BACHELOR OF SCIENCE IN AGRICULTURAL AND BIOSYSTEMS ENGINEERING Special UPLB UC Meeting 05 / 21-22 / 18; President's Approval 08/28/19

First Semester	Units	Second Semester	Units
	FIRST	YEAR	
ABE 30 (Introduction to ABE)	1	AGRI 21 (Introduction to Animal Science)	3
AGRI 31 (Fundamentals of Crop Science I)	3	CHEM 18 (University Chemistry)	3
ENSC 10.1 (Engineering Graphics Laboratory)	2	CHEM 18.1 (University Chemistry Laboratory)	2
MATH 27 (Analytical Geometry and Calculus II)	3	AGRI 32 (Fundamentals of Crop Science II)	3
PHYS 51 (Elements of Physics)	4	ENSC 11 (Statics of Rigid Bodies)	3
PHYS 51.1 (Elements of Physics Laboratory)	1	MATH 28 (Analytical Geometry and Calculus III)	3
KAS1/HIST1 (Kasaysayan ng Pilipinas/Philippine History)	3	NSTP 2 (National Service Training Program II)	(3)
PI 10 (The Life and Works of Rizal)	3	HK 12 or 13 (Human Kinetics Activities/ Advanced Human	(2)
NSTP 1 (National Service Training Program I)	(3)	Kinetics Activities)	(2)
HK 11 (Wellness and Basic Injury Management)	(2)	GE Elective	3
	20		20

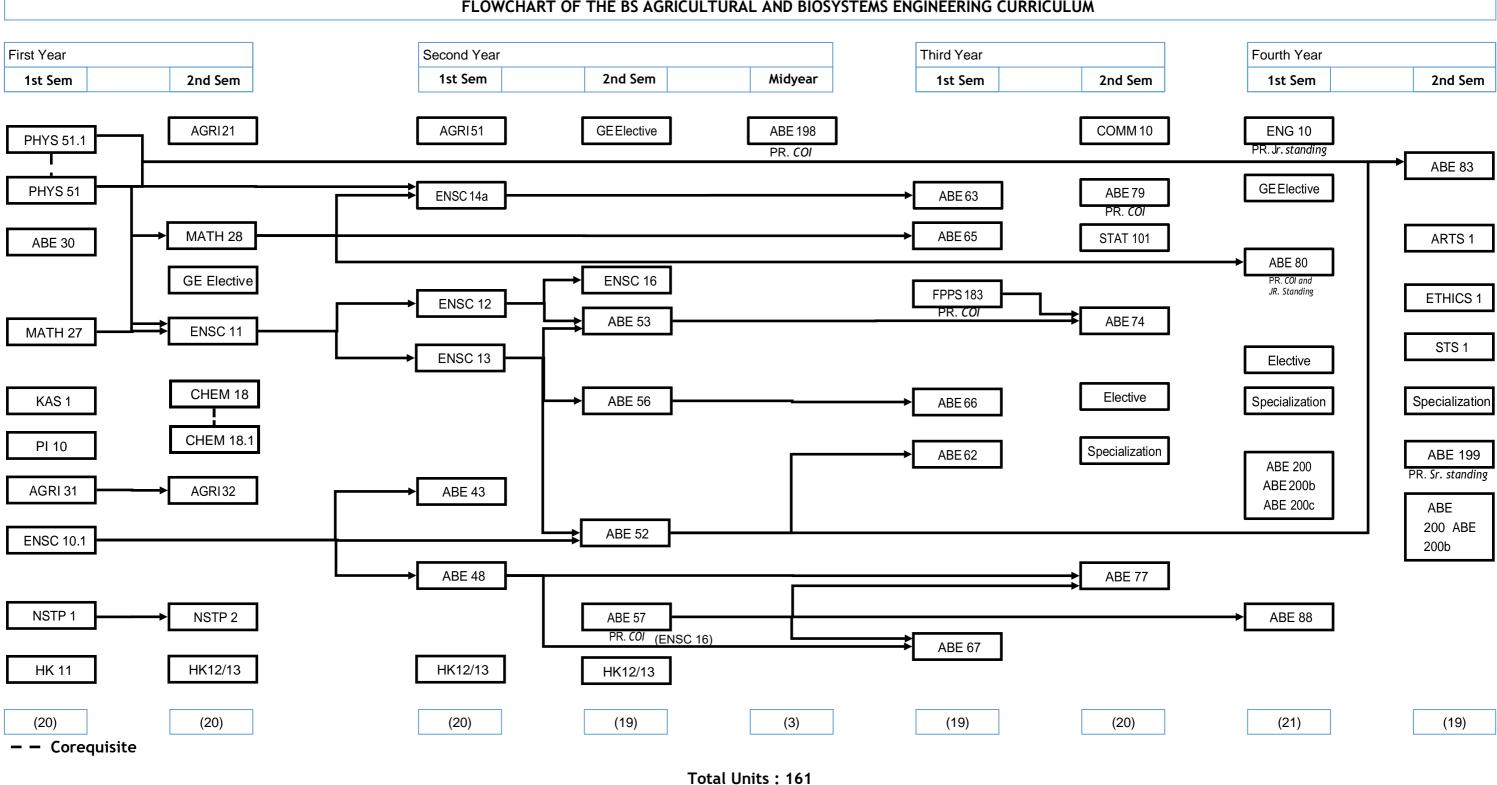
	SECOND) YEAR	
ABE 43 (Engineering Shop)	3	ABE 52 (Agricultural Structures I)	3
ABE 48 (Fundamentals of Surveying)	3	ABE 53 (Machine Design for Bio-production Systems I)	4
ENSC 12 (Dynamics of Rigid Bodies)	3	ABE 56 (Engineering Properties of AB Materials)	3
ENSC 13 (Strength of Materials)	3	ABE 57 (Field Hydrology)	3
ENSC 14a (Engineering Thermodynamics and Heat Transfer)	5	ENSC 16 (Fluid Mechanics)	3
AGRI 51 (Principles of Soil Science)	3	GE Elective	3
HK 12 or 13 (Human Kinetics Activities/ Advanced Human Kinetics Activities)	(2)	HK 12 or 13 (Human Kinetics Activities/ Advanced Human Kinetics Activities)	(2)
	20		19

MIDYEAR

	ABE 198 Internship	<u>3</u> 3	
	THIRD YE	AR	
ABE 62 (Environmental Control Engineering)	3	ABE 74 (Machinery for Bioproduction Systems, Management and Technopreneurship)	4
ABE 63 (Agricultural and Biosystems Power Engineering)	4	ABE 79 (ABE Laws, Specifications, Contracts and Ethics)	1
ABE 65 (Quantitative Approaches in ABE)	3	ABE 77 (Soil and Water Conservation Engineering)	3
ABE 66 (Agricultural Processing I)	3	COMM 10 (Critical Perspective in Communications)	3
ABE 67 (Irrigation and Drainage Engineering)	3	STAT 101 (Statistical Methods)	3
FPPS 183 (Engineering Economic Analysis)	3	Elective	3
	19	Specialization Course	3
			20

	FOUR	TH YEAR				
ABE 80 (Computer-Aided Solutions in ABE)	3	ABE 83 (Electrical System Design for Agricultural and Biosystems Structures)	3			
ABE 88 (Aquaculture Engineering I)	3	ETHICS 1 (Ethics and Moral Reasoning in Everyday Life)	3			
GE Elective	3	ARTS 1 (Critical Perspectives in the Arts)	3			
ENG 10 (Writing of Scientific Papers)	3	STS 1 (Science, Technology and Society)	3			
Elective	3	Specialization Course	3			
Specialization Course	3	ABE 199 (Undergraduate Seminar)	1			
ABE 200/b/c (Undergraduate Thesis/ Innovationeering/ Engineering Industry Research)	3	ABE 200/b/c (Undergraduate Thesis/ Innovationeering/ Engineering Industry Research)	3			
	21		19			

TOTAL NUMBER OF UNITS.....161



FLOWCHART OF THE BS AGRICULTURAL AND BIOSYSTEMS ENGINEERING CURRICULUM

All students are required to undergo NSTP (6 units) for one year with an option of ROTC, CWTS, or LTS as a requirement for graduation.

All students are required to take HK (2 units) and HK 12/13 (6 units).

Elective courses may be taken from other unit of the university.

Students have an option to take 6 units (3-3) of ABE 200 (Undergraduate Thesis), ABE 200b (Innovationeering) or ABE 200c (Engineering Industry Research). These can be taken during midyear before 4th year. For ABE 200b, this should be taken by group consisting of 3 students coming from at least 2 different engineering degree.