

CURRICULUM STRUCTURE – BEKM KOHORT 2021/2022

TYPE COURSE	YEAR 1				YEAR 2			
	SEMESTER 1		SEMESTER 2		SEMESTER 3		SEMESTER 4	
COMMON CORE & PROGRAM CORE (P)	BMFG 1313 ENGINEERING MATHEMATICS I	S E M E S T E R B R E A K	BMCG 1013 DIFFERENTIAL EQUATIONS	L O N G S E M E S T E R B R E A K	BEKG 2443 ENGINEERING MATHEMATICS 2	S E M E S T E R B R E A K	BENG 2143 ENGINEERING STATISTICS	L O N G S E M E S T E R B R E A K
	BEKG 1123 PRINCIPLES OF ELECTRIC AND ELECTRONICS		BENG 1413 DIGITAL ELECTRONICS		BITG 1233 COMPUTER PROGRAMMING		BEKE 2422 ANALOGUE ELECTRONICS APPLICATIONS	
	BMFG 1213 ENGINEERING MATERIALS		BMCG 1523 ENGINEERING GRAPHICS AND CAD		BEKU 2333 ELECTRICAL CIRCUIT II		BEKC 3533 INTRODUCTION TO CONTROL SYSTEM	
	BMCG 1123 STATICS & MECHANICS OF MATERIAL		BEKU 1123 ELECTRICAL CIRCUIT I		BEKG 1233 PRINCIPLES OF INSTRUMENTATION AND MEASUREMENT		BEKC 3543 MICROPROCESSOR	
	BEKB 1131 ENGINEERING PRACTICE I		BMCG 1253 DYNAMICS & MECHANISM		BEKM 2342 INTRODUCTION TO MECHATRONICS SYSTEM		BEKC 2433 SIGNAL & SYSTEMS	
			BEKB 1231 ENGINEERING PRACTICE II		BMCG 2372 FLUID MECHANICS		BEKM 2321 MECHANICAL ENGINEERING LABORATORY	
CREDIT HOUR SEMESTER	13		16		17		15	
ELECTIVE (E)								
CREDIT HOUR SEMESTER								
UNIVERSITY REQUIREMENTS (W)	BLW 1142 ENGLISH FOR ACADEMIC PURPOSES		BKXX XXX1 CO-CURRICULUM II				BLW 2152 ACADEMIC WRITING	
	BKXX XXX1 CO-CURRICULUM I						** BKXX XXX1 CO-CURRICULUM (SUKSIS)	
CREDIT HOUR SEMESTER	3		1				2	
TOTAL CREDIT HOUR SEMESTER	16		17		17		17	

TYPE COURSE	YEAR 3			YEAR 4			
	SEMESTER 5		SEMESTER 6	SPECIAL SEMESTER	SEMESTER 7	SEMESTER 8	
COMMON CORE & PROGRAM CORE (P)	BEKM 3453 MICROCONTROLLER TECHNOLOGY	S E M E S T E R B R E A K	BEKM 3653 INTEGRATED DESIGN PROJECT	BEKU 3695 INDUSTRIAL TRAINING	BEKU 4861 ENGINEERING SEMINAR	BENG 4322 ENGINEER AND SOCIETY	
	BEKM 3543 ELECTROMECHANICAL SYSTEMS		BEKC 4753 PLC & AUTOMATION		BEKU 4792 FINAL YEAR PROJECT I	BEKU 4894 FINAL YEAR PROJECT II	
	BEKC 3643 CONTROL SYSTEM ENGINEERING		BMCG 3643 HYDRAULIC & PNEUMATIC SYSTEMS		BEKM 4763 ROBOTICS		
	BEKG 2433 ELECTRICAL SYSTEMS		BMCG 3653 THERMODYNAMICS & HEAT TRANSFER		BEKC 2453 COMMUNICATION SYSTEMS		
	BMFG 4623 ENGINEERING ECONOMY AND MANAGEMENT						
	BEKC 2421 CONTROL SYSTEMS LABORATORY		BEKM 3641 MECHATRONICS ENGINEERING LABORATORY I		BEKM 4751 MECHATRONICS ENGINEERING LABORATORY II		
CREDIT HOUR SEMESTER	16		13	5	10	6	111
ELECTIVE (E)					BEKX XXX3 ELECTIVE I (PROGRAM)	BEKX XXX3 ELECTIVE II (PROGRAM)	
					BLHL 1XX2 ELECTIVE I (UNIVERSITY)	BXXX XXX2 ELECTIVE II (UNIVERSITY)	
CREDIT HOUR SEMESTER					5	5	10
UNIVERSITY REQUIREMENTS (W)	BLW 3162 ENGLISH FOR PROFESSIONAL INTERACTION		BLW 3162 PHILOSOPHY AND CURRENT ISSUES			BTMW 4012 TECHNOLOGY ENTREPRENEURSHIP	
						# BIPW 2132 APPRECIATION OF ETHICS AND CIVILISATIONS * BIPW 2122 MALAYSIAN CULTURE	
CREDIT HOUR SEMESTER	2		2		0	4	14
TOTAL CREDIT HOUR	18		15	5	15	15	135

CHOOSE ONE (1) COURSE FROM ANY OF ELECTIVE PROGRAM I; AND CHOOSE ONE (1) COURSE FROM ANY OF ELECTIVE PROGRAM II; AND CHOOSE ONE (1) COURSE FROM ANY OF ELECTIVE UNIVERSITY I (THIRD LANGUAGE); AND CHOOSE ONE (1) COURSE FROM ANY OF ELECTIVE UNIVERSITY II (GENERAL)					
ELECTIVE PROGRAM	I	BEKM 4783 MACHINE VISION	BEKC 4773 INTELLIGENT CONTROL SYSTEMS		
	II	BEKC 4683 DIGITAL CONTROL SYSTEMS	BEKC 4883 ADVANCED MANUFACTURING SYSTEMS	BEKM 4823 DATA COMMUNICATIONS & COMPUTER NETWORKING	
ELECTIVE UNIVERSITY	I THIRD LANGUAGE	BLLW 1222 BAHASA MANDARIN 1	BLLW 1242 BAHASA KOREA 1	BLLW 1212 BAHASA ARAB 1	BLLW 1252 BAHASA JERMAN 1
		BLLW 1232 BAHASA JEPUN 1	* BLLW 1232 BAHASA MELAYU KOMUNIKASI 1		
	II GENERAL	BXXX XXX2 PEMIKIRAN KRITIS DAN KREATIF	BXXX XXX2 KOMUNIKASI ORGANISASI	BXXX XXX2 PSIKOLOGI INDUSTRI DAN ORGANISASI	BXXX XXX2 KEMAHIRAN PERUNDINGAN
		BXXX XXX2 FALSAFAH SAINS DAN TEKNOLOGI	BXXX XXX2 SOSIOLOGI INDUSTRI		

CREDIT HOUR AND PRE-REQUISITE – BEKM

SEMESTER	CODE	COURSE	CATEGOR Y	CREDIT	EQUIVALENT CODE	PRE- REQUISITE
SEMESTER 1	BLLW 2262	ENGLISH FOR ACADEMIC PURPOSE	W	2		
	BKKX XXX1	CO-CURRICULUM I	W	1		
	BMFG 1313	ENGINEERING MATHEMATICS 1	P	3		
	BEKG 1123	PRINCIPLES OF ELECTRIC AND ELECTRONICS	P	3	BEKE 1133	
	BMFG 1213	ENGINEERING MATERIALS	P	3		
	BMCG 1123	STATICS & MECHANICS OF MATERIAL	P	3		
	BEKB 1131	ENGINEERING PRACTICE I	P	1		
TOTAL				16		
SEMESTER 2	BKKX XXX1	CO-CURRICULUM II	W	1		
	BMCG 1013	DIFFERENTIAL EQUATIONS	P	3	BEKA 2333	
	BENG 1413	DIGITAL ELECTRONICS	P	3	BEKU 1243	
	BMCG 1523	ENGINEERING GRAPHICS AND CAD	P	3		
	BEKU 1123	ELECTRICAL CIRCUIT I	P	3		
	BMCG 1253	DYNAMICS & MECHANISM	P	3		
	BEKB 1231	ENGINEERING PRACTICE II	P	1		
TOTAL				17		
SEMESTER 3	BEKG 2443	ENGINEERING MATHEMATICS 2	P	3	BEKA 1233	
	BITG 1233	COMPUTER PROGRAMMING	P	3		
	BEKU 2333	ELECTRICAL CIRCUIT II	P	3		
	BEKG 1233	PRINCIPLES OF INSTRUMENTATION AND MEASUREMENT	P	3	BEKC 1123	
	BEKM 2342	INTRODUCTION TO MECHATRONICS SYSTEM	P	2		
	BMCG 2372	FLUID MECHANICS	P	2		
	BEKU 1231	ELECTRICAL & ELECTRONICS ENGINEERING LABORATORY	P	1		
	**BKKX XXX1	CO-CURRICULUM (SUKSIS)	W			
TOTAL				17		

SEMESTER	CODE	COURSE	CATEGORY	CREDIT	EQUIVALENT CODE	PRE-REQUISITE
SEMESTER 4	BLW 2152	ACADEMIC WRITING	W	2		BLW 1442
	BENG 2143	ENGINEERING STATISTICS	P	3		
	BEKC 2433	SIGNAL & SYSTEMS	P	3		
	BEKE 2422	ANALOGUE ELECTRONICS APPLICATIONS	P	2		
	BEKC 3533	INTRODUCTION TO CONTROL SYSTEM	P	3		
	BEKC 3543	MICROPROCESSOR	P	3		
	BEKM 2321	MECHANICAL ENGINEERING LABORATORY	P	1		
	**BXXX XXX1	CO-CURRICULUM (SUKSIS)	W			
TOTAL				17		
SEMESTER 5	BLW 3162	ENGLISH FOR PROFESSIONAL INTERACTION	W	2		BLW 2152
	BMFG 4623	ENGINEERING ECONOMY AND MANAGEMENT	P	3		
	BEKG 2433	ELECTRICAL SYSTEMS	P	3	BEKP 2443	
	BEKM 3453	MICROCONTROLLER TECHNOLOGY	P	3		
	BEKM 3543	ELECTROMECHANICAL SYSTEMS	P	3		
	BEKC 3643	CONTROL SYSTEM ENGINEERING	P	3		
	BEKC 2421	CONTROL SYSTEMS LABORATORY	P	1		
	**BXXX XXX1	CO-CURRICULUM (SUKSIS)	W			
TOTAL				18		
SEMESTER 6	BIPW 1132	PHILOSOPHY AND CURRENT ISSUES	W	2		
	BEKM 3653	INTEGRATED DESIGN PROJECT	P	3		
	BEKC 4753	PLC & AUTOMATION	P	3		
	BMSG 3643	HYDRAULIC & PNEUMATIC SYSTEMS	P	3		
	BMSG 3653	THERMODYNAMICS & HEAT TRANSFER	P	3		
	BEKM 3641	MECHATRONICS ENGINEERING LABORATORY I	P	1		
TOTAL				15		
SPECIAL SEMESTER	BEKU 3695	INDUSTRIAL TRAINING	P	5		
TOTAL				5		
SEMESTER 7	BEKU 4861	ENGINEERING SEMINAR	P	1		
	BEKU 4792	FINAL YEAR PROJECT I	P	2		
	BEKM 4763	ROBOTICS	P	3		
	BEKC 2453	COMMUNICATION SYSTEMS	P	3	BEKC 3633	
	BEKM 4751	MECHATRONICS ENGINEERING LABORATORY II	P	1		
	BXXX XXX2	ELECTIVE I (UNIVERSITY)	E	2		
	BEKM 4783	<u>ELECTIVE PROGRAM I</u> MACHINE VISION	E	3	BEKC 4873 / BEKC 4783	
	BEKC 4773	INTELLIGENT CONTROL SYSTEMS				
TOTAL				15		

SEMESTER 8	BTMW 4012	TECHNOLOGY ENTREPRENEURSHIP	W	2		
	#BIPW 2132	APPRECIATION OF ETHICS AND CIVILISATIONS	W	2		
	*BIPW 2122	MALAYSIAN CULTURE				
	BENG 4322	ENGINEER AND SOCIETY	P	2		
	BEKU 4894	FINAL YEAR PROJECT II	P	4		BEKU 4792
	BXXX XXX2	ELECTIVE II (UNIVERSITY)	E	2		
	BEKC 4683	ELECTIVE PROGRAM II DIGITAL CONTROL SYSTEMS				
	BEKC 4883	ADVANCED MANUFACTURING SYSTEMS	E	3		
	BEKM 4823	DATA COMMUNICATIONS & COMPUTER NETWORKING				
TOTAL				15		
MINIMUM TOTAL CREDIT				135		

P = Core, E = Elective, W = University Requirements