

COMM 226

Business Technology Management

Section EC

Summer 2025

Please Note: This syllabus is subject to change and any changes will be posted in the Announcements section of your eConcordia portal.

Disclaimer: In the event of extraordinary circumstances beyond the University's control, the content and/or evaluation scheme in this course is subject to change.

About this Course

General Information

Course Number: COMM 226

Credits: 3

This is a course offered by the Department of Supply Chain and Business Technology Management

Instructor: Dr. Raul Valverde

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Teaching Assistants:

TBD

Course Description

This course provides students with an understanding of the role of information technology in business organizations and society. Students learn how information technologies, digital tools, digitization of processes, etc. can be leveraged for creating business value, solving business problems, and driving competitive advantage as well as their impacts in the workplace, environment, and the world.

Prerequisite: None.

Expanded Course Description

Information technology dominates the modern business environment. This creates a need for managers that not only understand technology but also know how to use it to create business value for the organization. Business Technology Management (BTM) is a set of processes and services that unite an enterprise's business technology (BT) and business management (BM) strategies to extract total BT solution value potential. The course introduces students to information systems and technology with a focus on its application to help businesses to achieve and maintain a competitive advantage. Modern information systems and approaches used to support organizations in their operations and interactions with other business are emphasized in this course, including enterprise resource planning (ERP). Database management and design is covered as a tool to improve decision making and to support operations. The use of internet technology as a business tool to expand markets, improve efficiency and facilitate operations is introduced to students with practical business cases. Students are also exposed to information technology risks such as computer crimes and learn how to mitigate them by using information security. This course also provides students with hands-on experience of an ERP system (SAP), a database system (Microsoft Access) and Business Analytics (PowerBI / Microsoft Excel).

Learning Objectives

The main objective of this course is to provide an in-depth understanding of the role of information systems in supporting business activities and enhancing organizations' competitive advantage. Upon successful completion of this course, students will be able to:

- Explain and apply business technology management processes, tools, and techniques.
- Explain key components of IT/IS operations and implementation.
- Describe contemporary and future issues in business technology management.
- Explain the role of ethics in business and how to make ethical and socially responsible decisions considering people, environment, society, and legal obligations in business technology management.

Business Technology Management schedule

(Subject to change)

Week of	Week #	Topic	Chapters (sections)	Assessments
	1	Introduction to IT, IS, and Digitalization. Organizational Strategy and Information Systems	1 The importance of MIS (PS&I) ¹	Knowledge Check Lesson 1

			Extension 1 Information Systems Careers (PS&I) ¹	
	2	Hardware, Software, Cloud Computing, and Networks	3 Networks and Clouds (PS&I) ¹ , Extension 2 Hardware and Software (PS&I) ¹	Knowledge Check Lesson 2
	3	Business Process Management – Part 1	2 Business processes, Information Systems, Information (PS&I) ¹ 7 Using IS to improve processes (PS&I) ¹	Quiz 1: Covering topics in Week 1 and Week 2 <i>From Thursday May 29th 00:00 EST to Friday May 30th 23:59 EST</i> Knowledge Check Lessons 3-4 Group Self-Selection for Assignments 2 and 3 opens.
	4	Business Process Management – Part 2	Extension 3.1 What are the activities of business process management (PS&I) ¹	Assignment 1 Assigned Knowledge Check Lesson 5
	5	Supporting Processes with Enterprise Systems and SAP	8 Supporting Processes with ERP systems (PS&I) ¹ 9 Supporting Procurement Processes	Interactive Business Case 1 Due on Sunday, June 15 at 23:59 (EST) Knowledge Check Lesson 6

			with SAP (PS&I) ¹ SAP Tutorials (PS&I) ¹	
	6	Database Management & Big Data	4 Databases (PS&I) ¹ 12 Decision Support (Sections 12.2 & 12.9) (IS&B) ²	Assignment 1 Due on Friday, June 20 23:59 (EST) Knowledge Check Lesson 7
	7	Business Analytics & Artificial Intelligence	5 AI and Robotics,– (Sections 5.1 to 5.6) (PS&I) ¹ 12 Analytics and IS (PS&I) ¹	Assignment 2 Assigned Reading Week
	8	Pivot Tables & Digital Dashboards	Provided Online Resources (Microsoft Office Materials) Appendix 12 Power BI Analytics Tutorial (PS&I) ¹	Knowledge Check Lesson 9

	9	Collaboration Information Systems and E-commerce	<p>11 Collaboration, Social Media and IS (PS&I) ¹</p> <p>10.5 How does E-commerce improve Processes in an Industry? (PS&I) ¹</p> <p>10 E-Business (IS&B) ²</p>	<p>Assignment 2 Due on Friday, July 11 at 23:59 (EST)</p> <p>Assignment 3 Assigned</p>
	10	Information Systems Development	<p>Extension 3.2 & 3.3 Process Management and Information Systems Development (PS&I) ¹</p>	<p>Quiz 2: Covering topics in Week 9 and Week 10 <i>From Thursday July 17th 00:00 EST to Friday July 18th at 23:59 EST</i></p> <p>Knowledge Check Lesson 10</p>
	11	Ethics, Privacy, and Information Security	<p>6 Information Systems Security (PS&I) ¹</p> <p>9 Impacts of Information Systems (Sections 9.1, 9.2, 9.3, 9.4, and 9.5) (IS&B) ²</p>	<p>Assignment 3 Due on Friday, July 25 at 23:59 (EST)</p> <p>Knowledge Check Lesson 11</p>

			Ethics Guides throughout the Textbook (PS&I) ¹	
	12	Future of IS: Digitalization and Social Impacts	<p>9 Impacts of Information Systems (Sections 9.6 and 9.7) (IS&B) ²</p> <p>13 Emerging Technology (IS&B) ²</p> <p>3 (Section 3.2.6) Internet of Things) (PS&I) ¹</p> <p>5 (Sections 5.7, 5.8, and 5.9) Robotics (PS&I) ¹</p>	<p>Interactive Business Case 2 Due on Monday July 28 at 23:59 (EST)</p> <p>Knowledge Check Lesson 12</p>

¹ Jr., Earl H. McKinney, and David M. Kroenke Processes, Systems, and Information. Pearson Education (US), 2021. 4th edition

² Roch, S., Fowler, J., Smith, B., Bourgeois, D. (2021). Information systems for business and beyond.

Course Materials

Required Material

Jr., Earl H. McKinney, and David M. Kroenke Processes, Systems, and Information. Pearson Education (US), 2021. 4th edition:

<https://pearsonhighered.onthehub.com/WebStore/OfferingDetails.aspx?o=43e37b76-23e8-ed11-8155-000d3af41938>

Roch, S., Fowler, J., Smith, B., Bourgeois, D. (2021). Information systems for business and beyond:

<https://ecampusontario.pressbooks.pub/informationssystemscdn/>

Business Technology Labs from uCertify

Software for assignments

You will need various specific software applications for your assignments in this course, such as SAP GUI, Microsoft Access, Microsoft Excel, Power BI, and Microsoft Visio. All required software applications are accessible through uCertify (virtual machine) – except SAP GUI. When each assignment is announced, specific instructions will be provided on how to work with the uCertify hands-on labs and sandbox. SAP GUI instructions will also be provided as part of the assignment.

Minimum Computer Requirements

The minimum requirement for students is a computer with a current web browser, email, and with an Operating system installed with the options below:

- Microsoft Windows 10 or 11 is recommended.
- Apple OS

Teaching Method

Practical examples and practice problems are presented in business and economics settings. These examples are drawn from various areas, such as accounting, management, finance, marketing, production, economics, and management information systems. The teaching methods include:

- Lectures Important material from the textbook and other sources will be covered. These lecture resources may include presentations, slides, websites, and videos.
- Assignments and activities: Students will be required to complete assignments and activities designed to complement and enhance the learning of the course material and provide some practical experience in management information systems.
- Quizzes: The two online assessments will take place on eConcordia.com and will be answered individually. These assessments will cover materials in the textbook and discussions that take place in class.

- Final Exam: The final exam will take place on the university premises (in-person). The final exam will cover the material in the book. The date, time, and rooms for the final exam will be determined by the examination office.

Preparation and Problem Assignments

- Understanding of the course material is generally achieved through individual (or group) study, homework assignments, and examples in the course.
- Lectures are used to develop an understanding of the more complex issues. It is your responsibility to study the remaining parts of each chapter.
- Lessons are used to illustrate the application of the material in typical contexts. To maximize your benefit from this course, you should thoroughly read the chapter material **before each lecture** to solve the problems and cases that appear in each chapter and be prepared to answer questions in the knowledge checks.
- Due to the large class size, not all your questions can be answered immediately. Please post any questions about the course to the discussion forum on the course website on Moodle. Other students, the teaching assistant, or the professor will answer your questions.
- All course materials will be posted on the course website. It is your responsibility to check them before each class.

Course Evaluation

The final grade for the course will be based on the following components:

Evaluation

Quizzes (2)	10%
Interactive Business Cases	5%
Knowledge Check Quizzes	5%
Assignments (3)	35%
Final Examination	<u>45%</u>
Total	100%

Quizzes

There will be two online quizzes (each 5%). Please check the course schedule table for the date/time and coverage of each assessment. These are multiple-choice questions based on the assigned textbooks. More information will be provided on the course website.

Interactive Business Cases

There will be two Interactive Business Cases. Completion of them and the associated reflection document is required to get points toward the engagement activities, which counts for 5% of your final grade.

Knowledge Check Quizzes

There are 10 Knowledge Check Quizzes. (Lessons 1,2,3-4,5,6,7,9,10,12). These quizzes must be completed to get the associated 5% towards the final grade.

Assignments

There is one individual assignment (Assignment 1: SAP – 10%) and two group assignments (Assignment 2: Process Mapping & ERD – 12.5% & Assignment 3: Business Intelligence – 12.5%) during the semester; please refer to the schedule for the due dates.

Final examination

The final examination is worth 45% of the total mark for this course. However, to pass the course, you must score at least 50% in the final examination. The final examination is **comprehensive**; it will cover all of the chapters and sections of the textbook listed above. The final examination will have both multiple-choice questions and essay questions.

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Important Dates:

May 20: Last day for withdrawal with tuition refund (DNE)

June 22: Last day for academic withdrawal (DISC)

Late submission policy (applies to online assessments, assignments, and class participation activities): Unless otherwise stated in the submission description, late submissions will be subject to a **50%** penalty for the first day. An additional **10%** will be deducted for each additional day. So, submissions may result in a grade of zero if there are significant delays.

Numerical score and Letter Grades

At the end of this course, the instructor will produce an overall score for the student's performance on the various components of this course, and then convert that score to a letter grade. The following list provides the numerical equivalent for the letter grades that will be reported at the end of the term:

Letter and Number Grades

Letter	Score		
A+	90	-	100
A	85	-	89
A-	80	-	84
B+	77	-	79
B	73	-	76
B-	70	-	72
C+	67	-	69
C	63	-	66
C-	60	-	62
D+	57	-	59
D	53	-	56
D-	50	-	52
FNS	0	-	49

* D- is the minimum requirement to pass the course.

Please refer to section 16 of the Undergraduate Calendar for more information about the grading system, examinations, and performance requirements, etc.

(<https://www.concordia.ca/academics/undergraduate/calendar/current/section-16-academic-information-definitions-and-regulations.html>)

Assessment of Learning Objectives

Learning Outcomes	Final exam	Asgn. 1	Asgn. 2	Asgn. 3	Online Assessment	Class activity
Explain and apply business technology management processes, tools, and techniques	Theory-based multiple-choice and/or short-essay exam questions and application-	Use of an ERP/SAP in Business Processes	Business process modelling and notation Use of an ERP and Database Design for a	Use of a business analytics tool	Multiple-choice questions	Knowledge Check

	based exam questions		business case			
Explain key components of IT/IS operations and implementation.	Theory-based multiple-choice and/or short-essay exam questions and application-based exam questions	Use of an ERP/SAP in Business Processes			Multiple-choice questions	Knowledge Check
Describe contemporary and future issues in business technology management	Theory-based multiple-choice and/or short-essay exam questions and application-based exam questions				Multiple-choice questions	Knowledge Check
Explain the role of ethics in business and how to make ethical and socially responsible decisions considering people, environment, society, and legal obligations in business technology management.	Theory-based multiple-choice and/or short-essay exam questions and application-based exam questions				Multiple-choice questions	Knowledge Check

Behaviour

All individuals participating in courses are expected to be professional and constructive throughout the course, including in their communications. Concordia students are subject to the [Code of Rights and Responsibilities](#), which applies both when students are physically and virtually engaged in any University

activity, including classes, seminars, meetings, etc. Students engaged in University activities must respect this Code when engaging with any members of the Concordia community, including faculty, staff, and students, whether such interactions are verbal or in writing, face-to-face or online/virtual. Failing to comply with the Code may result in charges and sanctions, as outlined in the Code.

Intellectual Property

Content belonging to instructors shared in online courses, including, but not limited to, online lectures, course notes, and video recordings of classes remain the intellectual property of the faculty member. It may not be distributed, published, or broadcast, in whole or in part, without the express permission of the faculty member. Students are also forbidden to use their own means of recording any elements of an online class or lecture without the express permission of the instructor. Any unauthorized sharing of course content may constitute a breach of the [Academic Code of Conduct](#) and/or the [Code of Rights and Responsibilities](#). As specified in the [Policy on Intellectual Property](#), the University does not claim any ownership of or interest in any student IP. All university members retain copyright over their work.

Extraordinary Circumstances

In the event of extraordinary circumstances and pursuant to the [Academic Regulations](#), the University may modify the delivery, content, structure, forum, location, and/or evaluation scheme. In the event of such extraordinary circumstances, students will be informed of the changes.

Ethical Behaviour

Plagiarism: The most common offense under the Academic Code of Conduct is plagiarism, which the Code defines as “the presentation of the work of another person as one’s own or without proper acknowledgment.” This includes material copied word for word from books, journals, Internet sites, professor’s course notes, etc. It refers to material that is paraphrased but closely resembles the original source. It also includes for example the work of a fellow student, an answer on a quiz, data for a lab report, a paper, or an assignment completed by another student. It might be a paper purchased from any source. Plagiarism does not refer to words alone –it can refer to copying images, graphs, tables, and ideas. “Presentation” is not limited to written work. It includes oral presentations, computer assignments, and artistic works. Finally, if you translate the work of another person into any other language and do not cite the source, this is also plagiarism.

In Simple Words: Do not copy, paraphrase, or translate anything from anywhere without saying where you obtained it. (Source: [The Academic Integrity Website](#))

The instructor will strive to make the learning experience as accessible and inclusive as possible. If you have accessibility needs that require academic accommodations, please meet with an advisor from the

Access Centre for Students with Disabilities (ACSD) as soon as possible to set up an accommodation plan. The instructor welcomes meeting with all students to discuss their [accessibility needs](#).

Sexual violence, including sexual harassment and sexual assault, is not tolerated at Concordia. Please see Concordia's policy on sexual violence for more information about awareness and prevention, support for survivors/ victims, responding to disclosures, and procedures for reports and complaints. You can also contact the Sexual Assault Resource Centre for information and support. More information and support are available at the [Sexual Assault Resource Centre](#), by email at sarc@concordia.ca, or by phone 514 848-2424 x 3353

Course Agenda (Subject to Change)

Week 1: May 12 - May 18	
	Introduction to IT, IS, and Digitalization. Organizational Strategy and Information Systems
	Knowledge Check Lesson 1
May 12	Classes Begin
May 12	Discussion Board opens at 2 PM.
Week 2: May 19 - May 25	
	Hardware, Software, Cloud Computing, and Networks
	Knowledge Check Lesson 2
May 19	Journée nationale des patriotes (Quebec), Victoria Day (elsewhere in Canada) — University closed.
May 20	Deadline to add two-term summer session courses
May 20	Deadline for withdrawal with tuition refund (DNE) from two-term summer session courses
Week 3: May 26 - June 1	
May 26	Group self selection for assignments 2 and 3 opens
May 29	Quiz 1 on eConcordia Available at 9AM open until May 30 at 11:59PM EST

	Business Process Management – Part 1 and Part 2
	Knowledge Check Lessons 3-4
May 30	Last day to submit required documentation to register with the Access Centre for Students with Disabilities and request exam accommodations for the Summer 1 2025 final examination period
Week 4: June 2 - June 8	
	Supporting Processes with Enterprise Systems and SAP
	Knowledge Check Lesson 5
Week 5: June 9 - June 15	
June 09	Interactive Business Case 1 Due 11:59PM EST
	Database Management & Big Data
	Knowledge Check Lesson 6
Week 6: June 16 - June 22	
June 20	Assignment 1 Due 11:59 pm (EST)
	Business Analytics & Artificial Intelligence
	Knowledge Check Lesson 7
Week 7: June 23 - June 29	
June 23	Assignment 2 Assigned
June 24	Fête Nationale - University Closed
June 25	Reading week begins, two-term summer session
Week 8: June 30 - July 6	
	Pivot Tables & Digital Dashboards (No Knowledge Check)
June 30	Reading week for two-term summer session ends
July 01	Canada Day - University Closed
Week 9: July 7 - July 13	

	E-Commerce and Social Computing
	Knowledge Check Lesson 9
July 11	Assignment 2 Due 11:59 pm (EST)
July 11	Assignment 3 Assigned
Week 10: July 14 - July 20	
	Information Systems Development
	Knowledge Check Lesson 10
July 17	Quiz 2 on eConcordia Available at 9AM open until July 18, 11:59PM EST
Week 11: July 21 - July 27	
	Ethics, Privacy, and Information Security
	Knowledge Check Lesson 11
July 22	Deadline for academic withdrawal (DISC) from two-term summer session courses
July 25	Assignment 3 Due 11:59 pm (EST)
Week 12: July 28 - August 3	
	Future of IS: Digitalization and Social Impacts
	Knowledge Check Lesson 12
July 28	Interactive Business Case 2 Due 11:59 PM EST
Week 13: August 4 - August 12	
August 05	Last day for instructor-scheduled tests or examinations for two-term and second-term summer session courses
August 12	Last day of classes, two-term summer session courses
Examination Period: August 13 - August 19	
	Final Exam date and time is posted on your Student Hub