

REQUIREMENTS FOR THE BACHELOR OF SCIENCE
GALLOGLY COLLEGE OF ENGINEERING
THE UNIVERSITY OF OKLAHOMA

Academic Year
For Students Entering the Oklahoma State System for Higher Education Summer 2026 through Spring 2027

General Requirements	
Minimum Total Credit Hours	120
Minimum Upper-Division Hours	40
Minimum Retention/Graduation Grade Point Averages:	
Overall - Combined and OU	2.00
Major - Combined and OU	2.00

Program
Healthcare Information Systems
B496
Bachelor of Science

OU encourages students to complete at least 30 hours of applicable coursework each year to have the opportunity to graduate in 4 years.

GENERAL EDUCATION AND COLLEGE REQUIREMENTS

Courses designated as Core I, II, III, IV, or V are part of the General Education curriculum. Students must complete a minimum of 40 hours of General Education courses, chosen from the approved list, including at least one upper-division Gen. Ed. course outside of the student's major. **Courses graded P/NP will not apply.**

A grade of C or better is required in each course in the curriculum, including all prerequisite courses.

MINIMUM OF 40 HOURS REQUIRED FOR UNIVERSITY-WIDE GENERAL EDUCATION

Code	Title	Credit Hours
Core Area I: Symbolic and Oral Communication		
<i>English Composition</i>		
ENGL 1113	Principles of English Composition	3
ENGL 1213	Principles of English Composition	3
or EXPO 1213	Expository Writing	
<i>Language (0-10 hours in the same language)</i>		
This requirement can be met by two years of the same language in high school:		0-10
Beginning Course (0-5 hours)		
Beginning Course, continued (0-5 hours)		
<i>Mathematics (minimum 3 hours)</i>		
MATH 1503	College Algebra (or higher level of Mathematics) ¹	3
Core Area II: Natural Science (minimum 7 hours, including one laboratory)		
Choose two courses from different disciplines, one must include a laboratory		7
Core Area III: Social Science		
P SC 1113	American Federal Government	3
Choose one course		3
Core Area IV: Arts & Humanities		
<i>Artistic Forms</i>		
Choose one course		3
<i>Western Culture</i>		
HIST 1483	United States to 1865	3
or HIST 1493	United States, 1865 to the Present	
Choose one course (excluding HIST 1483 and HIST 1493)		3
<i>World Culture</i>		
Choose one course		3
Core Area V: First-Year Experience		
POLY 1003	Frontiers in Emerging Technologies, First-year Experience	3
Total Credit Hours		37-47

¹ Major support requirements that also satisfy University General Education requirements.

OPEN ELECTIVES

Electives to bring total applicable hours to the minimum total required for the degree including a minimum of 40 upper-division hours.

A grade of C or better is required in each course in the curriculum, including all prerequisite courses.

MAJOR REQUIREMENTS

Code	Title	Credit Hours
Required Courses		
HIS 3003	Health Information Systems and Applications	3
HIS 3013	Medical Terminologies, Vocabularies, and Ontologies	3
HIS 3023	Medical Information Retrieval and Digital Knowledge Sources	3
HIS 3103	Healthcare Organizations: Clinical Roles, Tasks, and Workflows	3
HIS 3403	Healthcare Quality and Patient Safety	3
HIS 4203	Clinical Decision Support Systems for Evidence-Based Care	3
HIS 4213	Artificial Intelligence, Natural Language Processing, and Machine Learning for Healthcare	3
HIS 4403	Ethics in Medical Informatics	3
HIS 4413	Clinical Informatics Policy, Regulations, and Governance	3
HIS 4903	Health Information Systems Capstone	3
CYBS 3913	Database Fundamentals	3
SDI 3403	Web Systems Development	3
SDI 3413	User Interface and Experience (UI/UX)	3
SDI 4103	Software Project Management	3
SDI 4313	Data Analytics	3
Major Electives		
Choose 12 hours of approved HIS electives from a list maintained by the department		12
Total Credit Hours		57

MAJOR SUPPORT REQUIREMENTS

Code	Title	Credit Hours
Math and Science		
POLY 1203	Foundations of Programming for Emerging Technologies	3
POLY 2203	Applied Statistics for Modern Computing	3
POLY 2513	Applied Discrete Mathematics for Computing	3
Total Credit Hours		9

More information in the catalog: (<http://ou-public.courseleaf.com/gallogly-engineering/polytechnic-institute/healthcare-information-systems-bachelor-science/>).

SUGGESTED SEMESTER PLAN OF STUDY

This plan shows one possible grouping of courses that would allow students to graduate in four years. Please refer to the front of the degree checklist for official requirements. Students must consult with OU Polytechnic Institute academic advisers to verify that courses selected each semester fulfill the recommended plan and satisfy university, Polytechnic Institute, and major requirements.

Courses designated as Core I, II, III, IV or V are part of the General Education curriculum. Students must complete a minimum of 40 hours of General Education courses, chosen from the approved list. Two college-level courses in a single world language are required; this may be satisfied by successful completion of 2 years in a single world language in high school. Students who must take language at the University will have an additional 6-10 hours of coursework.

Year	FIRST SEMESTER		Hours	SECOND SEMESTER		Hours
FRESHMAN	ENGL 1113	Principles of English Composition (Core I)	3	ENGL 1213 or EXPO 1213	Principles of English Composition (Core I) or Expository Writing	3
	P SC 1113	American Federal Government	3	POLY 1203	Foundations of Programming for Emerging Technologies	3
	MATH 1503	College Algebra (Core I, Mathematics (or higher level Mathematics))	3		Approved Elective, Natural Science (Core II) ³	3
	POLY 1003	Frontiers in Emerging Technologies, First-year Experience (Core V)	3		Approved Elective, Social Science (Core III) ¹	3
		Open Elective, lower-division ²	3		Open Elective, lower-division ²	3
	CREDIT HOURS		15	CREDIT HOURS		15
SOPHOMORE	HIST 1483 or HIST 1493	United States to 1865 or United States, 1865 to the Present	3		Approved Elective, World Culture (Core IV) ¹	3
		Approved Elective, Western Culture (Core IV) ¹	3	POLY 2513	Applied Discrete Mathematics for Computing	3
		Approved Elective, Natural Science with Lab (Core II-Lab) ³	4		Open Elective, lower-division ²	3
	POLY 2203	Applied Statistics for Modern Computing	3		Open Elective, lower-division ²	3
		Open Elective, lower-division ²	2		Open Elective, lower-division ²	3
	CREDIT HOURS		15	CREDIT HOURS		15
JUNIOR	HIS 3003	Health Information Systems and Applications	3	HIS 3403	Healthcare Quality and Patient Safety	3
	HIS 3103	Healthcare Organizations: Clinical Roles, Tasks, and Workflows	3	HIS 3013	Medical Terminologies, Vocabularies, and Ontologies	3
	HIS 3023	Medical Information Retrieval and Digital Knowledge Sources	3	HIS 4203	Clinical Decision Support Systems for Evidence-Based Care	3
	CYBS 3913	Database Fundamentals	3	SDI 3413	User Interface and Experience (UI/UX)	3
	SDI 3403	Web Systems Development	3		HIS Major Elective	3
	CREDIT HOURS		15	CREDIT HOURS		15
SENIOR	HIS 4413	Clinical Informatics Policy, Regulations, and Governance	3	HIS 4903	Health Information Systems Capstone	3
	HIS 4213	Artificial Intelligence, Natural Language Processing, and Machine Learning for Healthcare	3	SDI 4313	Data Analytics	3
	HIS 4403	Ethics in Medical Informatics	3		HIS Major Elective	3
	SDI 4103	Software Project Management	3		HIS Major Elective	3
		Approved Upper-Division Elective (3000-4000), Artistic Forms (Core IV) ¹	3		HIS Major Elective	3
	CREDIT HOURS		15	CREDIT HOURS		15

¹ To be chosen from the University-Wide General Education Approved Course List. Three of these hours must be upper-division (3000-4000). See list in the Class Schedule.

² Open electives are not required to be General Education approved, but 12 hours of Open Electives must carry the LIB attribute.

³ Courses taken to fulfill the Natural Science requirement must be chosen from the University-Wide General Education Approved Course List (Core II). At least one of the natural science courses must have a laboratory component.