## **GRADUATION CHECKLIST**

To graduate, students must pass all the stated courses in this checklist. It is the responsibility of the students to ensure that all courses are taken and passed. Students who do not complete any of the courses are not allowed to graduate.

NO.	CODE	COURSE	CREDIT EARNED (JKD)	CREDIT COUNTED (JKK)	TICK (√) IF PASSED	
CHE	CHEMICAL ENGINEERING COURSES					
1	SETK 1111	Engineering Drawing	1	1		
2	SETK 1213	Statics	3	3		
3	SETK 1511	Industrial Seminar & Profession	1	1		
4	SETK 1523	Introduction to Engineering	3	3		
5	SETK 1533	Introduction to Computer Programming	3	3		
6	SETK 1123	Mass Balance	3	3		
7	SETK 1223	Thermodynamics	3	3		
8	SETK 2133	Energy Balance	3	3		
9	SETK 2233	Fluid Mechanics	3	3		
10	SETK 2243	Material Engineering	3	3		
11	SETK 2711	Thermodynamics and Material Eng. Laboratory	1	1		
12	SETK 2253	Chemical Engineering Thermodynamics	3	3		
13	SETK 2313	Transport Processes	3	3		
14	SETK 2721	Fluid Mechanics Laboratory	1	1		
15	SETK 2543	Numerical Method & Optimization	3	3		
16	SEEU 2003	Electrical Technology	3	3		
17	SETK 3263	Chemical Reaction Engineering	3	3		
18	SETK 3323	Separation Processes	3	3		
19	SETK 3413	Pollution Control Engineering	3	3		
20	SETK 3731	Pollution Control and Reaction Laboratory	1	1		
21	SETK 3552	Occupational Safety and Health in Industry	2	2		
22	SETK 3334	Unit Operation & Industrial Processes	4	4		
23	SETK 3343	Engineering Economics and Project Management	3	3		
24	SETK 3564	Process Control & Instrumentation	4	4		

25	SETK 3741	Separation Process Laboratory I	1	1		
26	SETK 3812	Undergraduate Project I	2	2		
27	SETK 3915	Industrial Training	5	HL		
28	SETK 4143	Chemical Product Design	3	3		
29	SETK 4153	Plant Design	3	3		
30	SETK 4751	Process Control Laboratory	1	1		
- 50	3L1K4731	Separation Processes	1	-		
31	SETK 4761	Laboratory II		1		
32	SETK 4824	Undergraduate Project II	4	4		
33	SETK 4573	Process Safety & Operability	3	3		
34	SETK 4834	Plant Design Project	4	4		
35	SETK 4**3	Elective 1	3	3		
	SET* 5**3	PRISMS Elective 1		3		
36	SETK 4**3	Elective 2	3	3		
	SET* 5**3	PRISMS Elective 2				
37	SETK 4**3	Elective 3	3	3		
	SET* 5**3	PRISMS Elective 3	3	<u> </u>		
		TOTAL CREDIT OF CHEMICAL	99	94		
		ENGINEERING COURSES (a)	33	3 <del>4</del>		
MATI	HEMATICS AND	SCIENCE COURSES (Faculty of	Science)			
1	SSCE 1693	Engineering Mathematics I	3	3		
2	SSCE 1793	Differential Equations	3	3		
3	SSCE 1993	Engineering Mathematics II	3	3		
4	SSCK 1623	Organic Chemistry for	3	3		
		Engineering	J			
5	SSCK 1831	Organic Chemistry Practical	1	1		
6	SSCK 1203	Analytical Chemistry for Engineering	3	3		
7	SSCK 1891	Analytical Chemistry Practical	1	1		
	2001(1001	TOTAL CREDIT OF	'			
		MATHEMATICS & SCIENCE	17	17		
		COURSES (b)				
UNIV	UNIVERSITY GENERAL COURSES					
Clust	er 1: Appreciation	on of Philosophy, Value and Histo	ory			
(Facu	Ity of Social Sci	ences and Humanities)				
	UHMS 1182	Appreciation of Ethics and				
	21	Civilizations (for Local Students)				
	UHMS 1022	Philosophy and Current Issues				
1		(for International Students)	2	2		
	OR	OR	_	_		
		Appreciation of Ethics and				
	UHMS 1182	Civilizations (for International				
		Students				

2 Clust	UHIS 1022 UHLM 1012 er 2: Generic Sk	Philosophy and Current Issues (for Local Students)  Malay Language 2 (for International Students)	2	2	
1	UHMT 1012	Graduate Success Attributes	2	2	
2	UBSS 1032	Introduction to Entrepreneurship	2	2	
3	U**2**2	Soft Skills Elective	2	2	
Clust	er 3: Knowledge	Enhancement			
1	UHIT 2302	The Thought of Science and Technology	2	2	
Clust	er 4: Co-Curricu	lum and Service Learning			
1	UKQ* 2**2	Co-Curriculum & Service Learning	2	2	
2	UKQT 3001	Extracurricular Experiential Learning (ExCEL)	1	1	
Clust	er 5: Language	Skills			
		Faculty of Social Sciences and F			
1	UHLB 1112	English Communication Skills	2	2	
2	UHLB 2122	Academic Communication Skills	2	2	
3	UHLB 3132	Professional Communication Skills	2	2	
4	UHL* 1112	Elective of Foreign Language	2	2	
Cluster 6 : Entrepreneurial Skills					
1	UBSS 1032	Introduction to Entrepreneurship	2	2	
		TOTAL CREDIT of	23	23	
		UNIVERSITY GENERAL			
		COURSES (c)			
		TOTAL CREDIT TO	139	134	
		GRADUATE (a + b + c)			

OTHER COMPULSORY COURSES – PROFESSIONAL SKILLS CERTIFICATE (PSC)					
Students are required to enrol and pass FIVE (5) PSC courses, to be eligible to graduate.  Enrol the PSC courses as follows:					
COMPULSORY PSC COURSES (Enrol All 3 Courses)					
1	GLRB0010	Design Thinking for Entrepreneur			
2	GLRM0010	Talent and Competency Management			
3	GLRL0010	English Communication Skills for Graduating Students (ECS)			

ELECTIVE PSC COURSES (Choose Any 2 Courses only)					
1	GLRT0010	Data Analytics for Organization			
2	GLRM0020	Professional Ethics and Integrity			
3	GLRT0020	Construction Measurement (Mechanical & Electrical)			
4	GLRT0030	OSHE for Engineering Industry and Laboratory			
5	GLRT0040	OSHE for Construction Industry and Laboratory Works			
6	GLRT0050	Quality Management for Build Environment and Engineering Professionals			
7	GLRT0060	Safety and Health Officer Introductory Course			
8	GLRT0070	Industrial Machinery and Lubrication			

Or any other elective PSC courses offered by UTM iLeague.

Information on PSC Courses: <a href="https://ileague.utm.my/utm-professional-skills-certificate-utm-psc/">https://ileague.utm.my/utm-professional-skills-certificate-utm-psc/</a> Online PSC Registration: <a href="https://elearnpsc.utmspace.edu.my/">https://elearnpsc.utmspace.edu.my/</a>