③国o支束華大學 教學計劃表 Syllabus

	3稱(中文) ne in Chinese	統計學(一)AC		學年/學期 Academic Year/Semester		107/1						
	3稱(英文) ne in English	Statistics (I)									
	目代碼 se Code	IB2140AC	系級 Department & Year	學二	開課單位 Course-Offering Department	資	訊管理學系					
	修別 Type	學程 Program	學分數/時 Credit(s)/Hou		3.(0/3.0						
	課教師 tructor	/林金龍										
	修課程 equisite											
		課	程描述 Cours	e Descrip	tion							
 H. G. Wells, an English author and historian, predicted over 100 years ago that quantitative reasoning will be as necessary for effective citizenship as the ability to read. He could not have been more correct especially for students in business and economics today who need to acquire the knowledge to organize, analyze, extract and then transform data to present the information. These basic statistical skills and methods are essential for making proper business and personal decisions. This course is the first semester of a one-year undergraduate statistics. It aims at equipping the students with the ability to describe data sets using graphs and numerical summaries, to use probability rules in problem solving, to supply inferential statistical techniques in decision making for business and real life situations. Topics studied include descriptive measures for empirical data, theory of probability, probability distributions, sampling distributions of statistics from large and small samples, estimation theory, hypothesis testing, correlation, and regression. One can never really master statistics without getting his/her hand dirty with real data. Analyzing real data using some statistical package is considered as an essential part of this course. I shall give empirical data analysis during the lectures and assign computer-related home work. For this purpose, I shall teach and ask students to learn and use R, a powerful statistical and yet free package. It can be downloaded from http://www.r-project.org 												
nttp.//www.		課	程目標 Cour	se Object	ives							
圖示說明[]	lustration :	高度相關 Hi	ghly correla	ated ○中	度相關 Moderately	corre	lated					
授課進度表 Teaching Schedule & Content												
週次Week		內容	Subject/Topi	cs		1	備註Remarks					
1	Introduction to	statistics an	d R									

2	Describing data frequency tables, frequency distributions and graphic presentation							
3	Describing data: numerical measure							
4	Describing data: displaying and exploring data							
5	A survey of probability concepts (1/2)							
6	A survey of probability concepts (2/2)							
7	Discrete probability distributions (1/2)							
8	Discrete probability distributions (2/2)							
9	期中考試週 Midterm Exam							
10	Sampling methods and the central limit theorem (1/2)							
11	Sampling methods and the central limit theorem (2/2)							
12	Estimation and confidence intervals (1/2)							
13	Estimation and confidence intervals (2/2)							
14	One-sample tests of hypothesis (1/2)							
15	One-sample tests of hypothesis (2/2)							
16	Two-sample tests of hypothesis (1/2							
17	Two-sample tests of hypothesis (2/2)							
18	期末考試週 Final Exam							
	教 學 策 略 Teaching Strategies							
✔ 課堂講	授 Lecture							
✓ 其他Miscellaneous: <u>分析實際統計資料</u>								
	教學創新自評 Teaching Self-Evaluation							
創新教學(Innovative Teaching)							
問題導向學習(PBL) 團體合作學習(TBL) 解決導向學習(SBL)								
□ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■								
社會責任(Social Responsibility)								
「在地實踐Community Practice 」 産學合作 Industy-Academia Cooperation								
☐ 跨界教學Transdisciplinary Teaching								
業師合授 Courses Co-taught with Industry Practitioners								
其它 othe	er:							

Performance 期中考成績 Midterm Exam 期末考成績 Final Exam 作業成績 Homework and/or Assignments	配分比例 Percentage 30% 40%	測驗 會考 ✓	實作 觀察	日頭發表	夕 九計雪 專題 研究	単 力 式 A 創作 展演	SSESSME 卷宗 評量	mus 證照 檢定	其他
平時成績 General Performance 期中考成績 Midterm Exam 期末考成績 Final Exam 作業成績 Homework and/or Assignments	30% 40%	會考 >							其他
期末考成績 Final Exam 作業成績 Homework and/or Assignments	40%								
期中考成績 Midterm Exam 期末考成績 Final Exam 作業成績 Homework and/or Assignments 其他 Miscellaneous	40%								
作業成績 Homework and/or Assignments		~							
Assignments	200/								
其他 Miscellaneous	30%		~						含上課出席率
()									
	Grading & A		F量方式> ents Sup			ruction	IS		
	and S. A. Wa Business and shing) earning Stati :\\ au/psycholog co lie with s 女材網址(含線. ls & Teacher'	then (2 Economi stics w y/ccs/t tatisti 上教學賞 s Websi	2014), cs, 16t with R: ceaching cs, New 資訊,教師 ite(Incl	h ed. N A tutor /lsr/ York: 下個人網 uding o	ew York ial for W.W. Na 址請列位	: McGra psycho orton & t於本校 eaching	w Hill logy stu Company 內之網址	udents y	
	其他補	充說明	(Supple	nental	instruct	tions)			