CURRICULUM FOR BACHELOR OF ENGINEERING (ELECTRICAL & ELECTRONIC)
WITH CN YANG SCHOLARS PROGRAMME
SECOND MAJOR IN SUSTAINABILITY (EESN)
(FIRST YEAR ADMISSION)
AY2025 Intake Onwards

	SUMMARY OF ACADEMIC UNIT REQUIREMENT							
	Major Requirements			**Interdisciplinary Collaborative Core**				
Year of Study	**Core**	**CNYSP-Core**	**MPE**	**CC**	**Professional Series (PS)**	**Care, Serve, Learn**	**BDE**	**Total AU**
1	9 [2]	27 [3]	0	2	0	0	3	**41 [5]**
2	15 [3]	10	0	8	3	3	0	**39 [3]**
3	14	0	12 [3]	0	6	0	10	**42 [3]**
4	8	0	9	0	0	0	6	**23**
Total	**46 [5]**	**37 [3]**	**21 [3]**	**10**	**9**	**3**	**19**	**145 [11]**

[ ] AU of courses that could be used to fulfil Core/MPE requirement and second major requirement concurrently.

YEAR 1 SEMESTER 1				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**
CY1001	Cell	CNY-Core	3	
CY1101	Molecule	CNY-Core	4	
CY1308	Physics	CNY-Core	3	CNYSP Courses
CY1500	Introduction to Research	CNY-Core	2	
CY1601	Mathematics I	CNY-Core	4	
EG1001^	Engineers in Society	C	2	**Double-counted as Practice Core**
			18	

YEAR 1 SEMESTER 2				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**
CY1007^	Climate Change	CNY-Core	3	**Double-counted as Planet Core**
CY1602	Mathematics II	CNY-Core	4	CNYSP Course
EE1071	EEE Laboratory 1	C	1	
IE1005	From Computational Thinking to Programming	C	3	
IE2104	Digital Electronics	C	3	
CC0015	Health & Wellbeing	CC	2	
	Second Major Compulsory Course 3	BDE	3	Please see attached list of courses to choose from
			19	

YEAR 1 SPECIAL SEMESTER				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**
CY2003	Research Attachment 3	CNY-Core	4	CNYSP Course
	Overseas Learning Trip			
			4	

YEAR 2 SEMESTER 1				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**
CY0001	Writing Across the Disciplines	CNY-Core	3	CNYSP Course
EE2101	Circuit Analysis	C	3	
IE2106	Engineering Mathematics I	C	3	**CY1602**
CC0006	Sustainability: Society, Economy & Environment	CC	3	
ML0004	Career Design & Workplace Readiness in the V.U.C.A. World	CC	2	
IE0005	Introduction to Data Science and Artificial Intelligence	PS	3	
	Tech-For-Good (T4G)	CSL	3	
			20	

YEAR 2 SEMESTER 2				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**
CY0002	Ethics	CNY-Core	3	CNYSP Course
CY2001	Research Attachment 1	CNY-Core	4	CNYSP Course 2-semester long, course registered only in Sem 2 (similar to URECA)
EE2005^	Electrical Devices & Machines	C	3	**EE2101 Double-counted as SN Elective**
EE2102	Analog Electronics	C	3	**EE2101**
IE2110	Signals and Systems	C	3	**CY1601/CY1602**
SP0061	Science & Technology for Humanity	CC	3	
			19	

YEAR 3 SEMESTER 1				
Course Code	**Course Title**	**Type**	**AU**	**Pre-Requisite/Remarks**

EE2073	Intro to EEE Design & Project	C	2	
EE2103	Semiconductor Fundamentals	C	3	
IE2108	Data Structures & Algorithms	C	3	
EE3XXX^*	Third Year Technical Elective 1	MPE	3	**Choose: EE3015 to double-count as SN Elective**
	Third Year Technical Elective 2	MPE	3	
	Profession Preparation	PS	1	
	Second Major Compulsory Course 4	BDE	3	Please see attached list of courses to choose from
			18	

YEAR 3 SEMESTER 2				
Course Code	Course Title	Type	AU	Pre-Requisite/Remarks
EE3101	Engineering Electromagnetics	C	3	**IE2107 (co-req)**
EE3180	Design & Innovation Project	C	3	
EE4XXX^*	Final Year Technical Elective	MPE	3	**Choose: EE4530/EE4532/EE4533/EE4534 to double count as SN Elective**
	Final Year Design/Technical Elective	MPE	3	
	SN Elective 3	BDE	3	Please see attached list of electives to choose from
	SN Elective 4	BDE	4	
			19	

YEAR 3 SPECIAL SEMESTER				
Course Code	Course Title	Type	AU	Pre-Requisite/Remarks
EE3910	Professional Attachment	PS	5	**Y3 standing, completed ≥4 semesters of study**
			5	

YEAR 4 SEMESTER 1				
Course Code	Course Title	Type	AU	Pre-Requisite/Remarks
EE4081	CNYSP Overseas Final Year Project	C	8	CNYSP Course
			8	

YEAR 4 SEMESTER 2				
Course Code	Course Title	Type	AU	Pre-Requisite/Remarks
	Final Year Design Elective	MPE	3	
	Final Year Technical Elective	MPE	3	
	Final Year Design/Technical Elective	MPE	3	
	Second Major Compulsory Course 5	BDE	3	Please see attached list of courses to choose from
	Second Major Interdisciplinary Project	BDE	3	
			15	
		Total AU for Graduation:	**145**	

^ *These courses are double-counted towards both EEE as well as the Second Major in Sustainability*

*Students to choose which PE to double count as SN elective. Max number of AUs that can be double counted is 12AUs.

Compulsory Courses and Electives for Second Major in Sustainability
https://www.ntu.edu.sg/ase/admissions/undergraduate-programmes/second-major-in-sustainability#Content_C002_Col00