吳鳳科技大學 日間部 日四技　人工智慧無人機科技系 課程表（113學年度入學學生適用）

科目類別 (Categories of Courses)	第一學年 (First Academic Year) 上(First Semester) 科目 Course Title	學分 Credit	時數 Hour	下(Second Semester) 科目 Course Title	學分 Credit	時數 Hour	第二學年 (Second Academic Year) 上(First Semester) 科目 Course Title	學分 Credit	時數 Hour	下(Second Semester) 科目 Course Title	學分 Credit	時數 Hour	第三學年 (Third Academic Year) 上(First Semester) 科目 Course Title	學分 Credit	時數 Hour	下(Second Semester) 科目 Course Title	學分 Credit	時數 Hour	第四學年 (Forth Academic Year) 上(First Semester) 科目 Course Title	學分 Credit	時數 Hour	下(Second Semester) 科目 Course Title	學分 Credit	時數 Hour	小計 subtotal 學分 Credit	時數 Hour
基本素養 (Core Literacy)	英文(一)/English(I)	3	3	英文(二)/English(II)	3	3	安全教育/Safety Education	1	1																	
	文學賞析與習作/Appreciation & Composition of Chinese Literature	2	2	語文能力表達/The ability of Expression in Chinese Language	2	2	專業倫理/Professional Ethics	1	1																	
	體育(一)/Physical Education(I)	2	2	體育(二)/Physical Education(II)	2	2	創意概論與智財權/Introduction of creation	1	1																	
	勞作教育/Labor Education	1	1																								
	小計/subtotal	8	8		7	7		3	3		0	0		0	0		0	0		0	0		0	0	18	18
公民素養 (Civic Literacy)							公民素養(一)/Civic Literacy(I)	2	2	公民素養(二)/Civic Literacy(II)	2	2														
	小計/subtotal	0	0		0	0		0	0		2	2		2	2		0	0		0	0		0	0	4	4
院共同必修 (Courses required by the college)	微積分/Calculus	2	2	電腦實務與程式應用*/Computer pratice and programe application	2	2																				
	小計/subtotal	2	2		2	2		0	0		0	0		0	0		0	0		0	0		0	0	4	4
系專業必修 (Courses required by the department)	無人載具操作應用實務(一)*/UAV operation practice (1)*	2	3	無人載具操作應用實務(二)/UAV operation practice (2)	2	3	無人機設計組裝與維護保養/UAV design and maintenance	2	3	定翼機基礎實務/Fix wing drone	2	3	實務專題(一))/Practice topic	1	1	實務專題(二)/Special Projects (II)	1	1							
	人工智慧導論*#/Introduction to AI*#	2	2	基本電學/Basic electricity	2	2	電腦3D立體繪圖*#/3D Computer Drafting	3	3	資料科學*#/Data science	3	3	資料庫系統*#/Data base system	2	2	技術報告撰寫*/Technical Report Writing	2	2							
	航空概論/Introduction to Aviation	2	2	Python 程式設計概論*#/Introduction to Python Programming*#	2	2	機器學習概論*#/Machine learning priciple	2	3	機器學習資料解析與建模*#/Machine learning analysis and modeling	2	2	資料結構與演算法*#/Data base sturcture and algorithm*#	2	2	巨量資料分析實作*#/Massive data analysis implementation*	2	2							
	航空法規與倫理/Aviation regulations and ethics	2	2	基礎電腦繪圖*/Basic computer graphics*	2	2	初階專業英文 Professional English (I)	1	1	進階專業英文 Professional English (II)	1	1	33													
	小計/subtotal	8	9		8	9		8	10		8	9		5	5		5	5		0	0		0	0	42	47
	必修小計/Subtotal, Compulsory	18	19		17	18		11	13		10	11		7	7		5	5		0	0		0	0	68	73
系專業選修 (Courses required by the department)				作業風險管理/Operationa risk management	3	3	深度學習實務*#/Deep learning practice	3	3	感測器理論與實務*#/Sensor theory and practice	3	3	大數據分析概論*#/Introduction to big data analysis	3	3	進階深度學習*#/Advanced deep learning	3	3	智慧監測系統實務*/Smart monitoring system practice	3	3		
				空拍與影片製作/Aerial photography and video production	3	3	視覺學習概論*/Visual learning priciple	3	3	資料處理與分析概論*#/Introduction to data processing and analysis	3	3	C 程式設計實務*#/C Programming Practice	3	3	碳盤查實務/Carbon inventory practice	3	3	空中量測實務/Aerial measurement practice	3	3		
				3D列印實務*/3D printing practice	3	3	視窗程式設計*/Visual programming design	3	3	虛擬實境實務應用*/Virtual Reality Practical Application	3	3	無人機農噴實務/UAV agricultural spraying practice	3	3	群飛設計及操作實務*/Qunfei design and operation practice*	3	3	社群媒體製作實務*/Social Media Production Practice	3	3		
							FPV操作實務/FPV operation Practice	3	3										校外實習(一)/Practical Training(1)	3	3	校外實習(五)/Practical Training(5)	3	3		
																		校外實習(二)/Practical Training(2)	3	3	校外實習(六)/Practical Training(6)	3	3		
																		校外實習(三)/Practical Training(3)	3	3	校外實習(七)/Practical Training(7)	3	3		
																		校外實習(四)/Practical Training(4)	3	3					
				開設科目數2~3倍	9	9	開設科目數2~3倍	9	9	開設科目數2~3倍	8	9	開設科目數2~3倍	9	9	開設科目數2~3倍	21	21	開設科目數2~3倍	18	18					
該學期至少需選修學分/學時 minimum elective credits required for the semester		0	0		0	0		3	3		3	3		3	3		3	3		9	9		9	9	30	30
學分/學時小計 Subtotal, Credits/Hour		18	19		17	18		14	16		13	14		10	10		8	8		9	9		9	9	98	103

潛能課程：至多30學分
Potential courses: up to 30 credits

1. 通識護照：最多 4 學分 1. **General Education Learning** Passport: Up to 4 credits
2. 社團發展：最多 6 學分 2.Club Development: Up to 6 credits
3. 學程與跨系興趣選修：最多為本類課程應修學分 5. Course and interdepartmental interest electives: up to credits required for this type of courses

4. 校外實習：最多 21 學分 6.**Field Practice:** Up to 21 credits
5. 潛能課程相關課程詳細規定請參考「吳鳳科技大學潛能課程修要點」辦理。 7. Please refer to "Key Points of Potential Courses of Wufeng University of Science and

| 潛能課程學分/學時建議 Potential course credit/credit hour recommendations | 2 | 2 | | 2 | 2 | | 2 | 2 | | 7 | 7 | | 6 | 6 | | 4 | 4 | | 4 | 4 | | 3 | 3 | 30 | 30 |

畢業最低學分/學時 Total Number of Required Credit/Hour	20	21		19	20		16	18		20	21		16	16		12	12		13	13		12	12	128	133

共同選修 Common Elective	1. 「全民國防教育軍事訓練」課程有五大領域：（一）國際情勢（二）國防政策（三）全民國防（四）防衛動員（五）國防科技。 1. The "National Defense Education and Military Training " course has five areas: (1) International Situation (2) National Defense Policy (3) National Defense (4) Defense Mobilization (5) National Defense Science and Technology.	2. 各領域均為 0學分/2學時，可折抵役期。各領域每學期開設情況，均依當學期教務處公告為準。 2. 0 credits /2 class hours in all fields, which can be deducted for service period. The courses of each semester are subject to the announcement of the Academic Affairs Office of the current semester.		

備註/Notes：

一、校基本要求/Basic requirements of the university：

1.語文能力門檻：依據「吳鳳科技大學學生英文能力畢業門檻實施要點」相關規定辦理。

Language Proficiency Threshold: It shall be handled according to the implementation of "WuFeng University Students' English Proficiency Requirements for Graduation Threshold."

2.資訊能力門檻：依據「吳鳳科技大學學生資訊能力畢業門檻實施要點」，非資訊系(科)至少通過一種資訊基本能力認證測驗；資訊系(科)至少需通過兩種資訊能力認證測驗。

Information Capability Threshold: According to the implementation of "WuFeng University students' information capability requirements for graduation threshold." Students of non-information departments (sections) must pass at least one basic information proficiency certification test. Students of the information department must pass at least two information proficiency certification tests.

二、院基本要求/Basic requirements of the college：

1.學院必修科目為：微積分、電腦實務與程式應用、創意發明與智慧財產權。學生必須修習及格。

The compulsory subjects of the colleges: Calculus, Computer practice and programe application, Creativity and Intellectual Property Right. Students must pass these courses.

三、系所基本要求/Basic requirements of the department：

1.畢業學分數要求：至少需取得128學分方可畢業，其中包括(1)核心素養科目18學分(2)公民素養科目4學分(3)學院共同必修4學分(4)專業必修科目42學分 (5)專業選修科目**30學分** (6)學程、跨系興趣選修與潛能課程30學分。

Graduation credit requirements: At least 128 credits are required to graduate, including (1) 18 credits of core literacy subjects (2) 4 credits of civic literacy subjects (3) 4 credits of common compulsory courses in the college (4) 42 credits of professional compulsory courses (5) 30 credits for professional elective courses (6) 30 credits for academic courses, cross-department interest electives and potential courses.

2.各年級各學期修習學分數規定：(1)一～二年級：16~25學分。(2)三年級：14~25學分、(3)四年級：9~25學分。

Regulations on the number of credits for each grade and semester: (1) From first to second year: 16~25 credits. (2) Third year: 14~25 credits, (3) Forth year: 9~25 credits.

3.校外實習須符合「吳鳳科技大學學生校外實習課程實施要點」據以認定實習成績。

四、其他說明/Other remarks

1.*表示需使用電腦課程。

Indicates that a computer course is required.

2.本系可因應計劃和產業需求修改選修課。

The department may modify elective courses according to the needs of the program and industry.

五、訂(修)定歷程/Booking (Revised) History：

1. 113.07.10 人工智慧無人機科技系第112學年度第二學期第1次課程委員會通過；113.08.12安全工程學院113學年度第一學期第 1次課程委員會通過；113.09.06 113學年度第一學期第1次校課程委員會通過。

113/07/10 Department of AI UAS Technoology 113 academic year 2nd semester, adopted by the 1 Curriculum Committee conference; 113/08/12 113 academic year 1nd semester, adopted by the 1 College of Safety Engineering Curriculum Committee; 113/09/12 113 academic year 1st semester, adopted by the 1st Curriculum Committee conference.