

Tsuyama College		Year	2021	Course Title	Engineering Ethics
Course Information					
Course Code	0134		Course Category	General / Compulsory	
Class Format	Lecture		Credits	School Credit: 2	
Department	Department of Integrated Science and Technology Electrical and Electronic Systems Program		Student Grade	5th	
Term	Year-round		Classes per Week	2	
Textbook and/or Teaching Materials	Textbook : "Introduction to Engineering Ethics" (Maruzen Shuppan)				
Instructor	KAMIYA Ken				
Course Objectives					
<p>Learning purposes : The purpose of this class is to deepen the understanding of the impact of science and technology on society and nature and to develop the ability to recognize the responsibility as an engineer by examining engineering ethics in a case-by-case manner.</p> <p>Course Objectives :</p> <p>1.To understand and explain the importance and the social background of engineering ethics.</p> <p>2.To understand and explain the responsibilities of engineers for society, such as accountability, whistleblowers, product liability, and risk management.</p> <p>◎3.To be able to respect the uniqueness of others and yourself with a public mind.</p>					
Rubric					
	Excellent	Good	Acceptable	Not acceptable	
Achievement 1	Can very well understand and explain the importance and the social background of engineering ethics.	Can well understand and explain the importance and the social background of engineering ethics.	Can basically understand and explain the importance and the social background of engineering ethics.	Cannot understand and explain the importance and the social background of engineering ethics.	
Achievement 2	Can very well understand and explain the responsibilities of engineers for society.	Can understand and explain the responsibilities of engineers for society.	Can basically understand and explain the responsibilities of engineers for society.	Cannot understand and explain the responsibilities of engineers for society.	
Achievement 3	Can very well respect the uniqueness of others and yourself with a public mind.	Can well respect the uniqueness of others and yourself with a public mind.	Can basically respect the uniqueness of others and yourself with a public mind.	Cannot respect the uniqueness of others and yourself with a public mind.	
Assigned Department Objectives					
Teaching Method					
Outline	<p>General or Specialized : General</p> <p>Field of learning : humanities</p> <p>Foundational academic disciplines : philosophy/ethics</p> <p>Relationship with Educational Objectives : This subject is equivalent to "(1) Cultivate human creative talent, rich in practical abilities", "(5) Attain a global perspective and understanding of social development", and "(7) Develop communication and presentation abilities".</p> <p>Relationship with JABEE programs : The main goal of learning and education in this subject is "G-1".</p> <p>Course outline : Due to the rapid progress of science and technology, we are facing unprecedented ethical problems that human beings have never imagined. This lecture systematically outlines engineering ethics.</p>				
Style	<p>Course method : Students will study engineering ethics using the textbook, introducing as many examples as possible to avoid becoming overly abstract.</p> <p>Grade evaluation method: The results of two regular examinations will be averaged and evaluated (100%). Each regular examination will assign tasks to judge the achievement of the above goals. In principle, there will be no makeup exams.</p>				
Notice	<p>Precautions on the enrollment : Students must take this class (no more than one-fifth of the required number of class hours missed) and earn the credit in order to complete the 5th year course.</p> <p>Course advice: Read the new on a daily basis and develop your interests. Review what you have learned in class and formulate any questions that you may have.</p> <p>Foundational subjects : Ethics(1st year)</p> <p>Related subjects : Modern Philosophy(Advanced course 2nd)</p> <p>Attendance advice : This is an environmental education course and a course related to the development of nuclear power core personnel. Students who are late for class will be absent from the course, but we will not allow students to miss one class if they are late several times.</p>				
Characteristics of Class / Division in Learning					
<input type="checkbox"/> Active Learning		<input type="checkbox"/> Aided by ICT		<input type="checkbox"/> Applicable to Remote Class	
				<input type="checkbox"/> Instructor Professionally Experienced	
Must complete subjects					
Course Plan					
			Theme	Goals	

1st Semester	1st Quarter	1st	Introduction	General explanation of goals
		2nd	Why one must learn engineering ethics	Attainment target 1
		3rd	Why one must learn engineering ethics	Attainment target 1
		4th	Why one must learn engineering ethics	Attainment target 1
		5th	Why one must learn engineering ethics	Attainment target 1
		6th	Engineers in organizations	Attainment targets 2 and 3
		7th	Engineers in organizations	Attainment targets 2 and 3
		8th	Engineers in organizations	Attainment targets 2 and 3
	2nd Quarter	9th	Engineers as professionals	Attainment targets 2 and 3
		10th	Engineers as professionals	Attainment targets 2 and 3
		11th	Engineers as professionals	Attainment targets 2 and 3
		12th	International Standards and Globalization	Attainment targets 2 and 3
		13th	International Standards and Globalization	Attainment targets 2 and 3
		14th	International Standards and Globalization	Attainment targets 2 and 3
		15th	(1st semester final exam)	
		16th	Handback of exam papers with comments	
2nd Semester	3rd Quarter	1st	Legal Responsibility and Intellectual Property Rights	Attainment targets 2 and 3
		2nd	Legal Responsibility and Intellectual Property Rights	Attainment targets 2 and 3
		3rd	Legal Responsibility and Intellectual Property Rights	Attainment targets 2 and 3
		4th	Technology, Safety and the Environment	Attainment targets 2 and 3
		5th	Technology, Safety and the Environment	Attainment targets 2 and 3
		6th	Technology, Safety and the Environment	Attainment targets 2 and 3
		7th	Design, Innovation and State-of-the-Art Technology	Attainment targets 2 and 3
		8th	Design, Innovation and State-of-the-Art Technology	Attainment targets 2 and 3
	4th Quarter	9th	Design, Innovation and State-of-the-Art Technology	Attainment targets 2 and 3
		10th	Risk and Decision-making	Attainment targets 2 and 3
		11th	Risk and Decision-making	Attainment targets 2 and 3
		12th	The Public Nature of Engineering	Attainment target 3
		13th	The Public Nature of Engineering	Attainment target 3
		14th	The Public Nature of Engineering	Attainment target 3
		15th	(2nd semester final exam)	
		16th	Handback of exam papers with comments	

#### Evaluation Method and Weight (%)

	Examination	Presentation	Mutual Evaluations between students	Behavior	Portfolio	Assignment	Total
Subtotal	100	0	0	0	0	0	100
Basic Proficiency	70	0	0	0	0	0	70
Specialized Proficiency	0	0	0	0	0	0	0
Cross Area Proficiency	30	0	0	0	0	0	30