KEAN UNIVERSITY – COLLEGE OF NATURAL, APPLIED & HEALTH SCIENCES
(77100) B.S. IN SUSTAINABILITY SCIENCE
120 S.H.
2.50 G.P.A. Graduation Requirement

EFFECTIVE DATE:		**START TERM: Fall 2018**	
NAME:		TRANSFER INSTITUTIONS (X) Credits:	
STUDENT ID#:		In Progress	
GENERAL EDUCATION: 35 Semester Hours (S.H.)		**ACADEMIC MAJOR REQUIREMENTS: 38 S.H.*** **	
Foundation Requirements[1] 13 S.H.		ENV 1000 Introduction to Environmental Science	3
GE 1000 Transition to Kean or GE 3000 Transfer Transitions[2]	1	ENV 2100 Ecosystem Science	4
ENG 1030 College Composition***‡	3	ES 1101 Introduction to Earth and Geog Systems	4
MATH 1054 Precalculus** [3]	3	ES 2101 Geo-hydro Systems	4
COMM 1402 Speech Communication*	3	ES 3010 Data Analysis and Modeling or ES 3200 GIS in Geoscience	4
GE 2024 Research & Technology*	3	SUST 1000 Introduction to Sustainability	3
		SUST 2200 Laws for Environ. Sustainability	3
Disciplinary & Interdisciplinary Distribution Requirements		SUST 3110 Renewable Energy	3
Humanities: 6 S.H. (from different areas)		SUST 3200 Environmental Health and Safety	3
ENG 2403 World Literature*	3	SUST 3300 LEED Lab and AP Credential Preparation	4
Select one course with advisement from areas below:		SUST 4110 Life Cycle Assessment	3
Fine Arts/Art History	3		
Foreign Languages (Must take I and II for credit)	3		
Interdisciplinary	3	**PROGRAM FOCUS-RELATED ELECTIVES 12-15 S.H.**	
Music or Theatre	3	**To be selected with advisement from approved program list maintained in the School of Environmental and Sustainability Sciences and in consultation with the Program Coordinator with at least half of the credits at the 3000-4000 level**	
Philosophy or Religion	3	**Maximum of 8 S.H. of SUST courses count toward degree.**	
		If the course is taken as a Major Elective, it cannot be counted as a General Education course.	
Social Sciences: 6 S.H. (from different areas)			
HIST 1062 Worlds of History *	3		
Select one course with advisement from areas below:			
Economics or Geography	3	Recommended: ES 4980 Environmental Internship	3
Political Science	3		
Interdisciplinary	3		
Sociology or Anthropology	3		
Psychology	3		
Science and Mathematics: 7 S.H.			
MATH 1016 Statistics**	3		
CHEM 1083 Chemistry I ***	4		
G.E. and Major Capstone: 3 S.H., *****			
SUST 4300 Independent Practicum in Sustainability Science	3		
ADDITIONAL REQUIREMENTS: 26 S.H.		**FREE ELECTIVES: 6-9 S.H.**	
BIO 1300 Introduction to Biology I	4		
BIO 1400 Introduction to Biology II	4		
CHEM 1084 Chemistry II	4		
MATH 2415 Calculus I	4		
PHYS 2091 General Physics I	4		
ECO 1020 or ECO 1021 Principles of Economics I or II	3		
MGS 2030 Principles of Management	3		
*G.E. required course			
**Course required by SESS			
***Must earn a grade of C or better			
[1] See prerequisites and equivalencies.			
[2] University Requirement for Graduation for all undergraduate students that must be satisfied in one of two ways: Complete GE 1000 (all freshmen and transfers entering with 1-29 credits) OR complete GE 3000 (transfer entering with 30 credits or more)		**Other Transfer:**	
		TOTAL CREDITS:	
		Advisor:	
[3] A student whose qualifying score on the placement test makes them eligible to take MATH 2415 may start with that course instead. In that case, the student may take 3 additional credits of free electives instead of MATH 1054 to total 120 credits		**Advisor Signature:**	
‡Students may be required to take ENG 1025 Introduction to Composition as a prerequisite			

B.S. IN SUSTAINBILITY SCIENCE APPROVED FOCUS-RELATED ELECTIVES*

***Subject to change as new courses are approved and old courses are eliminated. Independent Research, Independent Study, and/or Special Topics courses not listed, but will be approved on an individual basis if appropriate. Any combination of 12-15 semester hours may be selected to fulfill graduation requirements; however, students are strongly encouraged to select courses only after consultation with and approval of their advisor. Failure to do so may result in result in a less than optimal program experience.**

1000 level courses	S.H.		S.H.
ANTH 1800: Cultural Anthropology	3	PHYS 1050: Energy, Physics & the Environment [2]	3
ECO 1020: Principles of Economics I	3	PS 1010: Introduction to Politics: Elements of Politics	3
ES 1200: Introduction to Geology	4	PSY 1000: General Psychology	3
ES 1300: Introduction to Meteorology	4	SOC 1000: Introduction to Sociology	3
2000 level courses			
ACCT 2200: Principles of Accounting I	3	ENG 2005: Advanced Composition	3
BIO 2400: Genes, Organisms, Populations	4	ENG 2010: Creative Writing	3
BIO 2500: Principles of Botany	4	ENG 2020: Writing	3
BIO 2601 Environment, Ecology and Humanity	4	ENG 2101: Structure and Origins of the English Language	3
BIO 2650: Introduction to Marine Biology	4	GEOG 2020: Conservation of Natural Resources	3
CHEM 2180: Principles of Organic Chemistry [1]	4	MKT 2500 Principles of Marketing	3
CHEM 2581: Organic Chemistry I [2,4]	3	PA 2000: Introduction to Public Administration	3
CHEM 2582: Organic Chemistry II [2]	3	SUST 2008: Introduction to Composting [2]	4
CHEM 2583: Organic Chemistry Laboratory and Recitation I [2]	2	SUST 2101: Applied Organic Chemical Systems for Sustainability[2]	4
CHEM 2584: Organic Chemistry Laboratory and Recitation II [2]	2	SUST 2201: Economics for Sustainability[2]	3
DSN 2200 Sustainable Design II	3	SUST 2202: Religion and Sustainability[2]	3
ENV 2400: Introduction to Oceanography	4	SUST 2203: Intercultural Communication for sustainability[2]	3
ENV 2000: Evolution and Diversity	4		
3000 level courses			
ANTH 3830: Anthropology of North American Indian Cultures	3	ENV 3201: Biodiversity [3]	3
BIO 3000: Marine Biology	4	ENV 3230: Urban Ecology [3]	4
BIO 3305: Principles of Microbiology [2]	4	ENV 3250: Medicinal Botany	3
BIO 3400: Zoology: Form and Function	4	ENV 3400: Global Change and the Ocean	3
BIO 3435: Animal Behavior	4	ENV 3600: Coral Reefs and Coastal Systems	4
BIO 3513: Morphology and Evolution of the Plant Kingdom	4	ENV 3720: Entomology	4
BIO 3535: Field Botany	3	ES 3000: Global Climate Change and Society [2]	4
BIO 3614: Principles of Ecology	4	ES 3010 Data Analysis and Modeling in Geoscience	4
CHEM 3581: Biochemistry	3	ES 3200 GIS in Geoscience	4
COMM 3216: International Business Communication	3	ES 3261: Mineralogy	4
COMM 3590: Business and Professional Communication	3	ES 3265: Geomorphology	4
COMM 3660: Public Relations	3	ES 3360: Air Pollution	3
COMM 3675: Media Advertising	3	HIST 3852: History of Science	3
COMM 3910: Advanced Journalism	3	MKT 3510: Consumer Behavior	3
COMM 3915: Feature Writing	3	PHIL 3800: Environmental Philosophy	3
ECO 3730: Economic Geography	3	PSY 3420: Environmental Psychology	3
ECO 3840: Population Economics	3	REC 3500: Commercial Recreation and Tourism	3
ENG 3030: Writing Arguments	3	REC 3810: Recreation and the Environment	3
ENG 3041: Writing in the Social Sciences	3	SOC 3410: Social Movements	3
ENG 3915: Feature Writing	3	SOC 3420: Environment and society	3
ENV 3051: Field biology Terrestrial system explain	4	SUST 3600 Global Sustainability Development	3
4000 level courses			
BIO 4415: Ichthyology	4	ES 4200: Remote Sensing	4
BIO 4575: Plant Physiology	4	GBUS 4320: Global Business and Technology	3
BIO 4615: Applied Ecology [2]	4	GEOS 4201: Urban Geographic Systems	4
ENV 4210: Conservation Biology [3]	4	HIST 4361: The American City	3
ENV 4435: Behavioral Ecology	3	MKT 4240: Contemporary Issues in Marketing	3
ENV 4600: Plant-Animal Interactions	4	SOC 4401: Social Change	3
ENV 4601: Marine Conservation	4	SUST 4001: Essential Readings in Sustainability[4]	3
ENV 4602: Marine Resource Management	3	SUST 4000: Technology for Sustainability[4]	3
ENV 4605: Field Methods in Marine Research	4	SUST 4400: Renewable Energy Lab	3
		[1] Students may not receive credit for CHEM 2180 and CHEM [2581, 2582, 2583, and 2584]	
		[2] Credit for these courses awarded once only	
		[3] Courses are equivalent; credit awarded once only.	
		[4] Course need to get C or better	