

Subject Description Form

Subject Code	CSE40467
Subject Title	Environmental Management Systems
Credit Value	3
Level	4
Exclusion	CSE467 Environmental Management Systems
Objectives	To provide students with an overview of corporate environmental management, and Environmental Management System (EMS), particularly the ISO14001 standards.
Intended Learning Outcomes	<p>Upon completion of the subject, students will be able to:</p> <ol style="list-style-type: none"> a. understand the needs for environmental management in an organization; b. analyse corporate environmental issues, and develop the implementation plan of an appropriate EMS. c. to recognize the need for, and to engage in life-long learning
Subject Synopsis/ Indicative Syllabus	<ol style="list-style-type: none"> 1. <u>Environmental Legislation</u> and Organization Policy Environmental policy and regulation; sustainable development; economical incentives in corporation environmental management. 2. <u>Environmental Management System</u> Corporate environmental programme; development of environmental management system (EMS); global environmental reporting. 3. <u>Environmental Management System Standard (ISO14000)</u> Structure of ISO14000; ISO14001 EMS; life cycle analysis (LCA); and environmental labeling. 4. Implementation of an <u>EMS</u> Environmental effects and environmental targets; environmental management plan; environmental manual and documentation; EMS audit; and management review.
Teaching/Learning Methodology	<p>The subject teaching will include the following elements:</p> <ol style="list-style-type: none"> (a) Lectures – to introduce the basic concepts of EMS, environmental management process, and analytical skills; (b) Tutorials – to answer student questions in the learning processes; (c) Group discussion and presentations – to let students working together with a case study; (d) Reading materials and video presentations – to give students practical examples on EMS; (e) Seminars on EMS by invited speakers from corporate environmental directors and managers; and (f) Course work on EMS.

Assessment Methods in Alignment with Intended Learning Outcomes	Specific assessment methods/tasks	% weighting	Intended subject learning outcomes to be assessed		
			a	b	c
	1. Continuous Assessment	45	√	√	
	2. Seminar Report	5			√
	3. Final Examination	50	√	√	
	Total	100			
<p>Students must attain at least grade D in both coursework and final examination (whenever applicable) in order to attain a passing grade in the overall result.</p>					
Student Study Effort Expected			Average hours per week		
	Class contact:				
	▪	Lectures/ Tutorials/Group discussion	3 Hrs.		
	Other student study effort:				
	▪	Reading/case/study/reports	1.4 Hrs.		
	▪	Self Study	4.6 Hrs.		
	Total student study effort		9 Hrs.		
Reading List and References	<p>Christopher Sheldon, 2002. <i>Installing Environmental Management Systems: A Step-by-step Guide</i>. Earthscan, London.</p> <p>David Nelson, 1998. <i>International Environmental Auditing</i>. Government Institutes, Rockville, MD. USA.</p> <p>Gayle Woodside, 2002. <i>ISO 14001 Auditing Manual</i>. McGraw-Hill, New York.</p> <p>Jacob Bregman, 2002. <i>Environmental Compliance Handbook</i>. Lewis Publishers, Boca Raton, Fla.USA.</p> <p>John Kinsella, 1999. <i>Handbook for Implementing An ISO 14001 Environmental Management System: A Practical Approach</i>. EMCON, Bothell, WA. USA.</p>				