

## Syllabus for ECON 471/695-03 Airline Economics Class – Spring 2020

Instructor: B. Ben Baldanza  
954-494-2816, [bbaldanz@gmu.edu](mailto:bbaldanz@gmu.edu)  
Virtual Office Hours: TBD

Course Description: This course outlines the economic underpinnings of the commercial airline business. Running a successful airline often means dealing with fundamental economic concepts that drive many decisions: where to fly, when to fly, with what airplanes, at what price, with what labor, within what regulations, who to partner with, and within a competitive framework. The airline industry lends itself well to the direct application of economic theory, and students will gain an appreciation for the complexity and economic basis for most key airline decisions. The course is dual-listed at the undergraduate and graduate levels. Graduate students will be expected to complete a more quantitative unique year-end paper.

The class is applied economics. The course is divided into four main sections that correspond to the decisions made by an airline's Chief Commercial Officer, Chief Operating Officer, Chief Financial Officer, and General Counsel.

What You will Learn: : During this course, students will learn the ways that economics drive key airline decisions and demonstrate this in multiple ways.

Prerequisites: Students should have an understanding of the concepts taught in initial courses on Micro (ECON 306) and Macro Economic and basic Statistics. Alternatively, students in the Engineering or Business programs with a strong interest in aviation would also be prepared. Graduate students, by nature of their admission into the program, are all eligible for the class.

Required Reading: There is no text that adequately covers the materials that will be addressed in this course. Required readings will be distributed throughout the course and understanding the content of these is expected. At times, we will read the materials together in the class and/or have discussion groups to discuss an assigned reading. Reading in this class is not make-work; readings are meant to augment and further develop ideas we discuss in the class. I also will supply some readings as optional only for those with a special interest in the topic or for reference that could be helpful in class assignments. All readings will be supplied via Blackboard or in hard copy.

Schedule and Participation: The class is offered in the Spring 2020 semester, on Mondays evenings from 4:20pm – 7:00 pm. There will be 14 classes, with class 14 being the final exam. The classes will incorporate a variety of learning opportunities including:

- **Class lectures**
- **Problem Sets** consist of questions to research and answer, and projects for students to complete on their own time. Active class discussion of the problem sets will take place in the class, possibly including student presentations. Graduate students are expected to complete the problem sets at a deeper and more quantitative level than undergraduates.
- **Guest Speakers** will give real world stories of issues we are discussing in the classroom. Speakers will augment the issues being discussed in class and will use approximately one hour of the class time. Speakers used depend on their availability, of course. Q&A is encouraged. The class is expected to have five or six speakers over the semester.
- **Case Studies** of real airline situations with students' ability to decide how they would react. These are simplified "Harvard Business School" style cases, with specific issues and data given. Students will be expected to draft their approach to solving the issue presented, using data given and outside research. Cases will be worked on in groups and some groups will be selected to present their results to the class, earning them bonus credit.
- **Readings** will reinforce topics discussed in the lectures and add additional detail. Some weeks will include quizzes or activities to test the concepts learned in the readings, while others will incorporate reading materials into the problem sets. At times, we may read together in the class or break into groups to summarize and discuss an assigned reading.
- Students may be asked to share insights on their own airline experiences.
- In-class group activities will be used to reinforce concepts and provide interesting challenges. It is hard and often ineffective to sit for almost

three hours and just hear lectures, so the class will use activities to break up to talks and reinforce learnings.

- Graduate students will be given a final project three to four weeks prior to the end of class, with the project due on day of the Final Exam. Because of this, the two exams in the class will have more weight to the undergraduate students' final grade than the graduate students.
- As part of the materials distributed for each class, a set of notes covering the major topics of the class will be provided. Collectively, these notes make a great study guide for the exams. Also, note taking in the class is welcome but not entirely necessary.

Grading: Grading for the class is as follows:

Feature	Undergraduate Value	Graduate Value
Problem Sets (8)	6% each	6% each
Business Cases (2)	11% each	11% each
Presentation Bonus (2)	2% each	2% each
Mid-term Exam	12%	7%
Final Exam	18%	13%
Final Project	NA	10%
Total Possible Value	104%	104%

Late Work: Problem sets are due by the start of the class the following week they are assigned. Problem set answers will typically be reviewed early in the class the week the problem sets are due. Late submissions can earn partial credit for the topics not reviewed in class.

Use of Online Resources: Students are encouraged to use online resources to better develop case results and problem sets. Referring to earlier class session problem sets or cases (on sites such as Chegg) however will likely result in weakened attempts, as the problem sets and cases change each session.

Relationship to SYST 461/660: The Engineering School offers a class on Air Transportation Systems Engineering. The ECON Airline Economics class is nicely synergistic with the Engineering class, in that some of the topics are similar but the approach is different. This ECON class is focused on the

economics, finance, and business aspects for managing an airline rather than the engineering concepts for designing an air transportation system. Students wanting a more complete understanding of the commercial air transportation system should consider taking both courses.

### Other Important Information

#### **To Access Blackboard:**

1. Go to <http://mymason.gmu.edu>.
2. Login using your NETID and password.
3. Click on the 'Courses' tab.
4. Double-click on ECON 471 or ECON 695-03 (Spring 2020) under the course listings

**Technical Help:** If you have difficulty with accessing Blackboard, please contact the ITU Support Center at 703.993.8870 or [support@gmu.edu](mailto:support@gmu.edu).

**Honor Code:** Students must adhere to the guidelines of the George Mason University Honor Code.

The George Mason University Honor Code states: "Cheating and attempted cheating, plagiarism, lying, and stealing of academic work and related materials constitute Honor Code violations. To maintain an academic community according to these standards, students and faculty members must report all alleged violations to the Honor Committee." Students are encouraged to read the full Honor Code: <https://oai.gmu.edu/mason-honor-code/> and to remain vigilant against any violation of the Code in their own work. Any cases of academic dishonesty in this course will be pursued according to the guidelines detailed in the University Catalog.

**Time Conflict:** George Mason University is committed to creating a welcoming, respectful and inclusive educational environment that values diversity. Students should review the syllabus at the beginning of the term to determine if there are any conflicts between class time and religious observance. It is the student's responsibility to inform the instructor of these conflicts within the first week of the semester. <http://ulife.gmu.edu/calendar/religious-holiday-calendar/>

**Students with Disabilities:** Students with disabilities who seek accommodations in a course must be registered with the George Mason University Office of Disability Services (ODS) and inform their instructor, in writing, at the beginning of the semester [See: <https://ds.gmu.edu/> ].

**Counseling and Psychological Services:** The George Mason University Counseling and Psychological Services (CAPS) staff consists of professional counseling and clinical psychologists, social workers, and counselors who offer a wide range of services (individual and group counseling, workshops and outreach programs) to enhance students' personal experience and academic performance [See <http://caps.gmu.edu>].

**Email:** Mason uses only Mason email accounts to communicate with enrolled students. Students must activate their Mason email account, use it to communicate with their department and other administrative units, and check it regularly for important university information including messages related to this class.

**University Catalog:** <http://catalog.gmu.edu>, is the central resource for university policies affecting student, faculty, and staff conduct in university academic affairs. Other policies are available at <http://universitypolicy.gmu.edu/>. All members of the university community are responsible for knowing and following established policies.

**Syllabus and Course Changes:** The syllabus is a general plan for the course. Deviations may be necessary and will be announced by me.

## **Course Outline by Week:**

*Weeks 1-2: Industry background and necessary metrics:*

Week 1: Airline industry structure, basic economic structure

Week 2: Economic airline metrics and their limits

*Weeks 3-6: The Airline Chief Commercial Officer*

Week 3: Pricing and Ancillary Revenue

Week 4: Revenue Management

Week 5: Aircraft Scheduling and Planning

Week 6: Customer Service and Frequent Flier Programs

Week 7: Mid-term Exam, beginning with Open Q&A

*Weeks 8-9: The Airline Chief Operations Officer*

Week 8: Airport economics and the relationship with airlines

Week 9: International Operations and Airline Alliances

*Weeks 10-11: The Airline General Counsel*

Week 10: Airline Labor economics

Week 11: Economic impact of governmental regulations

*Weeks 12-13: The Airline Chief Financial Officer*

Week 13: Fleet Planning, Analysis, Financing, and Contracts

Week 14: Airline Cost Structures and Profitability Measurement

Week 15: Final Exam and Graduate Projects Due