Program Curriculum Form

University Name: Northern Technical University.....

Faculty/Institute: Technical Engineering College Mosul.....

Scientific Department: Electrical Engineering Technology

Academic or Professional Program Name: Bachelor of Electrical Engineering Technology

Final Certificate Name: Bachelor of Electrical Engineering Technology

Academic System: Bologna Process.....

Description Preparation Date: 2/9/2025

File Completion Date: 2/9/2025

Signature:

Head of Department Name:

prof Dr. Mohammed Yahya Sulaiman

الجامعة التقنية الشمالية
الكلية التقنية الهندسية / الموصل
قسم تقنيات الهندسة الكهربائية

Date: 2/9/2025

Signature:

Scientific Associate Name:

Prof. Dr. Mohammed Sabah Jarjees

Date: 25/9/2025

The file is checked by:

Department of Quality Assurance and University Performance

Director of the Quality Assurance and University Performance Department: Assist. Lect. Warqaa Hashim Mahmood

Date:

Signature:

الجامعة التقنية الشمالية
الكلية التقنية الهندسية
الموصل

Approval of the Dean

Republic of Iraq - Ministry of Higher Education and Scientific Research
Northern Technical University
Bachelor's degree in Electrical Engineering Techniques (First cycle)
Four years (Eight semesters) - 240 ECTS credits - 1 ECTS = 30 hr
Program Curriculum (2025 - 2026)

جمهورية العراق- وزارة التعليم العالي والبحث العلمي
الجامعة التقنية الشمالية
بكالوريوس في تقنيات الهندسة الكهربائية (الدورة الأولى)
اربع سنوات (ثمان فصول دراسية) - 240 وحدة اوربية - كل وحدة اوربية = ٣٠ ساعة
المنهاج الدراسي للعام الدراسي ٢٠٢٥-٢٠٢٦

الجامعة التقنية الشمالية
Northern Technical University

Level	Semester	No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam hr/sem	SSWL hr/sem	USSWL hr/sem	SWL hr/sem	ECTS	Module Type	Prerequisite
						CL (hr/w)	Lect	Lab	Pr	Tut	Semn							
UGI	One	1	EET100	DC Electrical Circuits	English	4		2			3	3	93	107	200	8	C	LRM
		2	EET101	Digital Technologies	English	4		2			3	3	93	57	150	6	C	LRM
		3	EET102	Engineering Drawing	English			4				3	63	87	150	6	B	None
		4	EET103	Mathematics	English	6				2	3	3	123	27	150	6	B	LRM
		5	NTU100	Human Rights and Democracy	Arabic	2					6	3	33	17	50	2	S	None
		6	NTU101	English Language	English	2						3	33	17	50	2	S	None
					Total	18	0	8	0	2	15	18	438	312	750	30		
	Semester	No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam hr/sem	SSWL hr/sem	USSWL hr/sem	SWL hr/sem	ECTS	Module Type	Prerequisite
						CL (hr/w)	Lect	Lab	Pr	Tut	Semn							
	Two	1	EET104	Engineering Mechanics	English	3					6	3	48	77	125	5	B	None
		2	EET105	Engineering Workshops	English			3			4	3	48	102	150	6	B	None
		3	EET106	AC Electrical Circuits	English	4		3			4	3	108	92	200	8	C	LRM
		4	EET107	Physics	English	3		2			4	3	78	72	150	6	B	LRM
		5	NTU103	Arabic Language	Arabic	2					4	3	33	17	50	2	S	LRM
		6	NTU102	Computer	English	2		2			4	3	63	12	75	3	B	LRM
					Total	14	0	10	0	0	26	18	378	372	750	30		
Level	Semester	No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam hr/sem	SSWL hr/sem	USSWL hr/sem	SWL hr/sem	ECTS	Module Type	Prerequisite
						CL (hr/w)	Lect	Lab	Pr	Tut	Semn							
UGII	Three	1	EET200	DC Generators	English	3		2			3	3	78	72	150	6	C	LRM
		2	EET201	Electronic Essentials	English	3		2			2	3	78	47	125	5	C	LRM
		3	EET202	Electrical Circuit Analysis	English	2		2			3	3	63	62	125	5	C	LRM
		4	EET203	Sensors	English	2		2			4	3	63	62	125	5	C	LRM
		5	EET204	Applied Mathematics	English	4				2		3	93	32	125	5	B	LRM
		6	NTU201	English Language	English	2					3	3	33	17	50	2	S	LRM
		7	NTU200	Crimes of the Ba'ath Regime in Iraq	Arabic	2						3	33	17	50	2	S	None
					Total	18	0	8	0	2	15	21	441	309	750	30		
	Semester																	
	Four	No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam hr/sem	SSWL hr/sem	USSWL hr/sem	SWL hr/sem	ECTS	Module Type	Prerequisite
						CL (hr/w)	Lect	Lab	Pr	Tut	Semn							
		1	EET207	DC Motors	English	3		2			3	3	78	72	150	6	C	LRM
		2	EET208	comunication	English	2		2			3	3	63	87	150	6	C	LRM
		3	EET209	power circuit and transformer	English	4		2			4	3	93	82	175	7	C	LRM
		4	EET210	Instruments and Measurements	English	3		2			2	3	78	72	150	6	C	LRM
		5	NTU202	Computer	English	2						3	33	42	75	3	S	None
		6	NTU203	Arabic Language	Arabic	2					4	3	33	17	50	2	S	LRM
					Total	16	0	8	0	0	16	18	378	372	750	30		
Level	Semester																	

		No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam	SSWL	USSWL	SWL	ECTS	Module	Prerequi
UGIII	Five					CL (hr/w)	Lect	Lab	Pr	Tut	Semn	hr/sem	hr/sem	hr/sem	hr/sem		Type	site
		1	EET300	Principles of Power Engineering	English	3		2			3	3	78	47	125	5	C	LRM
		2	EET301	DC Power Conversions	English	3		2			3	3	78	47	125	5	C	LRM
		3	EET302	Induction Machines	English	3		2			2	3	78	47	125	5	C	LRM
		4	EET303	Electromagnetic Fields	English	3		2			2	3	78	47	125	5	C	LRM
		5	EET304	Digital comunication and IOT	English	2		2			2	3	63	62	125	5	C	LRM
		6	EET305	Engineering Analysis	English	4				2	2	3	93	32	125	5	B	LRM
					Total	18	0	10	0	2	14	18	468	282	750	30		
	Semester																	
		No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam	SSWL	USSWL	SWL	ECTS	Module	Prerequi
	Six					CL (hr/w)	Lect	Lab	Pr	Tut	Semn	hr/sem	hr/sem	hr/sem	hr/sem		Type	site
		1	EET306	control systems	English	3		2			3	3	78	47	125	5	C	LRM
		2	EET307	AC Power Conversions	English	3		2			3	3	78	47	125	5	C	LRM
		3	EET308	Synchronous and Special Machines	English	3		2			3	3	78	47	125	5	C	LRM
		4	EET309	Numerical analysis	English	3					3	3	48	77	125	5	C	LRM
		5	EET310	Digital signal processing	English	3						3	48	77	125	5	S	LRM
		6	EET311	reneable Energy	English	2		2			3	3	63	62	125	5	E	LRM
					Total	17	0	8	0	0	15	18	393	357	750	30		
Level	Semester	No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam	SSWL	USSWL	SWL	ECTS	Module	Prerequi
						CL (hr/w)	Lect	Lab	Pr	Tut	Semn	hr/sem	hr/sem	hr/sem	hr/sem		Type	site
		No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam	SSWL	USSWL	SWL	ECTS	Module	Prerequi
UGIV	Seven					CL (hr/w)	Lect	Lab	Pr	Tut	Semn	hr/sem	hr/sem	hr/sem	hr/sem		Type	site
		1	EET400	Transmission and Distribution Systems	English	3		2			3	3	78	72	150	6	C	LRM
		2	EET401	Electric Machine Drives	English	3		2			3	3	78	72	150	6	C	LRM
		3	EET402	Power Systems Analysis	English	3		2			3	3	78	72	150	6	C	LRM
		4	EET403	Electric Power Generation Stations	English	3					3	3	48	102	150	6	C	LRM
		5	EET404	Engineering mangement	English	2					3	3	33	17	50	2	C	LRM
		6	EET405	Project 1	English			4				3	63	37	100	4	C	LRM
					Total	14	0	10	0	0	15	18	378	372	750	30		
	Semester																	
		No.	Module Code	Module Name in English	Language	SSWL (hr/w)						Exam	SSWL	USSWL	SWL	ECTS	Module	Prerequi
	Eight					CL (hr/w)	Lect	Lab	Pr	Tut	Semn	hr/sem	hr/sem	hr/sem	hr/sem		Type	site
		1	EET406	Smart grid	Arabic	3		2			3	3	78	72	150	6	S	None
		2	EET407	Power System Protection	English	3		2			3	3	78	72	150	6	C	LRM
		3	EET408	AI application in power system	English	2		2			3	3	63	87	150	6	C	LRM
		4	EET409	High Voltage Techniques	English	3		2			1	3	78	72	150	6	C	LRM
		5	EET410	Project 2	English			4			1	3	63	37	100	4	C	LRM
		6	EET411	**profesional safty**	English	2					3	3	33	17	50	2	E	LRM
					Total	13	0	12	0	0	14	18	393	357	750	30		

Note:																			
Structured SWL (hr/w) type																			
		CL	Class Lecture			**B**	Basic learning activities			**SWL:**	Student Workload								
		Lab	Laboratory			**C**	Core learning activity			**SSWL:**	Structured SWL								
		Pr	Practical Training			**S**	Support or related			**USSWL:**	Unstructured SWL								
		Tut	Tutorial			**E**	Elective learning activity			**LRM:**	Level Restricted Module								
		Lect	Online lecture			Note: Columns O, Q and R are progrmaed, protected and should not be edited. PASSWORD= 123456													
		Semn	Seminar			Note: The summer training course has 8 training weeks (320 hours) [4 weeks x 5 days/week x 8 hours/day]													