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# ②图玄東華大學

# 教學計劃表 Syllabus

課程名稱(中文) Course Name in Chinese	脂質化學與代謝			學年/學期 Academic Year/Semester		112/2	
課程名稱(英文) Course Name in English	Lipid chemist	ry and metabo	lism				
科目代碼 Course Code	BTM0140	系級 Department & Year	碩士	開課單位 Course-Offering Department	2	生命科學系	
修別 Type	選修 Elective	學分數/時間 Credit(s)/Hour(s)		3.0/3.0			
授課教師 Instructor	/蘇玟?						
先修課程 Prerequisite							

## 課程描述 Course Description

This course offers an in-depth exploration of lipid metabolism, encompassing its biochemical, physiological, and molecular dimensions. The primary focus will be on the key biochemical molecules and metabolic pathways essential for maintaining lipid homeostasis, with particular emphasis on phospholipids, triacylglycerols, and cholesterol. Additionally, the course will investigate current issues and research linking lipid metabolism to various human diseases, providing a comprehensive understanding of the subject's relevance in a clinical and health context.

#### 課程目標 Course Objectives

Enable students to understand:

- 1. Biochemical properties and metabolic pathways of lipids.
- 2. The regulatory mechanisms of lipids metabolism and the associated signaling pathways.
- 3. Techniques utilized in lipid biochemistry research.

#### 教導學生了解:

- 1. 脂質的基本組成結構以及其生化物理特性。
- 2. 脂質代謝路徑與其相關之調控機制與相關疾病。
- 3. 脂質生化學研究相關技術

	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	具備生物技術相關學科之基礎知識Having the basic knowledge of biotechnology.	•
В	具備邏輯分析與解決問題的能力Having the capabilities of logical analysis and problem solving.	•
С	具備資料整合、數據分析與書面及口頭報告能力Having the capabilities of data integration and analysis, and the skills of written and poster presentation.	•
D	具備終生學習的能力Having the capability of lifelong learning.	

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

# 授課進度表 Teaching Schedule & Content

週次Week	內容 Subject/Topics	備註Remarks
1		
2		

4       5         6       6         7       7         8       9         期中考試週 Midterm Exam       10         11       11         12       13         14       14						
6						
7 8 9 期中考試週 Midterm Exam 10 11 12 13 13						
8						
9 期中考試週 Midterm Exam  10  11  12  13						
10 11 12 13						
11 12 13 13 14 15 16 16 17 17 18 18 18 18 18 18 18 18 18 18 18 18 18						
12 13						
13						
14						
15						
16						
17						
18 期末考試週 Final Exam						
教 學 策 略 Teaching Strategies						
✓ 課堂講授 Lecture ✓ 分組討論Group Discussion     參觀實習 Field Trip						
教學創新自評 Teaching Self-Evaluation						
創新教學(Innovative Teaching)						
問題導向學習(PBL) ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■ ■						
翻轉教室 Flipped Classroom 磨課師 Moocs						
社會責任(Social Responsibility)						
■ 在地實踐Community Practice ■ 産學合作 Industy-Academia Cooperation						
跨域合作(Transdisciplinary Projects)						
──跨界教學Transdisciplinary Teaching ──跨院系教學Inter-collegiate Teaching						
     業師合授 Courses Co-taught with Industry Practitioners						
   其它 other:						

	學期成績計算	草及多元	、評量方式	弋 Gradi	ng & As	sessmen	ts		
配分項目 Items	配分比例 Percentage	多元評量方式 Assessments							
		測驗 會考	實作觀察	口頭 發表	專題 研究	創作 展演	卷宗評量	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									
其他 Miscellaneous ()									
	Grading & A		量方式和 ents Sup			ruction	ıs		
Textbook & Ot	教科書與參考 her References					-		ks, etc.)	
	教材網址(含線 ids & Teacher'								

其他補充說明(Supplemental instructions)