance and Reimbursement
(4) — CSU
Corequisites: HIT 102 and 202 and 203
Skills Advisories: Eligibility for ENG 110 or 110H
Course Advisories: HIT 210
Hours: 72 lecture
Introduction to the basics of medical insurance billing. Current payment methodologies in the inpatient, hospital outpatient, and physician office settings. Focus on compliance with regulatory requirements and common billing practices.

HIT 265 — HIM Computer Applications
(2) — CSU
Prerequisites: COMP 101 and HIT 101
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 36 lecture
Intermediate-level systems class focusing on computer applications in healthcare and health information management. Includes application of basic computer
and communication concepts and technologies, systems development and analysis, work flow mapping, queries and reports for information retrieval, and migration to the electronic health record.

HIT 275 — HIT Practicum
(3) — CSU
Prerequisites: HIT 200, 202, 203, 220, 240, 255 and 265
Corequisites: HIT 230
Limitation on Enrollment: Health and safety regulations
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 162 lab

Supervised onsite experience performing CAHIM-required HIT competencies for an affiliated healthcare organization. Clinical practice is conducted as a non-paid, laboratory experience. Clinical practice may include a partial virtual practicum.

HIT 280 — Medical Coding Practicum
(1) — CSU
Prerequisites: HIT 200, 210 and 255
Corequisites: Concurrent enrollment in HIT 205
Skills Advisories: Eligibility for ENG 100
Limitation on Enrollment: Health and safety regulations
Hours: 54 lab

Practicum in application of clinical classification systems, coding, case mix analysis and use of coded and abstracted data. Discussion focuses on directed practice activities. Supervised clinical experience focuses on coding patient care records. Students in supervised clinical practice have the status of learners. Clinical practice is conducted as a non-paid, laboratory experience.

HIT 284 — Certified Coding Associate Exam Preparation
(3)
Course Advisories: HIT 280
Hours: 54 lecture

Review of principles of health information documentation, coding, reimbursement methodologies, compliance and data quality to prepare medical coding certificate and experienced medical coders for AHIMA coding certification examinations.

HIT 285 — Registered Health Information Technician Exam Preparation
(3)
Course Advisories: HIT 275
Hours: 54 lecture

In-depth review of health information principles and applications to prepare Health Information Technology graduates for the American Health Information Management Association's national RHIT examination. Focus is on reviewing materials covered in the HIT Program, as well as learning techniques in test-taking and studying for the examination. Students use links to mock test questions, discussion boards and other resources to prepare for the national exam.

Cancer Information Management Courses

CIM 100 — Cancer Registry Management I
(3) — CSU
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 54 lecture

Introduction to hospital-based and central cancer registries; legal issues; confidentiality; standard-setting organizations; types of cancer registries and other disease registries; data users, computer applications; quality control; and registry operations, including case ascertainment and registry files.

CIM 125 — Cancer Disease Management
(4) — CSU
Prerequisites: BMS 146 and HIT 135
Corequisites: CIM 100
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 72 lecture

Overview of the oncology disease process, using principles from anatomy, physiology and chemistry; diagnostic and staging procedures (laboratory, pathology, imaging and surgery); Treatments (surgery, radiation, chemotherapy, immunotherapy, etc.); emphasis on the major sites of cancer; overview of clinical trials/research protocols.

CIM 150 — Oncology Coding and Staging Systems
(4) — CSU
Prerequisites: CIM 125
Skills Advisories: Eligibility for ENG 110 or 110H
Hours: 72 lecture

Overview of oncology coding and staging systems (ICD-O-3, SSS2K, AJCC, CSv2, the MP/H rules and the Hematopoietic DB/Manual). Focus on coding clinical information from medical records; staging and extent of disease concepts used by physicians and cancer surveillance organizations; the rules used to determine the number of primaries; and CSv2 for coding extent of disease.
CIM 201 — Abstracting Principles and Practice I  
(3) — CSU  
Prerequisites: HIT 135  
Corequisites: Prior or concurrent enrollment in CIM 125  
Skills Advisories: Eligibility for ENG 110 or 110H or 110GB  
Hours: 54 lecture  
Identification/selection of appropriate clinical information from medical records for capture on the abstract, in a manner consistent with cancer registry regulatory core data requirements.

CIM 202 — Abstracting Principles and Practice II  
(3) — CSU  
Prerequisites: CIM 201  
Corequisites: Prior or concurrent enrollment in CIM 150  
Skills Advisories: Eligibility for ENG 110 or 110H  
Hours: 54 lecture  
Application of the principles of cancer registry abstracting. Identification, selection and recording of appropriate cancer-related information consistent with regulatory requirements. Manual quality control edits of abstracted information to assure timeliness, completeness and accuracy of data.

CIM 225 — Cancer Registry Management II  
(2) — CSU  
Corequisites: Prior or concurrent enrollment in CIM 100  
Skills Advisories: Eligibility for ENG 110 or 110H  
Hours: 36 lecture  
Overview of management reports, cancer reporting to the central registry and the NCDB, survival analysis, clinical practice guidelines, uses of central cancer registry data, standard setters and professional organizations, central cancer registries, geographic information systems, federal and other types of registries, clinical trials, and cancer registries in other countries.

CIM 250 — Cancer Statistics and Epidemiology  
(3) — CSU  
Prerequisites: CIM 201  
Corequisites: Prior or concurrent enrollment in CIM 202  
Skills Advisories: MATH 100 and Eligibility for ENG 110 or 110H  
Hours: 54 lecture  
Introduction to cancer statistics, descriptive and analytic epidemiology, cancer surveillance, annual report preparation, presentation of cancer data and special studies. Use of cancer statistical data for marketing and strategic planning.

CIM 275 — CIM Practicum  
(3) — CSU  
Prerequisites: CIM 202 and 225 and 250  
Corequisites: Prior or concurrent enrollment in HIT 240  
Skills Advisories: Eligibility for ENG 110 or 110H  
Limitation on Enrollment: This is the last class in SBCC’s CIM Program. Students must have completed CIM Program classes or their equivalent prior to starting the practicum onsite at an affiliated healthcare organization or agency. A physical examination and up-to-date immunizations are required at student’s own expense. A background check may be required by the practicum site at student’s own expense.  
Hours: 160 lab  
Practicum in cancer registry operations for hands-on experience in all aspects of registry organization and operation. Supervised clinical experience in performing NCRA-required cancer information management competencies in an actual registry setting.