COURSE OUTLINE: AVT257 - GENERAL KNOWLEDGE

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Course Code: Title	AVT257: GENERAL KNOWLEDGE FOR AVIATION
Program Number: Name	4061: AVIATION TECHNOLOGY
Department:	AVIATION TECHNOLOGY
Academic Year:	2023-2024
Course Description:	This course expands on the general knowledge of theory, aerodynamics, engines, airframes and instruments with a quantitative analysis and greater depth. Other topics relate to formulae and performance charts dealing with weight and balance, cruise performance, multi-engine operations, unusual attitudes, recognition of system failures and emergency procedures.
Total Credits:	1
Hours/Week:	1
Total Hours:	15
Prerequisites:	AFT120, AVF241, AVF242, AVF245, AVT248
Corequisites:	There are no co-requisites for this course.
This course is a pre-requisite for:	AFT360
Essential Employability Skills (EES) addressed in this course:	EES 2 Respond to written, spoken, or visual messages in a manner that ensures effective communication. EES 3 Execute mathematical operations accurately. EES 4 Apply a systematic approach to solve problems. EES 5 Use a variety of thinking skills to anticipate and solve problems. EES 6 Locate, select, organize, and document information using appropriate technology and information systems. EES 7 Analyze, evaluate, and apply relevant information from a variety of sources. EES 11 Take responsibility for ones own actions, decisions, and consequences.
Course Evaluation:	Passing Grade: 70%, B A minimum program GPA of 2.0 or higher where program specific standards exist is required for graduation.
Other Course Evaluation & Assessment Requirements:	Evaluation Considerations: Students will be assessed by a combination of attendance and deportment, midterm test, and a final exam. Weighting of each will be as follows: 50% for the midterm test and 50% for the final exam. A minimum mark of 70% (B) is required to pass the course.

Dates of tests will be announced at least 1 week in advance.

Students may request a deferment of a test for compassionate reasons. Compassionate Grounds for deferment will include but not be limited to death of an immediate family member, personal illness, or recent diagnosis of a serious illness of a family member. Make-up evaluations will not be permitted without prior notice regardless of the circumstances.

Attendance:

Attendance is mandatory for courses which appear on the student`s formal Ground School Record required by Transport Canada.

To be excused from class due to illness or other unforeseen circumstance, students must inform their instructor/professor prior to the start of class. A make-up class may be required.

Unexcused absences will result in 2% deduction from the final mark for each occurrence. Arriving for class late will result in a 1% deduction from the final mark for each occurrence.

Classroom Conduct:

A classroom code of conduct can be found in the Sault College Student Code of Conduct policy, on the Sault College Website. This along with the list of Unacceptable Behaviours in the Sault College Aviation`s SOPs must be adhered to.

Violations of the dress code will result in a Letter of Warning (LOW). Refer to the Sault College Aviation Standard Operating Procedures (SOPs) manual, Section 10, for dress code policies.

Student Support and Students at Risk:

Student support services are provided through Sault College`s Student Services department. All students are encouraged to use these services to enhance their learning experience. Services like peer tutoring provides support from Aviation students in years ahead, who have demonstrated success in the program.

If a faculty member determines that a student is at risk of not being successful in their academic pursuits and has exhausted all strategies available to faculty, student contact information may be confidentially provided to Student Services to offer even more assistance with options for success. Any student wishing to restrict the sharing of such information should make their wishes known to the coordinator or faculty member.

Books and Required Resources:

AERONAUTICAL INFORMATION MANUAL
Publisher: TRANSPORT CANADA Edition: 2017-1-March 30, 2017
ISBN: 1715-7382/TP 14371E

CARs CANADIAN AVIATION REGULATIONS

FROM THE GROUND UP
Publisher: AVIATION PUBLISHERS CO. LIMITED
ISBN: 0973003634

Course Outcomes and Learning Objectives:

Course Outcome 1	Learning Objectives for Course Outcome 1
Upon successful completion of this course, the student	

	will have obtained: 1. An in depth knowledge of engine mechanisms, airframe design and ancillary controls 2. An appreciation of how power and airframe design influence aerodynamic performance 3. The safety concerns in the use of industry standard performance charts 4. Demonstrate analytical skills to solve aircraft performance	As a result of completing the outcomes of the course the student will be 1. Apply technical skills toward improved aircraft performance 2. Recognize technical irregularities and take appropriate action

Evaluation Process and Grading System:

Evaluation Type	Evaluation Weight
FINAL EXAM	50%
MIDTERM	50%

Date: December 8, 2023

Addendum: Please refer to the course outline addendum on the Learning Management System for further information.