SAULT COLLEGE OF APPLIED ARTS AND TECHNOLOGY

SAULT STE. MARIE, ONTARIO

COURSE OUTLINE

COURSE TITLE:	DATABASE MANAGEMENT AND APPLICATIONS		
CODE NO. :	OAD109	**MODULE:**	FOUR
PROGRAM:	OFFICE ADMINISTRATION – EXECUTIVE (ACCELERATED)		
AUTHOR:	LYNN DEE EASON		
DATE:	DEC 2010	**PREVIOUS OUTLINE DATED:**	FEB. 2010
APPROVED:		"Penny Perrier"	Dec. 2010
		_____ CHAIR	_____ DATE
TOTAL CREDITS:	3		
PREREQUISITE(S):	NONE		
HOURS/WEEK:	9 HOURS/7 WEEKS		

I. COURSE DESCRIPTION:

Data is a valuable resource to companies, and the organizing, creating, maintaining, retrieving, and sorting of data are important activities. Using Access, students will concentrate on transforming raw data into database files that can be queried and organized into accurate, final-form business-style reports and forms.

II. LEARNING OUTCOMES AND ELEMENTS OF THE PERFORMANCE:

Upon successful completion of this course, the student will demonstrate the ability to:

1. Use the basic features of Access to track information for businesses or individuals

   Potential Elements of the Performance:
   - Understand database concepts
   - Organize data
   - Understand databases and relationships
   - Work with relational database management systems
   - Create a database
   - Name the elements of the Access window
   - Create a table in datasheet view
   - Rename the default primary key field
   - Change the data type of the primary key field
   - Enter field names
   - Enter records
   - Save and open tables
   - Copy records from another Access database
   - Navigate a database
   - Create a simple query
   - Create a simple form
   - Create and print a simple report
   - View objects in the Navigation Pane
   - Manage a database
   - Compact and repair a database
   - Backup and restore a database
   - Design a database using the guidelines presented
   - Set field properties
   - View and modify field data types and format
   - Create and save a table in design view
   - Specify the primary key
   - Modify the structure of an Access table
   - Add records to a new table

- Import data from an Excel worksheet
- Create and modify a table by importing an existing table structure
- Add data to a table by importing a text file
- Define table relationships

2.   Maintain and Query a Database
     Potential Elements of the Performance:
- Update a database
- Find data in a table
- Delete records
- Create and run a query
- Update data using a query
- Create a multi-table query
- Sort data in a query
- Filter data
- Define record selection criteria for queries
- Define multiple selection criteria for queries using logical operators such as And and Or
- Create a calculated field
- Use aggregate functions
- Work with the Navigation Pane

3.   Create Forms and Reports
     Potential Elements of the Performance:
- Create a form using the Form Wizard
- Modify a form's design in Layout View
- Navigate a form
- Find data using a form
- Maintain table data using a form
- Preview and print selected form records
- Create a form with a subform
- Create a report using the Report Wizard
- Modify a report's design in Layout view
- Use conditional formatting in a report

4.   Create Advanced Queries and Enhance Design and Functionality
     Potential Elements of the Performance:
- Use a Pattern Match in a query
- Use a List-of-Values Match in a query
- Use the Not Operator in a query
- Use an AutoFilter to filter data
- Assign a conditional value to a calculated field
- Create a Crosstab query
- Create a Find Duplicates query
- Create a Find Unmatched query

- Create a Top Values query
- Create a Lookup Field
- Use the Input Mask Wizard
- Identify object dependencies
- Define data validation rules
- Work with Memo fields
- Designate a Trusted Folder
- Design forms
- Use the Documenter
- Create forms using form tools
- Plan and design a custom form
- Select, move, and align controls
- Add a combo box to a form
- Use form headers and footers
- Add a combo box to find records
- Add a subform to a form
- Display a subform's calculated controls in the main form
- Change the tab order in a form
- Improve a form's appearance
- Customize existing reports
- Design a custom report
- Create a query for a custom report
- Sorting and grouping data in a report
- Work with controls in design view
- Improve the appearance of a report
- Create mailing labels
- Create action queries such as Make-Table and Append
- Work with relationships between database tables
- Join tables
- Use indexes for table fields
- Implement a graphical user interface
- Use a command button with an attached memo
- Create and modify a switchboard

III.   REQUIRED RESOURCES/TEXTS/MATERIALS:

New Perspectives Microsoft Office Access 2007 Premium Video Edition
Comprehensive, by Joseph J. Adamski and Kathleen T. Finnegan.
Thomson Course Technology 2011.

Two manila file folders letter size

USB flash drive recommended

IV.   EVALUATION PROCESS/GRADING SYSTEM:

Two tests: Students will be evaluated on their database skills. Two tests will be administered based on projects that have been completed.

Test #1 – 50%
Test #2 – 50%

100%

The following semester grades will be assigned to students in post-secondary courses:

Grade	Definition	Grade Point Equivalent
A+	90 – 100%	4.00
A	80 – 89%	
B	70 - 79%	3.00
C	60 - 69%	2.00
D	50 – 59%	1.00
F (Fail)	49% and below	0.00

CR (Credit)	Credit for diploma requirements has been awarded.
S	Satisfactory achievement in field /clinical placement or non-graded subject area.
U	Unsatisfactory achievement in field/clinical placement or non-graded subject area.
X	A temporary grade limited to situations with extenuating circumstances giving a student additional time to complete the requirements for a course.
NR	Grade not reported to Registrar's office.
W	Student has withdrawn from the course without academic penalty.

VI.   SPECIAL NOTES:

Sault College is committed to student success. There is a direct correlation between academic performance and class attendance; therefore, for the benefit of all its constituents, all students are encouraged to attend all of their scheduled learning and evaluation sessions. This implies arriving on time and remaining for the duration of the scheduled session.

It is the student's responsibility to be familiar with the course outline and *Office Administration–Executive Student Manual*. These documents provide classroom policies that must be followed.

Students are expected to check college e-mail twice daily as a minimum.

Regular attendance and participation is expected to ensure course information is communicated to all students. In-class observation of student work and guidance by the professor aids student success. Lectures will not be repeated in subsequent classes. A study partner/group is invaluable for notes in the event of an unavoidable absence but must not be depended upon for frequent absences.

Students are expected to demonstrate respect for others in the class.

Classroom disturbances will be dealt with through an escalating procedure as follows:

- One verbal warning from professor
- One E-mail notification from professor
- Meeting with the dean which may result in suspension or expulsion

Producing accurate work is fundamental to this course. Marks will be deducted for inaccuracies.

Keyboarding proficiency is an integral component of the Office Administration–Executive program. Students who are unable to keyboard with touch type techniques should be practicing their skills on a daily basis. *All the Right Type* typing tutor software is located in the E-wing computer labs and in the Learning Centre. Visit http://www.ingenuityworks.com/ for more information on purchasing All the Right Type for home use.

It is expected that 100 percent of classroom work be completed as preparation for the tests. All work must be labeled with the student's name and the project information on each page. If required, work must be submitted in a labeled folder complete with a plastic CD pocket. The college network (S:/My Documents) should be used as the primary workspace. Students are responsible for maintaining back-ups of all completed files using either a memory stick (USB) or CD.

Students are expected to be present to write all tests during regularly scheduled classes. During tests, students are expected to keep their eyes on their own work. Academic dishonesty will result in a grade of zero (0) on the test for all involved parties. A missed test will receive a zero (0) grade.

Tests will not be "open book." Students must ensure that they have the appropriate tools to do the test.

Test papers may be returned to the student after grading in order to permit verification of the results and to review the tests. However, the student must return all test papers to the professor who will keep them on file for two weeks after the semester finish date. Any questions regarding the grading of individual tests must be brought to the professor's attention within two weeks of the date test papers are returned in class.

In the event of a failed course grade, a supplementary test will be administered at the end of the semester to those students who have attended 75 percent of classes and have completed the course work. The mark achieved on the supplemental will replace the lowest failed test for the final grade calculation. An appropriately labeled USB/CD containing completed daily work MUST be available with the test if requested by the professor.

VII.   COURSE OUTLINE ADDENDUM:

The provisions contained in the addendum located on the portal form part of this course outline.