

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject		第一學年		第二學年		第三學年		第四學年		
		上學期	下學期	上學期	下學期	上學期	下學期	上學期	下學期	
		學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits
校訂課程 Stipulated Courses	通識 基礎 必修 Required General Education Courses	中文閱讀與表達(1)(2) Chinese Reading and Expression(1)(2)	2/ 2	2/ 2						
		英文聽力與閱讀(1)(2) English Listening and Reading(1)(2)	2/ 2	2/ 2						
		服務教育與大學社會責任(1)(2) Service Education and University Social Responsibility (1)(2)	1/ 1	1/ 1						
		體育(1)(2)(3) Physical Education(1)(2)(3)	2/ 2	2/ 2	2/ 2					
		多元語言 Multilingual Learning			2/ 2					
	小計Subtotal	7/ 7	7/ 7	4/ 4	0/ 0	0/ 0	0/ 0	0/ 0	0/ 0	
	通識博雅必修 Required Liberal Arts Courses	健康與生活 Health and Life	2/ 2	2/ 2						
		創意思考與訓練 Creative Thinking and Training		2/ 2						
		博雅與跨域學習(1) Liberal Arts and Interdisciplinary Learning (1)			2/ 2					
		資訊與智慧生活 Information and Smart Life			2/ 2					
		生命與永續 Life and Sustainability				2/ 2	2/ 2			
		人文與社會 Humanities and Social Sciences					2/ 2			
		藝術與美感 Art and Beauty						2/ 2		
	小計Subtotal	2/ 2	4/ 4	4/ 4	2/ 2	4/ 4	2/ 2	0/ 0	0/ 0	
	一般選修 General Elective Courses	全民國防教育軍事訓練(1)(2)(3)(4) National Defense Education and Military Training (1)(2)(3)(4)	2/ 2	2/ 2	2/ 2	2/ 2				
博雅與跨域學習(2)(3)(4)(5) Liberal Arts and Interdisciplinary Learning (2)(3)(4)(5)					2/ 2	2/ 2	2/ 2	2/ 2		
小計Subtotal		2/ 2	2/ 2	2/ 2	4/ 4	2/ 2	2/ 2	2/ 2	0/ 0	
院必修 課程 Required College Courses	數學演習 Math exercises	2/ 2								
	生活物理 Physics of life	2/ 2								
	電腦軟體應用 Computer Software Application		2/ 2							
	職場倫理 Employment Ethics		2/ 2							
	創意實作 Creative Implementation			2/ 2						
	半導體概論 Introduction of Semiconductor			2/ 2						
	簡報製作與表達 Presentation and Communication Skills				2/ 2					
	小計Subtotal	4/ 4	4/ 4	4/ 4	2/ 2	0/ 0	0/ 0	0/ 0	0/ 0	
	專業必修課程 Professional Required Courses	熱力學 Thermodynamics	2/ 2							
		工程圖學 Engineering Drawing	2/ 2							
電工學 Electricity Engineering		2/ 2								
冷凍空調原理 Principles of Refrigeration and Air Conditioning			2/ 2							
冷凍空調裝修實習 Maintenance & Practice of Refrigeration and Air Conditioning				4/ 4						
流體力學 Fluid Mechanics					2/ 2					
能源工程 Energy Engineering					2/ 2					
冷凍工程與設計 Refrigeration Engineering and Design					2/ 2					
冷凍空調原理實驗 Experiment of Refrigeration and Air Conditioning Principle					2/ 2					
空調工程與設計 Air Conditioning Engineering and Design						2/ 2				
冷凍空調自動控制 Automatic Control of Refrigeration and Air Conditioning						2/ 2				
實務專題(1)(2)(3)(4) Practical Project(1)(2)(3)(4)				2/ 2	2/ 2	2/ 2	2/ 2			
小計Subtotal		6/ 6	2/ 2	6/ 6	10/ 10	6/ 6	2/ 2	0/ 0	0/ 0	
院選修 課程 Required College Courses		水電實務基本技能實習 Basic Practice in Electrical, Plumbing & Air Conditioning Engineering	2/ 2							
		程式語言 Programming Language	2/ 2							
	微積分 Calculus	2/ 2								
	基礎冷凍空調裝修實習 Basic Maintenance & Practice of Refrigeration and Air Conditioning		4/ 4							
	電子學 Electronics		2/ 2							
	電器修護實習 Electric Repairing Practice			4/ 4						
	電力電子學 Power Electronics			2/ 2						
	風力發電 Wind Power			2/ 2						
	進階冷凍空調裝修實習 Advanced Maintenance & Practice of Refrigeration and Air Conditioning				4/ 4					
	可程式控制實習 Programmable Logic Control Practice				2/ 2					
	太陽能工程 Solar Energy Engineering				2/ 2					

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject	第一學年				第二學年				第三學年				第四學年			
	上學期		下學期		上學期		下學期		上學期		下學期		上學期		下學期	
	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs
電腦輔助冷凍空調繪圖 Computer Aided Refrigeration and Air Conditioning Drafting									4	4						
消防工程 Fire Protection Engineering									2	2						
機電與能源實習 Practice of Mechatronics and Energy										4	4					
通風工程 Ventilation Engineering										2	2					
熱傳學 Heat Transfer										2	2					
半導體廠務工程 Semiconductor Facility Engineering										2	2					
低溫工程 Cryogenic Engineering										2	2					
冷凍空調節能技術 Energy-Saving Technology in Refrigeration and Air Conditioning													2	2		
流體機械 Fluid Machinery													2	2		
空調設計實務 Design Practice of Air Conditioning													2	2		
冷凍空調工程管理 Management of Refrigerating and Air Conditioning Engineering													2	2		
智慧財產權 Intellectual Property Right													2	2		
工業安全衛生 Industrial Safety and Health													2	2		
產業校外實習 Industrial Off-Campus Internship													9			
智慧能源管理技術 Smart Energy Management Technology															2	2
智慧生活與物聯網實習 Smart living and practical training of Internet of Thing															2	2
熱交換器設計 Heat Exchanger Design															2	2
電腦輔助空調系統分析 Computer Aided Air Conditioning System Analysis															2	2
冷凍空調系統設計 Design & Construction of refrigeration and Air-Conditioning System															2	2
噪音原理與防治 Noise principle and Prevention															2	2
學期校外實習 Off-campus Semester Internship															9	
擬開最低專業選修學分 Proposed Minimum Elective Credits	合計Total		2/ 2	4/ 4	4/ 4	6/ 6	4/ 4	8/ 8	10/ 10	8/ 8						
備註 Note	113年08月 日 校課程發展委員會會議通過Amended Date : 2024-08- 一、畢業總學分至少128學分： The total number of credits completed to be eligible to graduate shall not be less than 128 credits. 1.校訂必修36學分(含通識基礎必修18學分、通識博雅必修18學分)。 The stipulated compulsory credits shall be 36 credits.(18 credits for required general education courses, and 18 credits for required liberal arts courses.) 2.專業必修46學分(院必修14學分、系必修32學分)。 The professional compulsory credits shall be 46 credits.(14 credits for required college courses, and 32 credits for required department courses.) 3.系專業選修至少34學分。 The professional elective credits shall be not less than 34 credits. 4.跨系選修至多12學分。 The number of inter-department elective credits shall be up to 12 credits. ※「微學分課程」最多採計12學分。 The number of 'Micro-Credit Courses' credits shall be up to 12credits. 二、畢業門檻：Graduation Threshold 1.學生於修業年限內，應修畢「校訂必修」、「專業必修」、「系專業選修」、「跨系選修」共計128學分。 Students are required to complete a total of 128 credits of " Stipulated Compulsory Course", "Professional Compulsory Course", "Department Professional Elective Course", and "Inter-College Elective Courses " within their academic years. 三、校訂課程：Stipulated Courses 1.校訂課程不須依先後順序修課，不得互抵者，包括「中文閱讀與表達(1)(2)、英文聽力與閱讀(1)(2)、體育(1)(2)(3)」課程。 Stipulated courses are not required to be taken in sequence and the credits shall not be mutually transferred, including "Chinese Reading and Expression (1) (2), English listening and reading (1) (2), and physical education (1) (2) (3) " courses. 2.校訂課程不須依先後順序修課，得互抵者，包括「服務教育與大學社會責任(1)(2)」、「博雅與跨域學習(1)(2)(3)(4)(5)」課程。 Stipulated courses are not required to be taken in sequence and those that may be mutually complemented by each other may be only "Service Education and University Social Responsibility (1) (2)" and "Liberal Arts and Interdisciplinary Learning (1)(2)(3)(4)(5)". 3.校訂課程不須依先後順序修課，包括「全民國防教育軍事訓練(1)(2)(3)(4)」課程。 Stipulated courses are not required to be taken in sequence, including National Defense Education and Military Training (1)(2)(3)(4) . 四、專業課程：Professional Courses: 1.「實務專題(1)(2) (3) (4)」課程應依先後順序修課，得互抵。 Practical Project(1)(2) (3) (4) shall be taken in sequence and the credits shall be mutually transferred.															

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject		第一學年				第二學年				第三學年				第四學年				
		上學期		下學期		上學期		下學期		上學期		下學期		上學期		下學期		
		學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	
校訂 課程 Stipulated Courses	通識 基礎 必修 Required General Education Courses	中文閱讀與表達(1)(2) Chinese Reading and Expression(1)(2)	2/2		2/2													
		英文聽力與閱讀(1)(2) English Listening and Reading(1)(2)	2/2		2/2													
		服務教育與大學社會責任(1)(2) Service Education and University Social Responsibility (1)(2)	1/1		1/1													
		體育(1)(2)(3) Physical Education(1)(2)(3)	2/2		2/2		2/2											
		多元語言 Multilingual Learning					2/2											
	小計Subtotal	7/7		7/7		4/4		0/0		0/0		0/0		0/0		0/0		
	通識博雅必修 Required Liberal Arts Courses	健康與生活 Health and Life	2/2		2/2													
		創意思考與訓練 Creative Thinking and Training			2/2													
		博雅與跨域學習(1) Liberal Arts and Interdisciplinary Learning (1)					2/2											
		資訊與智慧生活 Information and Smart Life					2/2											
		生命與永續 Life and Sustainability							2/2		2/2							
		人文與社會 Humanities and Social Sciences									2/2							
		藝術與美感 Art and Beauty										2/2						
	小計Subtotal	2/2		4/4		4/4		2/2		4/4		2/2		0/0		0/0		
	一般選修 General Elective Courses	全民國防教育軍事訓練(1)(2)(3)(4) National Defense Education and Military Training (1)(2)(3)(4)	2/2		2/2		2/2		2/2									
博雅與跨域學習(2)(3)(4)(5) Liberal Arts and Interdisciplinary Learning (2)(3)(4)(5)								2/2		2/2		2/2		2/2				
小計Subtotal		2/2		2/2		2/2		4/4		2/2		2/2		2/2		0/0		
專業必修課程 Professional Required Courses	院必修 課程 Required College Courses	數學演練習作 Math exercises	2/2															
		生活物理 Physics of life	2/2															
		電腦軟體應用 Computer Software Application			2/2													
		職場倫理 Employment Ethics			2/2													
		創意實作 Creative Implementation					2/2											
	系必修 課程 Required Department Courses	半導體概論 Introduction of Semiconductor					2/2											
		簡報製作與表達 Presentation and Communication Skills							2/2									
		小計Subtotal	4/4		4/4		4/4		2/2		0/0		0/0		0/0		0/0	
		熱力學 Thermodynamics	2/2															
		工程圖學 Engineering Drawing	2/2															
		電工學 Electricity Engineering	2/2															
		冷凍空調原理 Principles of Refrigeration and Air Conditioning			2/2													
		冷凍空調裝修實習 Maintenance & Practice of Refrigeration and Air Conditioning					4/4											
		流體力學 Fluid Mechanics							2/2									
		能源工程 Energy Engineering							2/2									
冷凍工程與設計 Refrigeration Engineering and Design							2/2											
冷凍空調原理實驗 Experiment of Refrigeration and Air Conditioning Principle							2/2											
空調工程與設計 Air Conditioning Engineering and Design								2/2										
冷凍空調自動控制 Automatic Control of Refrigeration and Air Conditioning								2/2										
實務專題(1)(2)(3)(4) Practical Project(1)(2)(3)(4)					2/2		2/2		2/2		2/2							
小計Subtotal	6/6		2/2		6/6		10/10		6/6		2/2		0/0		0/0			
專業必修課程 Professional Required Courses	系必修 課程 Required Department Courses	水電實務基本技能實習 Basic Practice in Electrical, Plumbing & Air Conditioning Engineering	2/2															
		程式語言 Programming Language	2/2															
		微積分 Calculus	2/2															
		基礎冷凍空調裝修實習 Basic Maintenance & Practice of Refrigeration and Air Conditioning			4/4													
		電子學 Electronics			2/2													
		電器修護實習 Electric Rep/Airing Practice					4/4											
		電力電子學 Power Electronics					2/2											
		風力發電 Wind Power					2/2											
		進階冷凍空調裝修實習 Advanced Maintenance & Practice of Refrigeration and Air Conditioning							4/4									
		可程式控制實習 Programmable Logic Control Practice							2/2									
		太陽能工程 Solar Energy Engineering							2/2									

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject	第一學年				第二學年				第三學年				第四學年			
	上學期		下學期		上學期		下學期		上學期		下學期		上學期		下學期	
	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs	學分 Credits	時數Ho hrs
電腦輔助冷凍空調繪圖 Computer Aided Refrigeration and Air Conditioning Drafting									4/ 4							
消防工程 Fire Protection Engineering									2/ 2							
機電與能源實習 Practice of Mechatronics and Energy										4/ 4						
通風工程 Ventilation Engineering										2/ 2						
熱傳學 Heat Transfer										2/ 2						
半導體廠務工程 Semiconductor Facility Engineering										2/ 2						
低溫工程 Cryogenic Engineering										2/ 2						
冷凍空調節能技術 Energy-Saving Technology in Refrigeration and Air Conditioning													2/ 2			
流體機械 Fluid Machinery													2/ 2			
空調設計實務 Design Practice of Air Conditioning													2/ 2			
冷凍空調工程管理 Management of Refrigerating and Air Conditioning Engineering													2/ 2			
智慧財產權 Intellectual Property Right													2/ 2			
工業安全衛生 Industrial Safety and Health													2/ 2			
產業校外實習 Industrial Off-Campus Internship													9/			
智慧能源管理技術 Smart Energy Management Technology															2/ 2	
智慧生活與物聯網實習 Smart living and practical training of Internet of Thing															2/ 2	
熱交換器設計 Heat Exchanger Design															2/ 2	
電腦輔助空調系統分析 Computer Aided Air Conditioning System Analysis															2/ 2	
冷凍空調系統設計 Design & Construction of refrigeration and Air-Conditioning System															2/ 2	
噪音原理與防治 Noise principle and Prevention															2/ 2	
學期校外實習 Off-campus Semester Internship															9/	
小計Subtotal	6/ 6		6/ 6		8/ 8		8/ 8		6/ 6		12/ 12		21/ 12		12/ 12	79/
必修學分	19/	19/	17/	17/	18/	18/	14/	14/	10/	10/	4/	4/	0/	0/	0/	0/
擬開最低學分	21/	21/	21/	21/	22/	22/	20/	20/	14/	14/	12/	12/	10/	10/	8/	8/
擬開最低專業選修學分 Proposed Minimum Elective Credits																46/
合計Total	2/ 2		4/ 4		4/ 4		6/ 6		4/ 4		8/ 8		10/ 10		8/ 8	
備註 Note	113年08月 日 校課程發展委員會會議通過Amended Date : 2024-08- 一、畢業總學分至少128學分： The total number of credits completed to be eligible to graduate shall not be less than 128 credits. 1.校訂必修36學分(含通識基礎必修18學分、通識博雅必修18學分)。 The stipulated compulsory credits shall be 36 credits.(18 credits for required general education courses, and 18 credits for required liberal arts courses.) 2.專業必修46學分(院必修14學分、系必修32學分)。 The professional compulsory credits shall be 46 credits.(14 credits for required college courses, and 32 credits for required department courses.) 3.系專業選修至少34學分。 The professional elective credits shall be not less than 34 credits. 4.跨系選修至多12學分。 The number of inter-department elective credits shall be up to 12 credits. ※「微學分課程」最多採計12學分。 The number of 'Micro-Credit Courses' credits shall be up to 12credits. 二、畢業門檻：Graduation Threshold 1.學生於修業年限內，應修畢「校訂必修」、「專業必修」、「系專業選修」、「跨系選修」共計128學分。 Students are required to complete a total of 128 credits of "Stipulated Compulsory Course", "Professional Compulsory Course", "Department Professional Elective Course", and "Inter-College Elective Courses" within their academic years. 三、校訂課程：Stipulated Courses 1.校訂課程不須依先後順序修課，不得互抵者，包括「中文閱讀與表達(1)(2)、英文聽力與閱讀(1)(2)、體育(1)(2)(3)」課程。 Stipulated courses are not required to be taken in sequence and the credits shall not be mutually transferred, including "Chinese Reading and Expression (1) (2), English listening and reading (1) (2), and physical education (1) (2) (3)" courses. 2.校訂課程不須依先後順序修課，得互抵者，包括「服務教育與大學社會責任(1)(2)」、「博雅與跨域學習(1)(2)(3)(4)(5)」課程。 Stipulated courses are not required to be taken in sequence and those that may be mutually complemented by each other may be only "Service Education and University Social Responsibility (1) (2)" and "Liberal Arts and Interdisciplinary Learning (1)(2)(3)(4)(5)". 3.校訂課程不須依先後順序修課，包括「全民國防教育軍事訓練(1)(2)(3)(4)」課程。 Stipulated courses are not required to be taken in sequence, including National Defense Education and Military Training (1)(2)(3)(4) . 四、專業課程：Professional Courses: 1.「實務專題(1)(2)(3)(4)」課程應依先後順序修課，得互抵。 Practical Project(1)(2)(3)(4) shall be taken in sequence and the credits shall be mutually transferred.															

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject		第一學年				第二學年				第三學年				第四學年				
		上學期		下學期		上學期		下學期		上學期		下學期		上學期		下學期		
		學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	
校訂 課程 Stipulated Courses	通識 基礎 必修 Required General Education Courses	中文閱讀與表達(1)(2) Chinese Reading and Expression(1)(2)	2/2	2/2														
		英文聽力與閱讀(1)(2) English Listening and Reading(1)(2)	2/2	2/2														
		服務教育與大學社會責任(1)(2) Service Education and University Social Responsibility (1)(2)	1/1	1/1														
		體育(1)(2)(3) Physical Education(1)(2)(3)	2/2	2/2	2/2													
		多元語言 Multilingual Learning			2/2													
		小 計Subtotal	7/7	7/7	4/4	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0
		通識博雅必修 Required Liberal Arts Courses	健康與生活 Health and Life	2/2	2/2													
	創意思考與訓練 Creative Thinking and Training		2/2															
	博雅與跨域學習(1) Liberal Arts and Interdisciplinary Learning (1)			2/2														
	資訊與智慧生活 Information and Smart Life			2/2														
	生命與永續 Life and Sustainability				2/2	2/2												
	人文與社會 Humanities and Social Sciences					2/2												
	藝術與美感 Art and Beauty							2/2										
	小 計Subtotal	2/2	4/4	4/4	2/2	4/4	2/2	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	
	一般選修 General Elective Courses	全民國防教育軍事訓練(1)(2)(3)(4) National Defense Education and Military Training (1)(2)(3)(4)	2/2	2/2	2/2	2/2												
博雅與跨域學習(2)(3)(4)(5) Liberal Arts and Interdisciplinary Learning (2)(3)(4)(5)					2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	
小 計Subtotal	2/2	2/2	2/2	4/4	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	0/0	
專業必 修課程 Professional Required Courses	院必修 課程 Required College Courses	數學演練習作 Math exercises	3/3															
		生活物理 Physics of life	3/3															
		電腦軟體應用 Computer Software Application		2/2														
		職場倫理 Employment Ethics		2/2														
		半導體概論 Introduction of Semiconductor			2/2													
		簡報製作與表達 Presentation and Communication Skills				2/2												
		小 計Subtotal	6/6	4/4	2/2	2/2	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0
	系必修 課程 Required Department Courses	熱力學 Thermodynamics	3/3															
	冷凍空調原理 Principles of Refrigeration and Air Conditioning		3/3															
	電工學 Electricity Engineering		3/3															
	能源工程 Energy Engineering		3/3															
	流體力學 Fluid Mechanics		3/3															
	冷凍工程與設計 Refrigeration Engineering and Design			3/3														
	空調工程與設計 Air Conditioning Engineering and Design				3/3													
	冷凍空調自動控制 Automatic Control of Refrigeration and Air Conditioning				3/3													
實務專題(1)(2)(3)(4) Practical Project(1)(2)(3)(4)			2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2		
小 計Subtotal	3/3	6/6	8/8	5/5	8/8	2/2	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0	0/0		
		工程圖學 Engineering Drawing	3/3															
		電子學 Electronics	3/3															
		水電實務基本技能實習 Basic Practice in Electrical, Plumbing & Air Conditioning Engineering	3/3															
		微積分 Calculus	3/3															
		基礎冷凍空調裝修實習 Basic Maintenance & Practice of Refrigeration and Air Conditioning		3/3														
		程式語言 Programming Language		3/3														
		電力電子學 Power Electronics		3/3														
		冷凍空調裝修實習 Maintenance & Practice of Refrigeration and Air Conditioning			3/3													
		電器修護實習 Electric Repairing Practice			3/3													
		冷凍空調原理實驗 Experiment of Refrigeration and Air Conditioning Principle			3/3													
		進階冷凍空調裝修實習 Advanced Maintenance & Practice of Refrigeration and Air Conditioning				3/3												
		半導體廠務工程 Semiconductor Facility Engineering				3/3												
		可程式控制實習 Programmable Logic Control Practice				3/3												

中信科技大學 四年制 冷凍空調與能源系 進修部 課程規劃表(適用113學年度入學)
 CTBC university of technology Curriculum of Refrigeration Air Conditioning and Energy Department for Four-Year Bachelor's Degree Program
 -Night Division (Effective from Fall 2024)

科目名稱 Subject	第一學年				第二學年				第三學年				第四學年				
	上學期		下學期		上學期		下學期		上學期		下學期		上學期		下學期		
	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	學分 Credits	時數 Hrs	
系專業選修 課程 Professional Elective Courses	風力發電 Wind Power						3/3										
	電腦輔助冷凍空調繪圖 Computer Aided Refrigeration and Air Conditioning Drafting								3/3								
	LED原理與應用 Principle and Application of LED								3/3								
	機電與能源實習 Practice of Mechatronics and Energy									3/3							
	空調設計實務 Design Practice of Air Conditioning										3/3						
	通風工程 Ventilation Engineering											3/3					
	熱傳學 Heat Transfer												3/3				
	消防工程 Fire Protection Engineering													3/3			
	冷凍空調節能技術 Energy-Saving Technology in Refrigeration and Air Conditioning														3/3		
	流體機械 Fluid Machinery														3/3		
	太陽能工程 Solar Energy Engineering														3/3		
	冷凍空調工程管理 Management of Refrigerating and Air Conditioning Engineering														3/3		
	智慧財產權 Intellectual Property Right															2/2	
	工業安全衛生 Industrial Safety and Health															2/2	
	產業校外實習 Industrial Off-Campus Internship															9/	
	智慧能源管理技術 Smart Energy Management Technology																3/3
	智慧生活與物聯網實習 Smart living and practical training of Internet of Thing																3/3
	熱交換器設計 Heat Exchanger Design																3/3
	電腦輔助空調系統分析 Computer Aided Air Conditioning System Analysis																3/3
	冷凍空調系統設計 Design & Construction of refrigeration and Air- Conditioning System																3/3
	學期校外實習 Off-campus Semester Internship																9/
小計Subtotal	12/12		9/9		9/9		12/12		6/6		15/15		16/16		15/15		
擬開最低專業選修學分 Proposed Minimum Elective Credits	合計Total	3/3		3/3		3/3		6/6		3/3		9/9		10/10		9/9	
備註 Note	113年07月 日 校課程發展委員會會議通過Amended Date : 2024-07-																
	一、畢業總學分至少128學分： The total number of credits completed to be eligible to graduate shall not be less than 128 credits. 1.校訂必修36學分(含通識基礎必修18學分、通識博雅必修18學分)。 The stipulated compulsory credits shall be 36 credits.(18 credits for required general education courses, and 18 credits for required liberal arts courses.) 2.專業必修46學分(院必修14學分、系必修32學分)。 The professional compulsory credits shall be 46 credits.(14 credits for required college courses, and 32 credits for required department courses.) 3.系專業選修至少34學分。 The professional elective credits shall be not less than 34 credits. 4.跨系選修至多12學分。 The number of inter-department elective credits shall be up to 12 credits. ※「微學分課程」最多採計12學分。 The number of 'Micro-Credit Courses' credits shall be up to 12credits.																
	二、畢業門檻：Graduation Threshold 1.學生於修業年限內，應修畢「校訂必修」、「專業必修」、「系專業選修」、「跨系選修」共計128學分。 Students are required to complete a total of 128 credits of " Stipulated Compulsory Course", "Department Professional Elective Course", and "Inter-College Elective Courses " within their academic years.																
	三、校訂課程：Stipulated Courses 1.校訂課程不須依先後順序修課，不得互抵者，包括「中文閱讀與表達(1)(2)、英文聽力與閱讀(1)(2)、體育(1)(2)(3)」課程。 Stipulated courses are not required to be taken in sequence and the credits shall not be mutually transferred, including "Chinese Reading and Expression (1) (2), English listening and reading (1) (2), and physical education (1) (2) (3) " courses. 2.校訂課程不須依先後順序修課，得互抵者，包括「服務教育與大學社會責任(1)(2)」、「博雅與跨域學習(1)(2)(3)(4)(5)」課程。 Stipulated courses are not required to be taken in sequence and those that may be mutually complemented by each other may be only "Service Education and University Social Responsibility (1) (2)" and "Liberal Arts and Interdisciplinary Learning (1)(2)(3)(4)(5)". 3.校訂課程不須依先後順序修課，包括「全民國防教育軍事訓練(1)(2)(3)(4)」課程。 Stipulated courses are not required to be taken in sequence, including National Defense Education and Military Training (1)(2)(3)(4) .																
四、專業課程：Professional Courses: 1.「實務專題(1)(2) (3) (4)」課程應依先後順序修課，得互抵。 Practical Project(1)(2) (3) (4) shall be taken in sequence and the credits shall be mutually transferred.																	