MAJOR
The Computer Information Systems major prepares students with the problem solving skills required to design and implement technology solutions to support business needs. The courses use project-based curricula that first teach the concepts of the subject matter and then require the students to apply the concepts. Adobe, SAP, Microsoft, Oracle and other well known vendor applications and technologies are used to complete the hands-on projects. Students often work in teams to encourage the learning of group dynamics and soft-skills. Students who participate in internships have a strong foundation to build upon once entering the work environment. The curriculum follows IS 2010 guidelines.

PRACTICAL EXPERIENCE
Students can earn credits by extending their learning beyond the classroom. Students are encouraged to work for internship credits while completing their degree in Computer Information Systems. Companies such as Blue Cross Blue Shield of North Dakota, Bobcat, Eagle Creek Software Services, Eide Bailly, SEI, Bank Forward, Cavendish, John Deere Seeding Group, and Best Buy have welcomed VCSU students in their internship programs. VCSU students develop excellent technology and soft skills and many are hired into full-time positions with these companies after graduation. In addition to internships, cooperative research projects with faculty give students first-hand experience with advanced research techniques. Students also have the opportunity to participate in activities such as company tours, workshops, fairs, and technology conferences.

QUOTE
“I am very excited to be a professional Web Developer. With it comes the responsibility to constantly learn and improve my skills, and I strive to write better code every day.”

~Cy Kirsch, New Leipzig, ND
Currently employed by:

SAP HANDS-ON TRAINING
The CSSE Department is a member of the SAP University Alliances Program. SAP, a leading worldwide provider of Enterprise Resource Planning (ERP) software, allows VCSU faculty to incorporate SAP software into its CSSE coursework. Students receive hands-on experience with popular application software adding immediate value to their skills in the marketplace. SAP is a provider of collaborative business solutions for all types of industries and for every major market. As the world’s leading provider of enterprise application software, SAP (NYSE: SAP) delivers products and services that help accelerate business innovation for its more than 251,000 customers in more than 130 countries.

TECHNOLOGY AND ENVIRONMENT
- Accessible faculty and collaborative study area
- Industry-standard software applications
- Blackboard online learning environments
- Laptop computers with touchscreen

CAREER SERVICES PROVIDES
- Career, job search, placement services free to all students
- Field trips, employer on-campus visits
- Information, networking opportunities and skill development
  Visit www.vcsu.edu/careerservices/

CAREER OPPORTUNITIES
Business Analyst, Systems Analyst, Database Administrator, MIS Technician, MIS Manager, Network Administrator, Computer Security Specialist, Computer Programmer, Software Engineer, Software Implementation Consultant, IT Team Leader, IT Project Manager

WHERE ARE THEY NOW?
Mike Wagner ‘06, Kodee Ussatis ‘06, and Bill Schlosser ‘06 all leveraged their VCSU education to launch careers with a world leader in the information and software industry.

EXPLORE ONLINE!
csse.vcsu.edu
www.bls.gov/oco/ocos258.htm
www.khake.com/page17.html
www.sdn.sap.com/irj/uac
Computer Information Systems
Composite Major

MAJOR
The Computer Information Systems major prepares students with a foundation in problem solving skills required to design and implement technology solutions to support business needs. The courses use project-based curricula that first teach the concepts of the subject matter and then require the students to apply the concepts. Adobe, SAP, Microsoft, Oracle and other well known vendor applications and technologies are used to complete the hands-on projects. Students often work in teams to encourage the learning of group dynamics and soft-skills. Students who participate in internships have a strong foundation to build upon once entering the work environment. The curriculum follows IS2010 guidelines.

LEARNING OUTCOMES
1. Students understand problem requirements and identify technology solutions for those needs.
2. Students understand the big picture, how pieces fit together, and impact other pieces of the overall system.
3. Students research solutions to solve problems in a self-directed manner.
4. Students listen to requirements and communicate appropriate solutions effectively.
5. Students manage simple projects and work in high performing teams to complete projects successfully.
6. Students adjust to the corporate culture in a work environment by understanding and adhering to cultural expectations in an ethical manner.

ABILITIES
Collaboration To work together to reach a common goal.
Communication To convey thoughts, ideas, data, information, and messages effectively.
Global Awareness To look beyond one’s immediate self and local community.
Problem Solving To select and use appropriate and effective approaches and tools in solving a wide variety of problems.
Technology Use technological tools and processes to improve learning, productivity, and/or performance.

General Education Requirements 39 Hours
Communication & Collaboration 9 Hours
ENGL 110 College Composition I 3
ENGL 125 Intro to Professional Wrtg * 3
COMM 110 Fund of Public Speaking 3
or COMM 212 Interpersonal Comm 3
or COMM 216 Intercultural Comm 3

Problem Solving 11 Hrs
Mathematics (Select one course) 3 Hrs
MATH 103 College Algebra
MATH 104 Finite Mathematics
MATH 107 Precalculus
MATH 165 Calculus I
Lab Science (Select two courses) 8 Hrs
BIOL 111, 150, 151, 170, 220, 221
CHEM 115, 116, 121, 122
GEOL 100, 106
PHYS 100, 110, 161, 162, 251, 252
TECH 161

Technology (Select one course) 3Hrs
CIS 170 Intro to Computer Info Systems*
Wesllness 2 Hrs
HPER 100 Concepts Fitness & Wellness

Aesthetic Engagement 6 Hrs
Literacies (Select one course) 3 Hrs
ENGL 220, 225, 241, 242, 261, 262
HUM 201 Civil, Thought, & Lit Heritage
SPAN 201 2nd Yr I; SPAN 202 2nd Yr II
THEA 110 Intro Theatre; THEA 161 Acting I

Art & Music (Select one course) 3 Hrs
ART 110 Introduction to Visual Arts
HUM 202 Fine Arts & Aesthetics
MUS 100 Music Appreciation
MUS 101 Music Fundamentals
MUS 207 History of Rock’n’Roll

Global Aware & Effective Citizen 6 Hrs
ECON 201 Principles of Microeconomics* 3
ECON 202 Principles of Macroeconomics* 3

Additional General Education 2 Hrs
Select one additional course from the area of Aesthetic Engagement or Global Awareness or
ART 112 (3), ART 231 (3), ART 281 (3), GE0G 111 (2), MUS 104 (1), MUS 105 (1), MUS 131 (1), MUS 141 (1), PHYS 275 (1), THEA 201 (1-3)

Required Courses 54 Hours
ACCT 200 Elements of Accounting I 3
ACCT 201 Elements of Accounting II 3
CIS 104 Microcomputer Database 2
CIS 105 Microcomputer Spreadsheet 2
CIS 147 Principles of Info. Security 3
CIS 276 Business Languages 3
CIS 329 Information Systems Mgmt 3
CIS 369 Enterprise Systems 3
CIS 380 Systems Analysis and Design 3
CIS 381 Project Management 3
CIS 385 Database Theory/Design 3
CIS 460 Enterprise Architecture 3
CIS 465 IS Strategy, Mgmt, Acquisition 3
CIS 470 CRM and BI 4
CIS 480 Capstone Project 3
CIS 491 Senior Portfolio 1
ECON 261 Business Statistics 3
ENGL 310 Advanced Comp 3
or ENGL 410 Tech & Scientific Wrtg 3
or ENGL 420 Online Comm & Doc 3
MGM 430 Organizational Behavior 3

Directed Electives 18 Hrs

Total Credits Needed to Graduate 120 Hrs

For degree and graduation requirements see pages 39-40.

Department Chair
Susan Pfeifer, M.S., PMP
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(701) 845-7719