



# **AIS 007B: ADVANCED EXCEL**

# **New Course Proposal**

# **Changes saved but not submitted**

# Originator

Pablo Romero

#### Justification / Rationale

Code Alignment Project Recommendation: Change TOP & CIP codes

#### **Credit Status**

Credit - Degree Applicable

## **Subject**

AIS - Applications and Information Systems

# **Course Number**

007B

# **Full Course Title**

Advanced Excel

#### **Short Title**

ADVANCED EXCEL

# **Discipline**

# **Disciplines List**

Computer Information Systems (Computer network installation, microcomputer technology, computer applications)

Office Technologies (Secretarial skills, office systems, word processing, computer applications, automated office training)

# Modality

Face-to-Face 100% Online

# **Catalog Description**

Students receive instruction and computer experience using electronic spreadsheets to solve common numerical and business, finance and/or accounting-based problems.

# **Schedule Description**

Spreadsheet solutions for business analysis and decision making.

Prerequisite: AIS 007A or CIS 010

# **Lecture Units**

1.5

# **Lecture Semester Hours**

27

#### **Lab Units**

.5

# **Lab Semester Hours**

27

## In-class Hours

54

# **Out-of-class Hours**

54



**Total Course Units** 

2

**Total Semester Hours** 

108

Prerequisite Course(s)

AIS 007A or CIS 010

# **Required Text and Other Instructional Materials**

**Resource Type** 

Book

**Author** 

Robert Nordell

Title

MS Office 2016: In Practice Excel/with SIMnet

**Edition** 

2016

City

New York, New York

**Publisher** 

McGraw Hill/Irwin

Year

2017

**College Level** 

Yes

ISBN#

9781260114324

# **Class Size Maximum**

28

# **Entrance Skills**

Student should be able to create, format and save worksheets, functions, formulas, charts and templates.

# **Prerequisite Course Objectives**

AIS 007A-Define and describe basic spreadsheet concepts, terms, and definitions.

AIS 007A-Start Excel and identify parts of the Excel screen

AIS 007A-Create a simple spreadsheet using common formatting and editing commands.

AIS 007A-Demonstrate ability to enter numbers, text, formulas, and dates in a spreadsheet

AIS 007A-Format a worksheet

AIS 007A-Create and use templates and workbooks

CIS 010-Critical Thinking:

CIS 010-All of the courses in the Computer Information Systems program require students to learn to think critically.

CIS 010-Explain the basic concepts and understand the uses of various categories of productivity software, including word processing, electronic spreadsheets and database management.

CIS 010-Application software proficiency:

CIS 010-Demonstrate skills in disk and file management.

CIS 010-Demonstrate skills to design and create spreadsheets using common formatting and editing commands, formulas, and functions.



#### **Course Content**

- 1. Consolidating, Linking and Inserting Objects
  - a. Creating Static Data Consolidation
  - b. Creating Dynamic Data Consolidation
  - c. Consolidating Data by Category
  - d. Working with Grouped Worksheets
  - e. Linking Workbooks
  - f. Inserting Illustrations and Hyperlinks
  - g. Safeguarding a Workbook
- 2. The Function Library
  - a. Working with Database Functions
  - b. Building AND, OR, Nested, and IFS Functions
  - c. Lookup and Reference Category
  - d. Build Date, Time and Statistical Calculations
  - e. Financial, Text and Multiple Criteria Functions
- 3. Working with Templates and Sharing Work
  - a. Setting Data Validation
  - b. Using Form Controls and Buttons
  - c. Setting Worksheet and Workbook protection
  - d. Sharing and Merging Workbooks
  - e. Checking a Workbook for Distribution Issues.
- 4. Data Analysis and Business Intelligence
  - a. Using Goal Seek and Solve
  - b. Building One and Two variable Data Tables
  - c. Creating a Forecast
  - d. Transforming Data into a Query
  - e. Pivot Tables and Analysis Tool Pak
- 5. Recording and Editing Macros
  - a. Running and Recording
  - b. Assigning Macro to Button
  - c. Editing a Macro with Visual Basic Editor
  - d. Recording Macros with Relative References
  - e. Creating Macro-Enabled Templates and Workbooks

# **Lab Content**

Hands on practice on all the concepts listed above.

# **Course Objectives**

	Objectives
Objective 1	Use Excel and functions for business analysis.
Objective 2	Create and use templates and workbooks.
Objective 3	Demonstrate ability to link worksheets.
Objective 4	Integrate spreadsheets with Excel, and within other applications.
Objective 5	Use Excel to analyze and solve business, finance and accounting problems.
Objective 6	Create appropriate Macro recording to automate repeated tasks.

# **Student Learning Outcomes**

	Upon satisfactory completion of this course, students will be able to:		
Outcome 1	Design and format an appropriate spreadsheet solution to a business problem.		
Outcome 2	Demonstrate use of Excel tools at an advanced level		



# **Methods of Instruction**

Method	Please provide a description or examples of how each instructional method will be used in this course.
Discussion	In class discussion and/or online Canvas discussions
Demonstration, Repetition/Practice	Practice using different computer features according to the class content
Collaborative/Team	Creation of cooperative learning tasks such as a small group or paired activities.
Technology-based instruction	Use of hardware and software according to objectives
Lecture	Presentation of topic in content

# Methods of Evaluation

Method	Please provide a description or examples of how each evaluation method will be used in this course.	Type of Assignment
Self-paced testing, Student preparation	Interactive book and simulations	In Class Only
Mid-term and final evaluations	Exam	In Class Only
Tests/Quizzes/Examinations	Timed Quizzes	In and Out of Class
Computational/problem-solving evaluations	Projects using Excel features	In and Out of Class
Laboratory projects	Lab demonstration of skills covering all the content of the course.	In and Out of Class
Student participation/contribution	Class discussion and questions	In Class Only

#### **Assignments**

# **Other In-class Assignments**

- 1. Move and copy Excel spreadsheets from one folder to another
- 2. Rename spreadsheets
- 3. Create, move, and delete folders
- 4. Create backups on diskettes
- 5. Open, modify and save an existing Excel spreadsheet
- 6. Format large Excel spreadsheets using:
  - a. Fonts
  - b. Colors
  - c. Column and row heights
  - d. Hide columns
  - e. Alignment
  - f. Text wrap
  - g. Auto Format
  - h. Custom number formats
  - i. Styles
- 7. Print a large, multi-workbook excel spreadsheet using Print Areas and Page setup
- 8. Create a spreadsheet with formulas using absolute and relative cell addressing
- 9. Create several spreadsheets using Built-in Functions for.
  - a. Statistical functions
  - b. Accounting functions
  - c. Text functions
  - d. Arithmetic functions
  - e. Lookup functions
  - f. Financial Functions
  - g. Date Functions
- 10. Create a workbook with multiple worksheets
- 11. Create and modify charts
- 12. Use outlining, consolidation and subtotals to create summary Excel spreadsheets
- 13. Complete a comprehensive Final Project using all of the above Excel skills in a business situation



# Other Out-of-class Assignments

Spreadsheet projects to demonstrate proficiency with all the in-class assignments

#### **Grade Methods**

Letter Grade Only

# **Distance Education Checklist**

# **Instructional Materials and Resources**

If you use any other technologies in addition to the college LMS, what other technologies will you use and how are you ensuring student data security?

All data referent to student work done outside of Canvas is encrypted and synced by the access pairing created by College of the Desert IT Department.

# **Effective Student/Faculty Contact**

Which of the following methods of regular, timely, and effective student/faculty contact will be used in this course?

## Within Course Management System:

Discussion forums with substantive instructor participation Regular virtual office hours Private messages Online quizzes and examinations Video or audio feedback Weekly announcements

# **External to Course Management System:**

Direct e-mail

Posted audio/video (including YouTube, 3cmediasolutions, etc.)

# Briefly discuss how the selected strategies above will be used to maintain Regular Effective Contact in the course.

This class if online is being taught via Canvas. Instructors will use asynchronous text and video messages to interact with the students. Also, discussions boards, constant announcements will be used. Zoom virtual office hours with screen sharing and interaction capabilities will be available.

If interacting with students outside the LMS, explain how additional interactions with students outside the LMS will enhance student learning.

Canvas is used for external interaction as well.

#### Online Course Enrollment

#### Maximum enrollment for online sections of this course

28

# **Other Information**

# **MIS Course Data**

# **CIP Code**

52.0401 - Administrative Assistant and Secretarial Science, General.

## **TOP Code**

051400 - Office Technology/Office Computer Applications

#### **SAM Code**

C - Clearly Occupational

# **Basic Skills Status**

Not Basic Skills



# **Prior College Level**

Not applicable

# **Cooperative Work Experience**

Not a Coop Course

# **Course Classification Status**

**Credit Course** 

# **Approved Special Class**

Not special class

# **Noncredit Category**

Not Applicable, Credit Course

# **Funding Agency Category**

Not Applicable

# **Program Status**

Program Applicable

# **Transfer Status**

Transferable to CSU only

#### **Allow Audit**

No

#### Repeatability

No

# **Materials Fee**

No

#### **Additional Fees?**

No

# Files Uploaded

# Attach relevant documents (example: Advisory Committee or Department Minutes)

AIS 007B Approval Letter.pdf

# **Approvals**

# **Curriculum Committee Approval Date**

10/18/2018

# **Academic Senate Approval Date**

10/25/2018

# **Board of Trustees Approval Date**

11/14/2018

# **Chancellor's Office Approval Date**

11/20/2018

# **Course Control Number**

CCC000598627

# Programs referencing this course

Business Information Worker - Manager Certificate of Achievement (http://catalog.collegeofthedesert.eduundefined?key=200)
Applications and Information Systems AS Degree (http://catalog.collegeofthedesert.eduundefined?key=223)
Business Information - Marketing Specialist Certificate of Achievement (http://catalog.collegeofthedesert.eduundefined?key=224)



