This course supports the assessment for Business of IT Applications. The course covers 4 competencies and represents 4 competency units.

Introduction

Overview
Businesses implement information systems to aid in a variety of tasks ranging from customer relationship management to decision-making processes. This course will cover the basic concepts of information systems and their common implementations as well as commonly used tools for helping businesses with their everyday processes.

Competencies
This course provides guidance to help you demonstrate the following 4 competencies:

- **Competency 4019.1.1: Information Systems and Business**
  The graduate defines the general principles of Information Systems and its role in the business process within an organization.

- **Competency 4019.1.2: Systems Development**
  The graduate defines the different methods of system development, and selects the appropriate method for a project.

- **Competency 4019.1.3: Information Systems Management and Security**
  The graduate identifies the role of management in Information Systems and the necessity for security and contingency plans.

- **Competency 4019.1.4: Support Center Tools, Technologies and Metrics**
  The graduate recognizes the need for support center tools, and identifies ways to manage the support processes.

Getting Started

Welcome to Business of IT-Applications! Start by taking the pre-assessment so you know which topics you need to focus on. After receiving your results, contact your course instructor to help customize your own study plan. Take advantage of the guidance provided in the course tips. The study guide and other course materials will prepare you to demonstrate your competence through an objective assessment.

Watch the following video for an overview of this course:

*Note: To download this video, right-click the following link and choose "Save as...":* [download video](#)

Course Instructor Assistance
As you prepare to demonstrate competency in this subject, remember that course instructors stand ready to help you reach your educational goals. As subject matter experts, mentors enjoy and take pride in helping students become reflective learners, problem solvers, and critical thinkers. Course instructors are excited to hear from you and eager to work with you.

Successful students report that working with a course instructor is the key to their success. Course instructors are able to share tips on approaches, tools, and skills that can help you apply the content you’re studying. They also provide guidance in assessment preparation strategies and troubleshoot areas of deficiency. Even if things don’t work out on your first try, course instructors act as a support system to guide you through the revision process. You should expect to work with course instructors for the duration of your coursework, and you are encouraged to contact them as soon as you begin. Course instructors are fully committed to your success!

Learning Resources

The learning resources listed in this section are required to complete the activities in this course. For many resources, WGU has provided automatic access through the course. However, you may need to manually enroll in or independently acquire other resources. Read the full instructions provided to ensure that you have access to all of your resources in a timely manner.

Automatically Enrolled Resources

You can access the learning resources listed in this section by clicking on the links provided throughout the course. You may be prompted to log in to the WGU student portal to access the resources.

Pearson CourseConnect
You will be directly linked to this learning resource within the activities throughout this course:

- Business Information Systems

VitalSource E-Texts
The following textbook is available to you as an e-text within this course. You will be directly linked to the specific readings required within the activities that follow.


Note: This e-text is available to you as part of your program tuition and fees, but you may purchase hard copies at your own expense through a retailer of your choice. If you choose to do so, please use the ISBN listed to ensure that you receive the correct edition.

SkillSoft and Books 24x7
You will access SkillSoft items at the activity level within this course. For more information on accessing SkillSoft items, please see the "Accessing SkillSoft Learning Resources" page.
The following SkillSoft module will be used in this course:

- Support Center Tools, Technologies, and Metrics

**Complete the Preassessment**

If you believe you have previous knowledge of some or all topics covered in this course, start by taking the preassessment before you begin and use its results to focus your studies.

- Complete the preassessment located in the Assessment tab.

Course instructors can help you develop a study plan based on your preassessment results.

**Study Guide**

Your course instructors have assembled a study guide to help structure your learning as you make your way through the course material. Follow along on the study guide as you review the learning resources, and fill in the information as you review it.

**Topics and Pacing**

The pacing guide suggests a weekly structure to pace your completion of learning activities. It is provided as a suggestion and does not represent a mandatory schedule. Follow the pacing guide carefully and complete at least one block each week to complete the course in the suggested timeframe, or customize a study plan with your course instructor using the preassessment coaching report.

**Week 1**

- Pre-assessment
- Start the study guide
- Information Systems and Business (part 1)
  - Introduction to Business Information Systems

**Week 2**

- Information Systems and Business (part 2)
  - The Business Process
  - Organizational Strategy and Information Systems

**Week 3**

- Systems Development
  - Information Systems Development
  - Alternative Systems Development Life Cycle
Week 4

- Information Systems Management and Security (part 1)
  - Information Systems Management and Ethics
  - Business Continuity and Information Systems (read Ch. 12 and compete CourseConnect lesson 12)

Week 5

- Information Systems Management and Security (part 2)
  - Support Center Tools, Techniques, and Metrics
  - Management Tools in the Customer Service Center

Week 6

- Check the study guide
- Pre-assessment
- Objective assessment

Note: This pacing guide does not replace the course. Please continue to refer to the course for a comprehensive list of the resources and activities.

Information Systems and Business

Management information systems (MIS) is the development and use of information systems that help organizations achieve their strategies. The adoption of information systems helps organizations maximize the use of human and technological resources. This is done by reducing or eliminating duplicate tasks, reducing the number of errors or issues by implementing validation, and automating repetitive processes leaving employees to deal with tasks that require higher levels of thinking.

Introduction to Business Information Systems

Information is essential to the success of an organization. Businesses need to convert raw data into meaningful information in order to make smart decisions. Information systems are necessary for the translation of data to information and to successfully manage a business.

This topic highlights the following objectives:

- Compare data and information
- Define information systems
- Explain the importance of information at various levels of an organization
- Identify the component parts of an information system
Describe roles in organizational information systems

**Read: Using MIS Chapter 1**

Read the following in the *Using MIS*-text:

- Pages 5-21 in chapter 1 ("The Importance of MIS")

**Complete: Pearson CourseConnect Lesson 1**

Complete the following lesson from Pearson CourseConnect:

- lesson 1 ("Introduction to Business Information Systems")

Complete the following knowledge check:

- lesson 1 quiz

**The Business Process**

Every business activity is part of a process: operation, management, and support. In order to see the big picture, one needs to understand not only how each process works but how they relate to one another as part of the business process.

This topic highlights the following objectives:

- List examples of business processes
- Explain the relationship between business processes and information systems
- Define Process Model
- Describe the components of a business process

**Read: Using MIS Chapters 3 and 10**

Read the following in the *Using MIS*-text:

- Pages 81-85 in chapter 3 ("Strategy and Information Systems")
- Pages 357-366 in chapter 10 ("Development Processes")

**Complete: Pearson CourseConnect Lesson 2**

Complete the following lesson from Pearson CourseConnect:

- lesson 2 ("The Business Process")

Complete the following knowledge check:
Organizational Strategy and Information Systems

Organizations use structure and hierarchies to operate efficiently. These structures play a key role in the development of information systems. Information systems can also provide a competitive advantage in the marketplace by helping to analyze the costs and benefits of different business strategies.

This topic highlights the following objectives:

- Explain the role of organizational strategy in creating information systems
- Explain Porter's Five Forces industry analysis model
- Explain Porter's Generic Strategies model
- Explain Porter's Value Chain model
- Explain how a competitive advantage can be accomplished through the use of information systems

Read: Using MIS Chapter 3

Read the following in the Using MIS text:

- Pages 73-89 in chapter 3 ("Strategy and Information Systems")

Complete: Pearson CourseConnect Lesson 3

Complete the following lesson from Pearson CourseConnect:

- lesson 3 ("Organizational Strategy and Information Systems")

Complete the following knowledge check:

- lesson 3 quiz

Systems Development

There are various methods of system development. Desired outcomes and the project timeline play a key role in deciding which strategies and techniques to employ when developing information systems.

Note: When studying the SDLC you will notice that some sources refer to each step by a standard name while others use a descriptive approach. This reflects a reality in the system development field. By gaining familiarity with both the concept and purpose of each step, you should be able to identify them regardless of the nomenclature.
Information Systems Development

Before you begin the development process, you must first outline the goals and requirements for a project. There are several different approaches to the development process, and the goals of the project will help determine which one will be the best fit. Sometimes the goals or deliverables of a project can change, so an understanding of these different approaches allows for a more dynamic development process.

This topic highlights the following objectives:

- Outline factors to consider in systems development
- Describe various system development approaches
- Describe each phase of the systems development life cycle

Read: Using MIS Chapter 10

Read the following in the *Using MIS*-text:

- Pages 357-383 in chapter 10 ("Development Processes")

Complete: Pearson CourseConnect Lesson 5

Complete the following lesson from Pearson CourseConnect:

- lesson 5 ("Information Systems Development")

Complete the following knowledge check:

- lesson 5 quiz

Alternative Systems Development Life Cycle

When developing information systems, there are several approaches. Sometimes the timeline of a project requires a much more rapid approach. Sometimes a project can change direction so the development cycle must be adapted to accommodate. Different approaches can direct attention and resources where needed to achieve desired outcomes.

This topic highlights the following objectives:

- Explain the purpose of prototyping
- Explain object-oriented systems development
- Define rapid application development
- Explain agile methods
- Explain extreme programming
Complete: Pearson CourseConnect Lesson 6

Complete the following lesson from Pearson CourseConnect:

- lesson 6 ("Alternative System Development Life Cycle")

Complete the following knowledge check:

- lesson 6 quiz

Information Systems Management and Security

Information systems play a key role in the management and security of data within an organization. These systems manage the communication, data storage, and technological infrastructure. It is vital that information systems be built and maintained within ethical and secure boundaries.

Information Systems Management and Ethics

It is important to design and develop information systems with ethics in mind. Information should only be available to those who need it, and the privacy and security of end users should always be respected. It is important to establish and maintain trust throughout the development process.

This topic highlights the following objectives:

- Explain the importance of information systems management
- Analyze the role of the information technology department in systems management
- Explain the importance of ethics in information systems
- Analyze various organizational approaches to managing ethics

Read: Using MIS Chapter 11

Read the following in the Using MIS e-text:

- Pages 401-418 in chapter 11 ("Information Systems Management")

Complete: Pearson CourseConnect Lesson 11

Complete the following lesson from Pearson CourseConnect:

- lesson 11 ("Information Systems Management and Ethics")

Complete the following knowledge check:

- lesson 11 quiz
Business Continuity and Information Systems

There are expectations in our information systems that they will function as intended at all times. While this goal expresses an ideal, it is not always a reality. Systems fail, and we must put processes into place to deal with these gaps in functionality. We can develop ways to backup data, and provide contingency plans in the event of service interruptions. Disaster recovery plans allow us to rebuild and recover data. Security management protects secure data, and also develops strategies for dealing with breaches in security.

This topic highlights the following objectives:

- Identify the types of threats to information systems
- Explain how an organization can keep its information secure
- Identify techniques and media used to back up data
- Explain the purpose of a disaster recovery plan
- Identify the types of data that should be protected
- Identify the reasons for reporting security compromises
- Select the appropriate security management decisions in a given scenario

Read: Using MIS Chapter 12

Read the following in the Using MIS e-text:

- Pages 427-455 in chapter 12 ("Information Security Management")

Complete: SkillSoft Module

Complete the following section in the "Support Center Tools, Technologies, and Metrics" module in SkillSoft:

- Security Management Section

Complete: Pearson CourseConnect Lesson 12

Complete the following lesson from Pearson CourseConnect:

- lesson 12 ("Information Systems Threat and Security")

Complete the following knowledge check:

- lesson 12 quiz

Support Center Tools, Techniques, and Metrics
Customer support centers are a business' lifeline for their customers to reach out to for support. As a main point of contact, it is important that this part of the process be managed efficiently to maintain customer satisfaction.

Management Tools in the Customer Service Center

It is important to track issues being handled in a customer support center. There are tools available that manage this process and allow end-user issues to be tracked and resolved in a timely manner. It also allows for solutions to be archived and queried if other users experience similar problems.

This topic highlights the following objectives:

- Recognize the benefits of using management tools in the customer support center
- Identify the problem management tools available to customer support centers
- Identify the appropriate stages of change management to use in a given scenario
- Sequence the stages of the change-management process

Complete: SkillSoft Module

Complete the following sections in the "Support Center Tools, Technologies, and Metrics" module in SkillSoft:

- Problem Management Section
- Change Management Section

Final Steps

Congratulations on completing the activities in this course! This course has prepared you to complete the assessment associated with this course.

Complete the Preassessment

The preassessment can help you determine your level of preparation. It is highly recommended that you pass the preassessment before attempting the final exam.

- Complete the preassessment located in the Assessment tab.

Course instructors can help you develop a review plan based on your preassessment results.

First Attempt Checklist
One of the many things that makes WGU unique is its competency-based education model. If you know the material, all you have to do is prove it by passing the exam. If you can do this, you can accelerate the receipt of your degree.

To make sure you have the best chance possible to pass the exam on your first attempt, the following steps should be completed successfully before you take it:

1. Complete the study guide as you work through the course material.
2. Read all 5 assigned chapters in the *Using MIS* textbook thoroughly and take detailed notes.
3. Complete the Active Review at the end of each assigned chapter.
4. Complete the quizzes associated with each Pearson CourseConnect Lesson.
5. Complete the 3 sections in the Skillsoft Support Center Tools, Techniques, and Metrics and take detailed notes.
6. Check and review the study guide. Contact your course instructor team to compare your completed study guide to the answer key.
7. Take the pre-assessment for the course, striving for 85% or higher. Use the coaching report to determine where you still need to review and reach out to the course instructors with any questions you have.

If you have completed the steps above and you feel comfortable with all of the concepts presented, you are most likely ready to attempt the exam.

If you fail your first attempt, you will be required to contact the course instructor to see what went wrong and how you can prepare to ensure a successful second attempt. After determining you are ready, your course instructor will approve your request once to make another exam attempt.