University College of the Fraser Valley

COURSE INFORMATION

DEPARTMENT: Aviation DATE: 930115

Aviation 231	Human Factors I	
NAME & NUMBER OF COURSE	DESCRIPTIVE TITLE	UCFV CREDIT: 1

CATALOGUE DESCRIPTION:

This is an airmanship course which focuses on human factors associated with flight. This course introduces the student to pilot judgement and decision making. The student will learn that pilot judgement is a process which produces a thoughtful, considered decision relating to the operation of an aircraft, along with the response to the decision. Attention will be given to the concerns which will face a commercial pilot and accident reports will be used as a basis of discussion. The course also includes a study of the physiological responses to the lack of oxygen, changes in pressure, unusual rotation, fatigue, anxiety and drugs, complemented by a discussion of the corresponding psychological responses.

COURSE PREREQUISITES:

Acceptance to Aviation Program

COURSE COREQUISITES:

Aviation 151,201,211,221 - unless otherwise approved by program head

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HOURS PER TERM FOR EACH STUDENT	LECTURE	22	Hrs
	LABORATORY		Hrs
	SEMINAR		Hrs
	FIELD EXPERIENCE		Hrs
	STUDENT DIRECTED LEARNING		Hrs
	OTHER - Specify		Hrs
	TOTAL	22	

UCFV CREDIT TRANSFER ☐ UCFV CREDIT NON-TRANSFER ☐ NON-CREDIT ☐

TRANSFER STATUS (Equivalent, Unassigned, Other Details)

COURSES FOR WHICH THIS IS A PREREQUISITE AND RELATED COURSES:

Prerequisite to: Aviation 332
Related Courses: Aviation 332,431,432

TEXTBOOKS, REFERENCES, MATERIALS (List reading resources elsewhere)

Human Factors for General Aviation
Trollip & Jensen
Sanderson
Human Factors in Flight
Frank Hawkins
Gower
Flight Deck Performance: The Human Factor
O'Hare & Roscoe
Iowa State University Press

OBJECTIVES:

To introduce the student to the non-technical aspects of flying such as aeronautical decision making and medical factors.

METHODS:

Classroom teaching, classroom discussion, videos and films, quizzes and tests.

STUDENT EVALUATION PROCEDURE:

The student course evaluation is determined by:

Student Assignments and Projects	10%
Quizzes	10%
Tests	30%
Course Final Exam	50%

COURSE OUTLINE:

Introduction to course
Introduction to aeronautical decision making, decision making concepts
Mountain flying
Risk management, the risk elements, assessing risks, managing risks
Hazardous attitudes that influence decision making
Stress management
Examples of the application of ADM concepts
Introduction to aviation medical phenomena
High altitude flight
Dealing with hypoxia
Medical facts
Sensory illusions
Summary and test