



資訊工程系 碩士班 114 學年度入學課程結構規劃表

2025 Curricula for the Master's Program in Department of Computer Science and Information Engineering

課程類別 Course Category		一年級 1 st Academic Year						二年級 2 nd Academic Year						
		第一學期 Semester 1			第二學期 Semester 2			第一學期 Semester 1			第二學期 Semester 2			
		課程名稱 Course Name	學分數 Credits	時數 Hours	課程名稱 Course Name	學分數 Credits	時數 Hours	課程名稱 Course Name	學分數 Credits	時數 Hours	課程名稱 Course Name	學分數 Credits	時數 Hours	
學院共同課程 (由學院開課) College Common Courses	選修 Elective	開關變換器的基本設計與分析微學分/1/1 Basic design and analysis of switching converters/1/1、機器人競賽與挑戰微學分/1/1 Robotics competition and challenge/1/1、網路與排隊理論/3/3 Data Networks and Queueing Theory/3/3、微波工程與應用/3/3 Microwave Engineering and Applications/3/3、低碳能源技術導論微學分/1/1 Introduction on Technologies of Low Carbon Energy/1/1、再生能源導論微學分/1/1 Introduction to Renewable Energy/1/1												
學院跨領域課程 (由學院開課) College Interdisciplinary Courses	選修 Elective	區塊鏈技術與應用/3/3 Blockchain Technology and Application/3/3、區塊鏈智能合約實務/3/3 Block Chain Smart Contract Practice/3/3												
	必修 Required	應修學分數 10 學分 Credits Needed 10	專題研討(一) Seminar (1)	2	2	專題研討(二) Seminar (2)	2	2	專題研討(三) Seminar (3)	2	2	專題研討(四) Seminar (4)	2	2
												論文 Thesis	6	6



系專業 課程 Departmental Professional Courses	選修 Elective	應修學分數 24 學分 Credits needed 24	生物計算/3/3	電腦視覺/3/3	圖形理論/3/3	機器學習/3/3
			Biomedical Algorithms/3/3	Computer Vision/3/3	Graphic Theory/3/3	Machine Learning/3/3
			高等計算機網路/3/3	圖型辨識/3/3	類神經網路/3/3	深度學習/3/3
			Advanced Computer Network/3/3	Pattern Recognition/3/3	Neural Networks/3/3	Deep Learning/3/3
			高等演算法/3/3	高等人工智慧/3/3	計算機圖學/3/3	強化學習/3/3
			Advanced Algorithms Analysis/3/3	Advanced Artificial	Computer Graphics/3/3	Reinforcement Learning/3/3
			數位影像處理/3/3	Intelligence/3/3	生物資訊學/3/3	整合學習/3/3
			Digital Image Processing/3/3	網路安全/3/3	Introduction To Computational	Ensemble Learning/3/3
			資料探勘/3/3	Network Security/3/3	Biology/3/3	機率學習/3/3
			Data Mining/3/3	密碼學/3/3	自然語言處理/3/3	Probabilistic Learning/3/3
			高等物件導向程式設計/3/3	Cryptography/3/3	Natural Language Processing	資料科學/3/3
			Advanced Object-Oriented	巨量資料分析/3/3	/3/3	Data Science/3/3
			Programming/3/3	Big Data Analysis/3/3	區塊鏈技術與應用/3/3	資料科學專題/3/3
			網路協定工程/3/3	智慧計算/3/3	Blockchain Technology and	Seminar on Data Science/3/3
			Network Protocol Engineering/3/3	Intelligent Computation/3/3	Application/3/3	時空資料庫與查詢技術/3/3
			高等 Linux 系統整合應用/3/3	高等資料庫/3/3	量子電腦程式設計/3/3	Spatio-temporal Databases and
			Advanced Integrated Application of	Advanced Database/3/3	Programming Design of	Query Techniques/3/3
			Linux System/3/3	雲端計算與服務/3/3	Quantum Computers/3/3	進階時空資料處理與實務/3/3
			基因演算法/3/3	Cloud Computing and	量子電腦進階程式設計/3/3	Advanced Spatio-Temporal Data
			Genetic Algorithm/3/3	Services/3/3	Advanced Quantum	Processing and Practice/3/3
			生成式人工智慧與應用/3/3		Programming of Quantum	
			Generative AI and Applications/3/3		Computers/3/3	
					網路科學與社會計算/3/3	
					Network Science and Social	
					Computing/3/3	

備註：

- 一、畢業總學分數為 38 學分。
- 二、必修 14 學分，選修 24 學分。
- 三、學生修讀所屬學院之「學院共同課程」應認列為本系專業課程學分；修讀所屬學院之「學院跨領域課程」或其他學院開課之課程，則認列為外系課程學分。

四、系所訂定條件（學程、檢定、證照、承認外系學分及其他）：

- （一）其他系所所開設之選修課程至多可承認 6 學分。
- （二）若有計畫型之課程要開設，需經系務會議通過。
- （三）其他相關規定依本系碩士班研究生指導與修讀辦法辦理。
- （四）外籍生經其指導教授同意，修讀非本系開設之英語授課課程(含線上課程)，可認列為畢業學分且不受承認外系學分數上限之限制。

Notes:

1. Minimum credit required to graduate: 38 .
2. Required courses: 14 credits; elective courses: 24 credits.
3. Credits earned by students from the common courses offered by their respective colleges shall be accepted as their affiliated department's professional courses. However, credits earned from interdisciplinary courses offered either by their college or by other colleges will be accepted as credits earned from departments outside their own.
4. Departmental requirements (Ex: programs, certifications, licenses, recognition of external department credits, and other requirements):
 - (1) Elective courses offered by other departments may be credited up to a maximum of 6 credits.
 - (2) If a planned course is to be offered, it must be approved by the department meeting.
 - (3) Other relevant regulations shall be handled in accordance with the department's regulations for graduate student supervision and study.
 - (4) Foreign students, with the approval of their academic advisor, may count English-taught courses (including online courses) not offered by their department towards graduation credits, and such credits will not be subject to the limit on credits from other departments.

