COURSE SYLLABUS



COURSE TITLE: BUS 145 – Business Data Analysis

CLASS SECTION: 004

TERM: 2023F

COURSE CREDITS: 3

DELIVERY METHOD(S): In person

Camosun College campuses are located on the traditional territories of the Ləkwəŋən and WSÁNEĆ peoples. We acknowledge their welcome and graciousness to the students who seek knowledge here.

Learn more about Camosun's Territorial Acknowledgement.

For COVID-19 information please visit https://legacy.camosun.ca/covid19/index.html.

Camosun College requires mandatory attendance for the first class meeting of each course. If you do not attend, and do not provide your instructor with a reasonable explanation in advance, you will be removed from the course and the space offered to the next waitlisted student.

INSTRUCTOR DETAILS

NAME: Jasdeep (Jas) Dhillon

EMAIL: dhillonj@camosun.ca

OFFICE: CBA 268

HOURS: Mon/Wed, 10:30-11:20am or by appointment

As your course instructor, I endeavour to provide an inclusive learning environment. However, if you experience barriers to learning in this course, do not hesitate to discuss them with me. Camosun College is committed to identifying and removing institutional and social barriers that prevent access and impede success.

CALENDAR DESCRIPTION

This course provides students with an opportunity to explore data management and data analysis and the role that they play in supporting business goals. Students will design and develop a relational database and use advanced spreadsheet skills to support data analysis and decision making.

PREREQUISITE(S): C in BUS 140 or equivalent

CO-REQUISITE(S): None EXCLUSION(S): None

COURSE LEARNING OUTCOMES / OBJECTIVES

Upon successful completion of this course a student will be able to:

- a. Describe how information systems support business operations.
- b. Build and use spreadsheet models to assist decision making.
- c. Use miscellaneous tools such as data tables, scenarios, and solver to perform sensitivity analyses and to examine other what-if scenarios.
- d. Use spreadsheet software to perform various data analysis tasks using tables, subtotals, pivot tables, pivot charts, conditional functions, and database functions.

- e. Construct and interpret a variety of system description documents, including requirements analysis and simple entity relationship diagrams.
- f. Construct a small relational database application including tables, queries, forms, reports, and a basic user-interface such as a switchboard or tabbed form.
- g. Apply data integrity tools such as input masks and validation rules to spreadsheet and database data.
- h. Integrate data from various sources for the purpose of mail/e-mail merging or for further analysis using spreadsheet software.

REQUIRED MATERIALS & RECOMMENDED PREPARATION / INFORMATION

a. **REQUIRED**: A recent PC (not Mac) with the MS Office Suite (2019) installed, *including MS Access* (a database application not available on Macs).

Office 2019/O365 is available to Camosun students for free. Information on that offer is here: https://legacy.camosun.ca/services/its/other-services.html Contact ITS for assistance.

b. No published course materials are required for purchase.

COURSE SCHEDULE, TOPICS, AND ASSOCIATED PREPARATION / ACTIVITY / EVALUATION

The following schedule and course components are subject to change with reasonable advance notice, as deemed appropriate by the instructor.

WEEK or DATE	TUE	THU	
Sep 5, 7	Course Introduction Excel Review	Excel Review How IS Supports Business Operations	
Sep 12, 14	What-If Analysis (Goal Seek, Data Tables)	What-If Analysis (Scenario Manager)	
Sep 19, 21	Subtotals / Pivot Tables / Pivot Charts	Nested and Conditional Functions Parts of Chapter 7 and 8	
Sep 26, 28	Advanced Filtering / Database Functions Parts of Chapter 7 and 8	Excel Review	
Oct 3, 5	Excel Exam	Database Design - Business Processes/Requirements Analysis	
Oct 10, 12	Database Design (Select/Project/Join, Normalization) Entities and Attributes	Data Process Modeling - ERD's	
Oct 17, 19	Database Construction (Data Dictionaries)	Database Construction (Tables, Field Properties, Referential Integrity, Creating Lookup Queries)	
Oct 24, 26	Creating Views (Select, Project, and Join Operations)	Creating Views (Select, Project, and Join Operations)	
	Select/Detail/Aggregate/Summary Queries and Queries with Concatenated and Calculated Fields	Parameter Queries, Aggregate Queries with Where operator, Queries with Function Based Fields (IIF)	
Oct 31, Nov 2	In-Class Assignments – Database Design and Construction	Creating Views (Select, Project, and Join Operations) Queries with DatePart and Nested Functions	

WEEK or DATE	TUE	THU		
Nov 7, 9	Queries Review	Database Select Queries Exam		
Nov 14, 16	Report Design (Table and Query Based, Sorting, Grouping)	Lab day to work on Database Project - Reports		
Nov 21, 23	Form Design (Form Types and Purposes, Form Properties, Hot Keys, Command Buttons and Tab Order, Form with a Subform)	Lab day to work on Database Project - Forms		
Nov 28, 30	Interface Design (Navigation Forms, Database Properties)	Integration (Data Export for Pivot Table and Mail Merge)		
Dec 5, 7	Access Forms, Reports and Integration Exam	No Class		
There is no final exam for this course.				

Students registered with the Centre for Accessible Learning (CAL) who complete quizzes, tests, and exams with academic accommodations have booking procedures and deadlines with CAL where advanced noticed is required. Deadlines scan be reviewed on the <u>CAL exams page</u>. http://camosun.ca/services/accessible-learning/exams.html

EVALUATION OF LEARNING

DESCRIPTION		WEIGHTING
Instructor Initiated Assignments/Participation	20%	
Database Project	25%	
Part 1: Design	3%	
Part 2: Build and Test	3%	
Part 3: Query Design	11%	
Part 4: Forms, Reports and Interface Design	8%	
Exams and Assessments		55%
	TOTAL	100%

If you have a concern about a grade you have received for an evaluation, please come and see me as soon as possible. Refer to the <u>Grade Review and Appeals</u> policy for more information. http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.14.pdf

Lecture Attendance

To get the most out of this course, students are expected to attend all classes and be on time. It is your responsibility to acquire all information given during a class missed, including notes, hand-outs, changed exam dates etc.

Deadlines and exams

You must submit your assignments by the due date or as announced. A grade of zero will be assigned to late submissions. There are no additional assignments or make-up exams of any kind if you performed poorly on an assignment, midterm or final exam.

<u>EXAM DATES WILL NOT BE RESCHEDULED</u>. Non-attendance on scheduled exam dates will result in a zero grade. All exams must be written at the scheduled times with the exception of students requiring an accommodation by CAL. It is understood that emergency circumstances do occur (e.g. severe illness or family emergency); for such circumstances accommodation may be granted at the discretion of the instructor, provided the student:

- a) notifies the instructor in advance of the exam (not after), and
- b) provides documented evidence of the circumstance (e.g. medical certificate).

In most cases of an excused absence for an exam, an alternate exam will be scheduled for the student at the end of term.

Do not make travel plans until the final exam schedules are finalized and posted. Please ask any family members who might make travel plans on your behalf to consult you before booking tickets. Travel plans are not an acceptable reason to miss an exam.

Students registered through the <u>Centre for Accessible Learning (CAL)</u> should discuss timelines with their instructors at the beginning of each semester.

<u>Please note:</u> the use of cell phones during a test or quiz is not allowed and may result in a zero for that assessment.

SCHOOL OR DEPARTMENTAL INFORMATION

https://legacy.camosun.ca/learn/school/business/

STUDENT RESPONSIBILITY

Enrolment at Camosun assumes that the student will become a responsible member of the College community. As such, each student will display a positive work ethic, assist in the preservation of College property, and assume responsibility for their education by researching academic requirements and policies; demonstrating courtesy and respect toward others; and respecting expectations concerning attendance, assignments, deadlines, and appointments.

SUPPORTS AND SERVICES FOR STUDENTS

Camosun College offers a number of services to help you succeed in and out of the classroom. For a detailed overview of the supports and services visit http://camosun.ca/students/.

Support Service	Website
Academic Advising	http://camosun.ca/advising
Accessible Learning	http://camosun.ca/accessible-learning
Counselling	http://camosun.ca/counselling
Career Services	http://camosun.ca/coop
Financial Aid and Awards	http://camosun.ca/financialaid
Help Centres (Math/English/Science)	http://camosun.ca/help-centres
Indigenous Student Support	http://camosun.ca/indigenous
International Student Support	http://camosun.ca/international/
Learning Skills	http://camosun.ca/learningskills
Library	http://camosun.ca/services/library/
Office of Student Support	http://camosun.ca/oss
Ombudsperson	http://camosun.ca/ombuds
Registration	http://camosun.ca/registration
Technology Support	http://camosun.ca/its
Writing Centre	http://camosun.ca/writing-centre

If you have a mental health concern, please contact Counselling to arrange an appointment as soon as possible. Counselling sessions are available at both campuses during business hours. If you need urgent support after-hours, please contact the Vancouver Island Crisis Line at 1-888-494-3888 or call 911.

Academic Accommodations for Students with Disabilities

The College is committed to providing appropriate and reasonable academic accommodations to students with disabilities (i.e. physical, depression, learning, etc). If you have a disability, the Centre for Accessible Learning (CAL) can help you document your needs, and where disability-related barriers to access in your courses exist, create an accommodation plan. By making a plan through CAL, you can ensure you have the appropriate academic accommodations you need without disclosing your diagnosis or condition to course instructors. Please visit the CAL website for contacts and to learn how to get started: http://camosun.ca/services/accessible-learning/

Academic Integrity

Please visit http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.13.pdf for policy regarding academic expectations and details for addressing and resolving matters of academic misconduct.

Academic Progress

Please visit http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.1.pdf for further details on how Camosun College monitors students' academic progress and what steps can be taken if a student is at risk of not meeting the College's academic progress standards.

Course Withdrawals Policy

Please visit http://camosun.ca/about/policies/education-academic/e-2-student-services-and-support/e-2.2.pdf for further details about course withdrawals. For deadline for fees, course drop dates, and tuition refund, please visit http://camosun.ca/learn/fees/#deadlines.

Grading Policy

Please visit http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.5.pdf for further details about grading.

Grade Review and Appeals

Please visit http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.14.pdf for policy relating to requests for review and appeal of grades.

Mandatory Attendance for First Class Meeting of Each Course

Camosun College requires mandatory attendance for the first class meeting of each course. If you do not attend, and do not provide your instructor with a reasonable reason in advance, you will be removed from the course and the space offered to the next waitlisted student. For more information, please see the "Attendance" section under "Registration Policies and Procedures"

(http://camosun.ca/learn/calendar/current/procedures.html) and the Grading Policy at http://camosun.ca/about/policies/education-academic/e-1-programming-and-instruction/e-1.5.pdf.

Medical / Compassionate Withdrawals

Students who are incapacitated and unable to complete or succeed in their studies by virtue of serious and demonstrated exceptional circumstances may be eligible for a medical/compassionate withdrawal. Please visit

http://camosun.ca/about/policies/education-academic/e-2-student-services-and-support/e-2.8.pdf to learn more about the process involved in a medical/compassionate withdrawal.

Sexual Violence and Misconduct

Camosun is committed to creating a campus culture of safety, respect, and consent. Camosun's Office of Student Support is responsible for offering support to students impacted by sexual violence. Regardless of when or where the sexual violence or misconduct occurred, students can access support at Camosun. The Office of Student Support will make sure students have a safe and private place to talk and will help them understand what supports are available and their options for next steps. The Office of Student Support respects a student's right to choose what is right for them. For more information see Camosun's Sexualized Violence and Misconduct Policy: http://camosun.ca/about/policies/education-academic/e-2-student-services-and-support/e-2.9.pdf and camosun.ca/sexual-violence. To contact the Office of Student Support:

oss@camosun.ca or by phone: 250-370-3046 or 250-3703841

Student Misconduct (Non-Academic)

Camosun College is committed to building the academic competency of all students, seeks to empower students to become agents of their own learning, and promotes academic belonging for everyone. Camosun also expects that all students to conduct themselves in a manner that contributes to a positive, supportive, and safe learning environment. Please review Camosun College's Student Misconduct Policy at http://camosun.ca/about/policies/education-academic/e-2-student-services-and-support/e-2.5.pdf to understand the College's expectations of academic integrity and student behavioural conduct.

Changes to this Syllabus: Every effort has been made to ensure that information in this syllabus is accurate at the time of publication. The College reserves the right to change courses if it becomes necessary so that course content remains relevant. In such cases, the instructor will give the students clear and timely notice of the changes.