



課 綱 Course Outline
企業管理學系博士班國際企業組

中文課程名稱 Course Name in Chinese	企業財務決策				
英文課程名稱 Course Name in English	Corporate Financial Decision				
科目代碼 Course Code	BM_83200	班 別 Degree	博士班 Ph. D.		
修別 Type	選修 Elective	學分數 Credit(s)	3.0	時 數 Hour(s)	3.0
先修課程 Prerequisite	None				
課程目標 Course Objectives					
<ol style="list-style-type: none"> 1. 財務工程與投資工程之連續時間模型進階數學修習 2. 隨機過程、隨機微分方程(一般解、特解)求解過程之學習 3. 資產價值/企業價值之評價 4. 衍生性金融商品與實質選擇權之介紹 5. 國際財務管理與國際投資之市場進入與退出策略評估數量模型構建 6. 賽局選擇權之發展與衡量 					
系教育目標 Dept.'s Education Objectives					
1	培養具國際企業知識之高階管理人才。 Build a foundation of international business knowledge to prepare students for being higher-level managers.				
2	培養具創新思維與創業能力之高階管理人才。 Build a foundation of innovation and entrepreneurship to prepare students for being higher-level managers.				
3	培養具服務業經營能力之高階管理人才。 Create a managerial ability in Service industry for advanced managers.				
4	培養在地經營理念之高階管理人才。 Offer a program with an emphasis on higher-level management philosophy responsive to the Taiwanese business context.				
系專業能力 Basic Learning Outcomes				課程目標與系專業能力相關性 Correlation between Course Objectives and Dept.'s Education Objectives	
A	具備國際企業管理之知識與能力。 Students will have basic knowledge of international business.				●

B	具備邏輯思考、問題分析與解決之能力 Students will be able to identify, analyze and solve business problems with logical thinking.	●
C	具備溝通協調與團隊合作之能力。 Students will be able to demonstrate effective communication, coordination and teamwork skills.	○
D	具備國際觀及外語溝通之能力。 Students will be able to communicate in foreign languages and have an awareness on global and cultural diversity issues.	●
E	具備創新、創業之思維與能力。 To build a the concept and ability for innovation and entrepreneurship.	●
F	具備服務設計與產業分析之能力。 Students will be able to demonstrate the abilities for service design and industry analysis	●
G	具備國際企業倫理之素養。 Students will be able to identify and understand the importance of ethical decision making for international business.	○

圖示說明 Illustration : ● 高度相關 Highly correlated ○ 中度相關 Moderately correlated

課程大綱
Course Outline

Part I: Basic Financial Mathematics

1. A Paradigm for Primary Asset Valuation
2. Complication of the Basic Paradigm
3. The Valuation of Derivative Securities
4. Optimal Decision Strategies and Valuation

Part II: Advanced Investment Strategies

1. Investment Opportunities and Investment Timing
2. The Value of a Project and the Decision to Invest
3. Entry, Exit, Lay-up, and Scrapping
4. Dynamic Equilibrium in a Competitive Industry

Part III: Introduction to Advanced Finance and the Mathematics of Continuous- Time Models

1. Introduction to Portfolio Selection and Capital Market Theory
2. Lifetime Portfolio Selection under Uncertainty
3. Theory of Rational Option Pricing

Part IV: International Financial and Investment Management

1. Paper Reading/TBA
2. Reporting and Term Paper Writing

資源需求評估 (師資專長之聘任、儀器設備的配合 . . . 等)

Resources Required (e.g. qualifications and expertise, instrument and equipment, etc.)

Expertise- Stochastic Process, Partial Differential Equation, Matlab, Mathematica, Crystal Ball

Facilities- Financial Management, Investment Management, Decision Science

課程要求和教學方式之建議

Course Requirements and Suggested Teaching Methods

Lecturing: 30%

Case studies: 20%

Examinations: 20%

Class Participation: 10%

Course project : 20%

其他
Miscellaneous

Textbooks:

1. Shimko, D.C. (1992), Finance in Continuous Time: A Primer, Florida: Kolb Pub. Co. (ISBN: 1878975072)
2. Merton, R.C. (1990), Continuous-Time Finance, Massachusetts: Blackwell Pub. (ISBN: 0631158472)
3. Dixit, A.V. and Pindyck, R.S. (1994), Investment under Uncertainty: New Jersey: Princeton Univ. Press. (ISBN:0691034109)