



Department of Economics Course Outline

		Term:	Winter 2004
Course:	Economics 371 [Economic Analysis of Transportation]	Section:	01
Time:	T 17:00 ? 19:50	Place:	ST 139
Instructor:	Richard Emmer		
Office:	SS 1046	Telephone:	319-6313 or 220-5857 (Dept.Office)
Office Hours:	T 20:00 ? 21:00 or by appointment	E-Mail:	richard_emmer@cpr.ca

Textbook(s):

None

Book(s) on Reserve:

- Boyer, K.D., *Principles of Transportation Economics*, Addison-Wesley Longman, 1998
- Button, K.J. *Transport Economics*, Edward Elgar, London, UK.(1993)
- Canadian National Transportation Act Review Commission *Competition in Transportation Policy*, Volumes 1 and 2, Supply and Services, Ottawa. (1993)
- Canadian Royal Commission on National Passenger Transportation *Directions: The Final Report of the Royal Commission on National Passenger Transportation*, Volumes 1-4, Supply and Services, Ottawa.(1992)
- Green, D.L., et al (eds.) *The Full Costs and Benefits of Transportation*. Springer, 1997.
- McCarthy, P.S. *Transportation Economics: Theory and Practice: A Case Study Approach*, Blackwell (2001)
- Oum, T. et al (ed) *Transport Economics: Selected Readings*, Harwood. (1997)

Course Outline:

The purpose of the course is to give participants

- (1) A sound understanding of the foundations and tools of economic analysis, as they are applied to transportation;
- (2) The ability to apply economic analysis to specific situations in the transportation sector; and
- (3) The perspective and tools to assess critically the implications of economic policy and regulation relating to transportation. The implications of differences in transport markets (passenger versus freight, urban versus intercity, by mode, internationally) will be highlighted in the course.

The relevance of theory to current circumstances and the effects of policy will be recurrent themes. The implications of externalities and other imperfections for pricing and efficiency will be examined in some detail. Methods of analyzing transportation investments, including cost-benefit analysis, and the role of regulation in transport markets round out the course content, as noted in the general outline reported below.

Grade Determination and Final Examination Details:

Assignments (3)	30%
Midterm Exam	30%
Final Examination	40%

The Mid-term exam will be held on Tuesday, March 2, 2004, during the scheduled lecture time in the regular classroom. The Final examination will be scheduled by the Registrar's office and held in an assigned room.

Assignments will be distributed well in advance of due dates. Late assignments will be accepted only in special circumstances.

Each of three assignments is worth 10 points, while the Mid-term and Final exams are assigned 30 and 40 points, respectively. The final percentage grade is the sum of the points achieved on the assignments and exams. The percentage grade is converted to the University grade point value as follows:

A+	91-100	B	73-76	C-	60-62
A	85-90	B-	70-72	D+	56-59
A-	80-84	C+	67-69	D	50-55
B+	77-79	C	63-66	F	0-49

If, for some reason, the distribution of grades determined using the aforementioned conversion chart appears to be abnormal the instructor reserves the right to change the grade conversion chart if the instructor, *at the instructor's discretion*, feels it is necessary to more fairly represent student achievement.

A passing grade on any particular component of the course is not required for a student to pass the course as a whole.

Non-programmable calculators will be allowed during the writing of tests or final examinations.

There will be a Registrar scheduled final examination, lasting 2 hours and held in a classroom.

Tests and exams will not involve multiple choice questions.

Other Resources:

Students? Union Vice President Academic:

Demetrios Nicolaides

Phone: 220-3911

E-mail: dpaca@ucalgary.ca

Students? Union Faculty Representative (Social Sciences)

Carina. McDonald

Phone: 220-3913 Office: MSC 251

E-Mail: carina@su.ucalgary.ca

Society of Undergraduates in Economics (S.U.E.)

E-mail: suecon@ucalgary.ca

Notes:

- Students seeking reappraisal of a piece of graded term work (term paper, essay, etc.) should discuss their work with the Instructor within two weeks of the work being returned to the class.
- Make-up examinations and deferred examinations will not be given except in cases of extreme personal emergencies. Also, examinations will not be given before the indicated dates.

Readings:

Introduction

Required: McCarthy Ch. 1

Transport Canada, 2002 Annual Report Chs. 2 & 3
(see Web address below)

Optional: McCarthy Ch. 2

Boyer Ch. 1
Button Chs. 1 & 2

Demand

Required: Boyer Chs. 3 & 4

McCarthy Ch. 2, pp. 56-69, 74-81

Optional: Boyer Ch. 2

Button Ch. 3

McCarthy Ch. 4

Royal Commission, Vol 4, pp. 1597-1623

Cost & Supply

Required: Boyer Chs. 5, 6, 7 & 8

McCarthy Ch. 5, pp. 173-194

McCarthy Ch. 6, pp. 219-237

Optional: Button Ch.4

McCarthy Ch. 5, pp. 149-172

McCarthy Ch. 6, pp. 214-219

Investment

Required: McCarthy Ch. 9, pp. 370-38

Optional: Boyer Ch. 9

McCarthy Ch. 9 pp. 355-370

Pricing

Required: Boyer Chs. 10 & 11

McCarthy Ch. 10, pp. 403-437

Optional: McCarthy Ch. 10, pp. 387-402

Full Costs and Benefits

Required: Boyer Ch. 13 pp. 563-576, 594-600

Optional: Boyer Ch. 14

Button Ch. 5

Green pp. 1-26, 173-191

Regulation and Policy

Required: Boyer Chs. 12 & 13

McCarthy Ch. 7 pp. 278-298

McCarthy Ch. 8

McCarthy Ch. 11, pp. 447-464, 476-488

Optional: Button Ch. 7

Green pp. 192-215

McCarthy Ch. 7 pp. 244-278

Web Links and On-Line Reading List:

<http://www.tc.gc.ca> (Transport Canada)

<http://www.dot.gov> (U.S. Department of Transportation)

<http://www.tac-atc.ca> (Transportation Association of Canada)

<http://www.cutaactu.ca> (Canadian Urban Transit Association)

<http://www.bts.gov/itt/wtd> (Worldwide Transportation Directory)

<http://www.transportweb.com/> (The Transport Web Index)

<http://www.uitp.com> (International Association of Public Transport)

<http://www.bts.gov/itt/natf.html> (North American Transportation in Figures)

<http://www.bts.gov/virtualib/transportation.html> (Virtual Library ? Transportation)

<http://www.logisticsworld.com/> (Logistics World)

<http://www.worldbank.org/transport/index.html> (World Bank Group ? Transportation)

<http://www.railwaygazette.com/index.asp> (Railway Gazette International)

<http://www.truckingnet.com/> (Trucking Net)

<http://www.truck.net/> (Truck Net)

<http://www.hwaha.dot.gov> (US Federal Highway Administration)

<http://www.tu.gov.ab.ca> (Government of Alberta Transportation Department)

<http://www.gov.calgary.ab.ca/roads/> (City of Calgary Roads Department)

<http://www.calgarytpo.com/> (City of Calgary Transportation Project Office)

http://www.gov.calgary.ab.ca/planning/transportation_forecasting/ (City of Calgary)

http://www.gov.calgary.ab.ca/planning/transportation_planning/ (City of Calgary)

<http://web.mit.edu/cts/www/> (MIT Center for Transportation Studies)

<http://www.njtide.org/links/index.html> (New Jersey Transportation Information and Decision Engineering - a Princeton University related site)

http://www.islandnet.com/ITE_BC/other_sites.html (Institute of BC Transportation Engineering)

http://www.umanitoba.ca/transport_institute (U of Manitoba Transportation Institute)

<http://www.tlcnetwork.org/resource.html> (Transportation for Livable Communities Network)

<http://www.thenewrepublic.com/docprint.mhtml?i=20030120&s=easterbrook012003> (Review of *High and Mighty: SUVs -- ?*)

http://www.tc.gc.ca/pol/en/Report/anre2002/toc_e.htm (Transport Canada Annual Report, *Transportation in Canada 2002*)

<http://gulliver.trb.org/publications/sr/sr271.pdf> (Transportation Research Board Special Report 271, *Freight Capacity for the 21st Century*)

Case Studies (McCarthy):

Demand:

- The Demand for Gasoline, Regulation and Automobile Travel (pp. 62-69)
- The Demand for Short-Haul Air Service (pp. 74-80)

Costs and Supply

- Regulated Truckload Carriers (pp. 173-179)
- Regulated General Freight Carriers (pp. 179-184)
- Short-Run Variable Costs in the Rail Industry Under Regulation (pp. 219-225)
- Profit Margins in the Airline Industry (pp. 225-228)
- Urban Bus Transportation Cost and Production (pp. 230-236)

Investment

- Optimal Pricing and Investment in Urban Bus Transit Systems (pp. 272-273)
- Optimal Pricing and Investment in Rail Transport (pp. 374-379)

Pricing

- Welfare Effects of First-Best Pricing and Investment in Highway (pp. 403-407)
- Welfare Effects of First-Best Pricing in Airport Infrastructure (pp. 407-411)
- Are Amtrak Benefits Worth the Costs (pp. 414-423)
- Pricing Urban Transit Under a Zero-Profit Constraint (pp. 429-432)
- Setting Airline Landing Fees Under a Zero-Profit Constraint (pp. 432-436)

Regulation and Policy

- Contestable Markets Theory: Actual Versus Potential Competition (pp. 278-283)
- Motor Carrier Firm Rents (pp. 284-286)
- Monopoly Rent-Sharing in the Motor Carrier Industry (pp. 286-290)
- The Economic Effect of the Shipping Act of 1984 (pp. 292-296)
- Deregulation and Strategic Behaviour in the Airline Industry (pp. 308-319)
- Estimating the Results from Mergers: Republic Airlines (pp. 320-324)
- Mergers and Consumer Prices (pp. 324-326)
- Market Equilibrium During Price-Controlled Regulation (pp. 329-339)
- An Overview of Economic Deregulation in Transportation (pp. 339-345)
- The Incidence of Traffic Congestion in U.S. Cities (pp. 461-464)
- The Effects of Congestion Pricing on Generalized Cost (pp. 477-483)

- Toward a Feasible Policy of Road Pricing: Los Angeles (pp. 484-488)

* * * * *

Safewalk / Campus Security: 220-5333

RE/pml
2003-11-20