Environmental Management Sustainability MKAK 1003

Course Presentation

Co-funded by the Erasmus+ Programme of the European Union

MARE

UTM UNIVERSITI TEKNOLOGI MALAYSIA

Table of Contents

1.0 Introduction to course

This course is designed to expose students to various aspects of environmental management and the concept of sustainability. Current issue related to environmental problems especially on climate change and water supply are the main aspects to be addressed. Some methods and concepts of sustainable approaches are introduced in order to promote and achieve sustainable development goals.

The main course objective is to enable students to understand the concept of environmental sustainability plan and incorporate the concept in environmental management.

By the end of the course, students will success to:

1. Students will be able to identify the importance of environmental sensitive areas, as well as analyse various environmental issues related to climate change and water supply system due to unsustainable development approaches.
2. Student will be able to communicate effectively on issues pertaining to environmental management.
3. Students will be able to integrate technological approaches in order to minimize adverse environmental impacts and promote sustainable development.
4. Students will be able to evaluate and analyse data obtained from water quality control monitoring and plan mitigating and control measures for water pollution.

2.0 Course Structure

2.1 Course Planning

WEEK	TOPIC
Week 1	Environmental sustainability
Week 2	Environmental issues and problems: global warming and water Security
Week 3	Classification of natural environmental system: soil;, steep slope; lake and lakefront
Week 4	Classification of natural environmental system: River; floodplains; riverine
Week 5	Classification of natural environmental system: swamp forest; wetland; coastline
Week 6	Environmental sustainable approaches; sustainable development goal
Week 7	Integrated river management system
Week 9	Water security
Week 10	Water security
Week 11	Water footprint
Week 12	Life cycle analysis
Week 13	Carbon footprint, carbon credit and payment for environmental services
Week 14	Green building

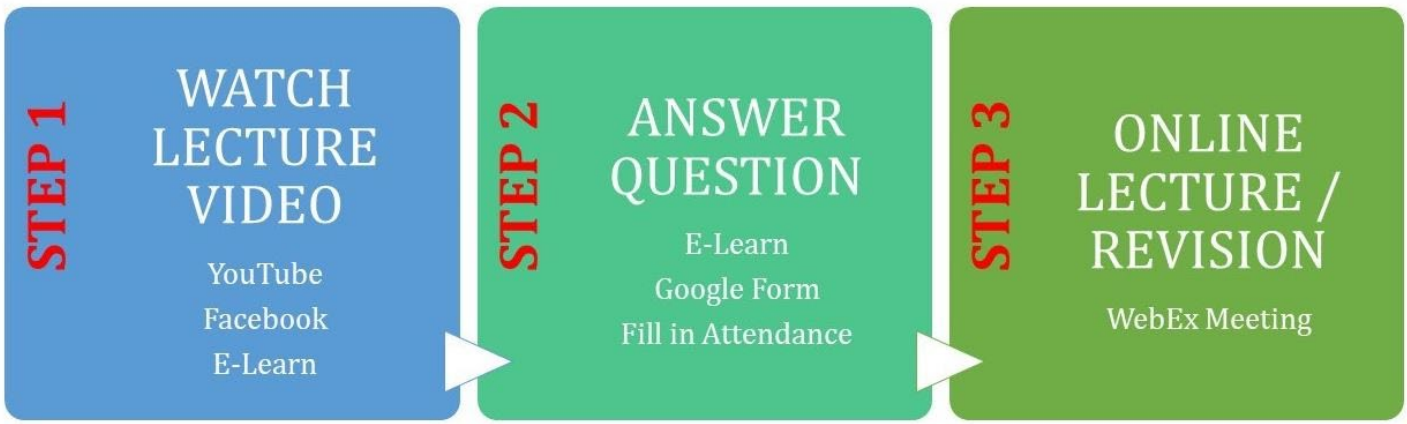
2.0 Course Structure

2.2 Mode of Delivery

Link will be given in e-Learning Platform

2.0 Course Structure

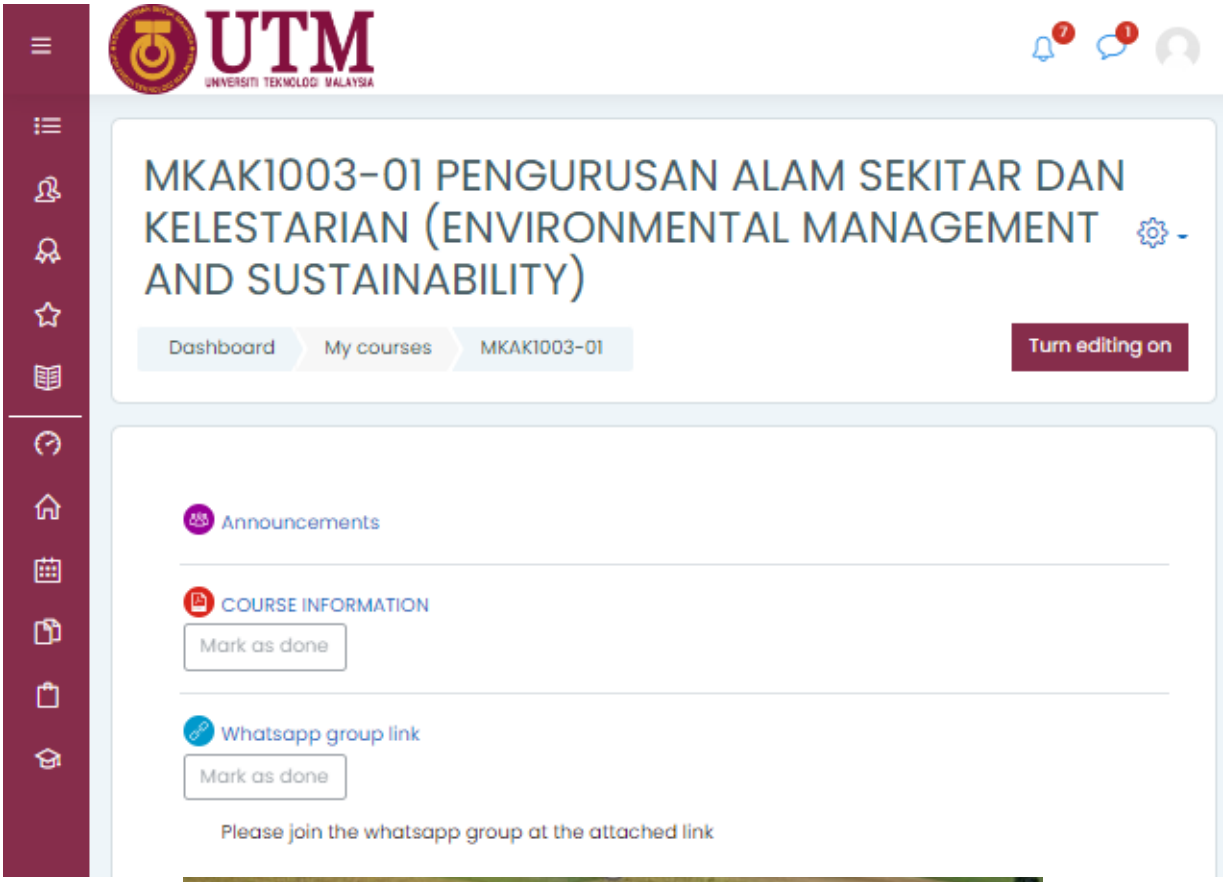
2.3 Teaching Strategy



Lecture video will be uploaded in
YouTube
Facebook
e-Learn platform

2.0 Course Structure

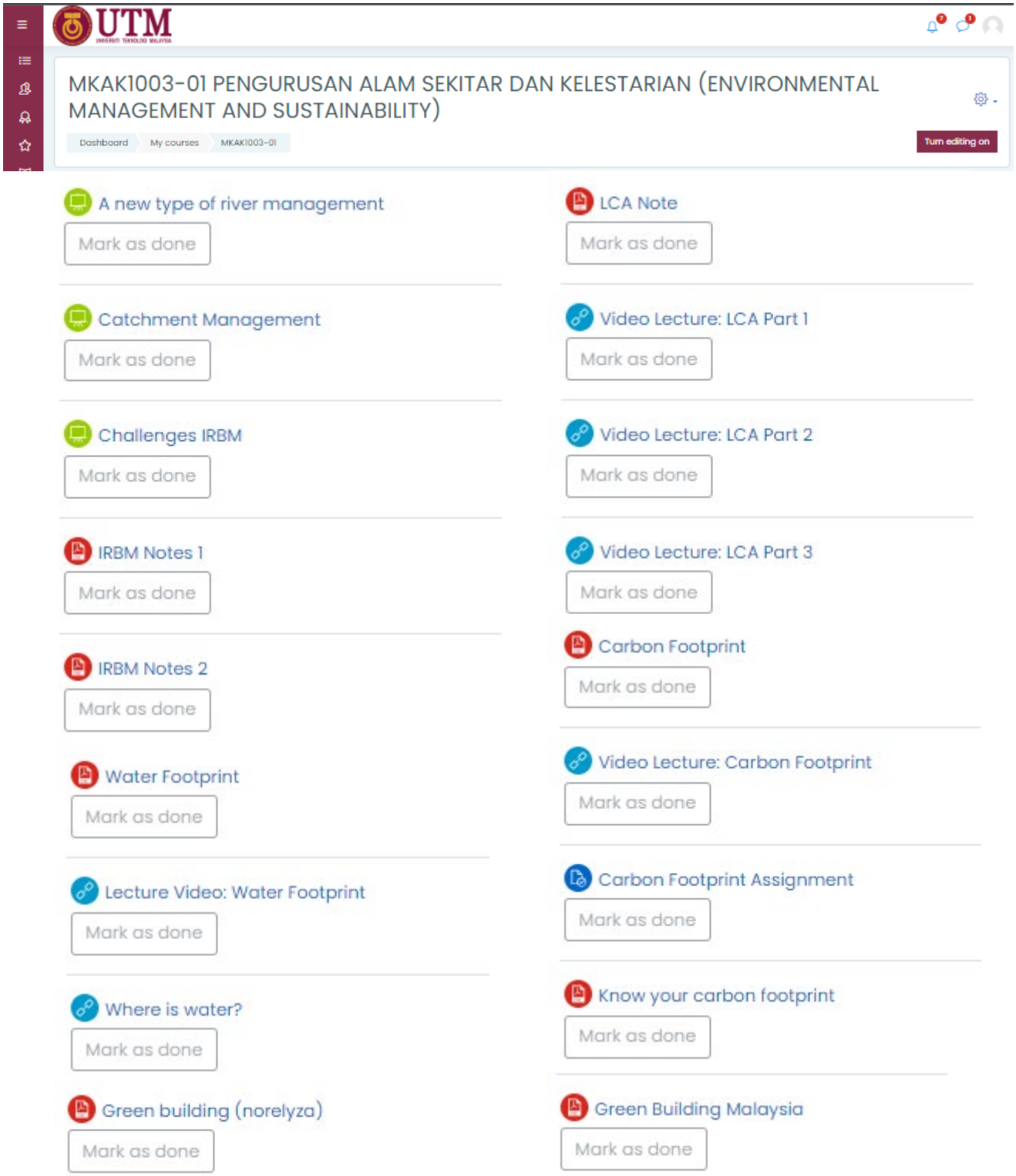
2.4 Learning Material



Lecture information will be uploaded in e-Learning Platform

2.0 Course Structure

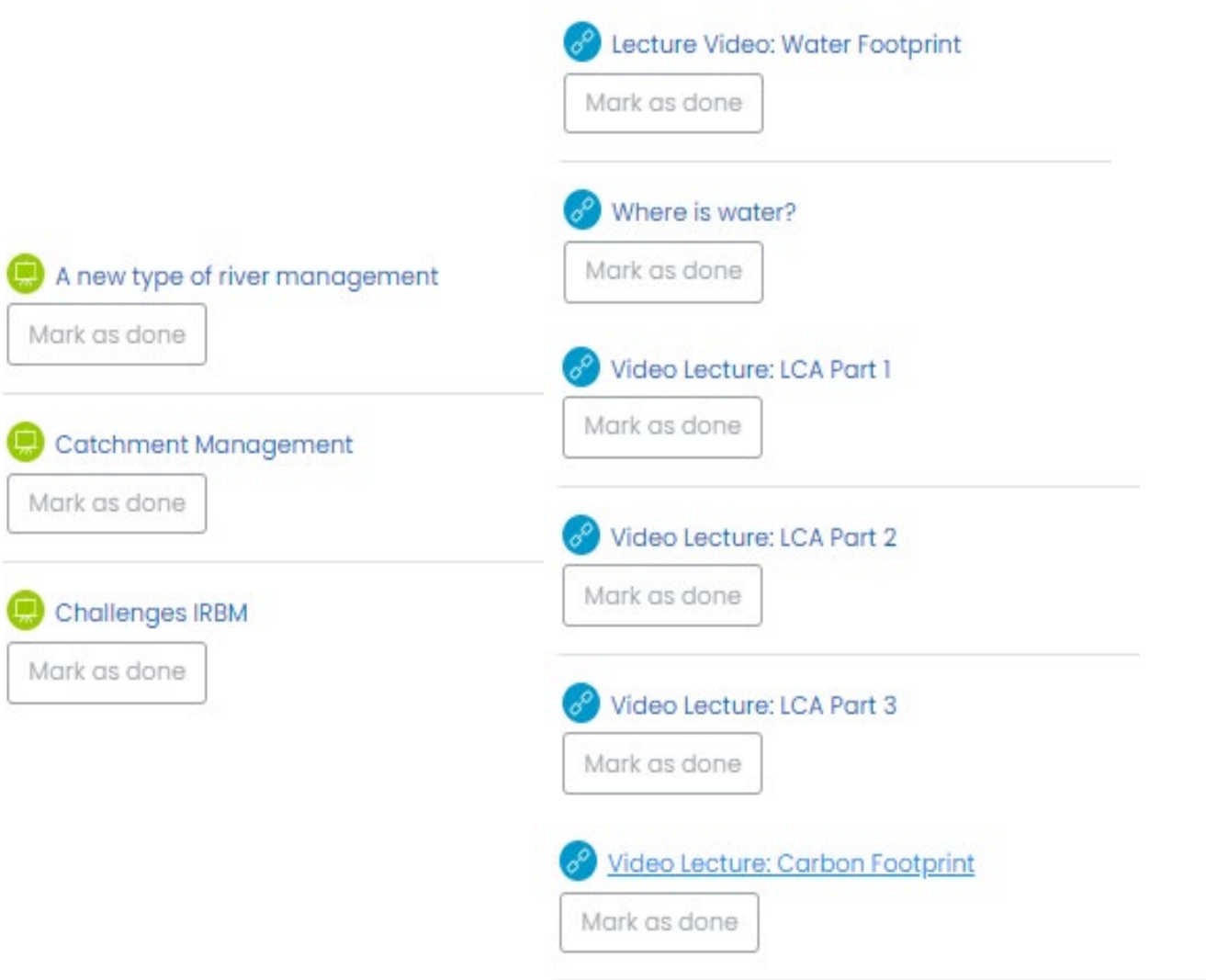
2.5 Learning Notes



Lecture Notes will be uploaded in e-Learning Platform

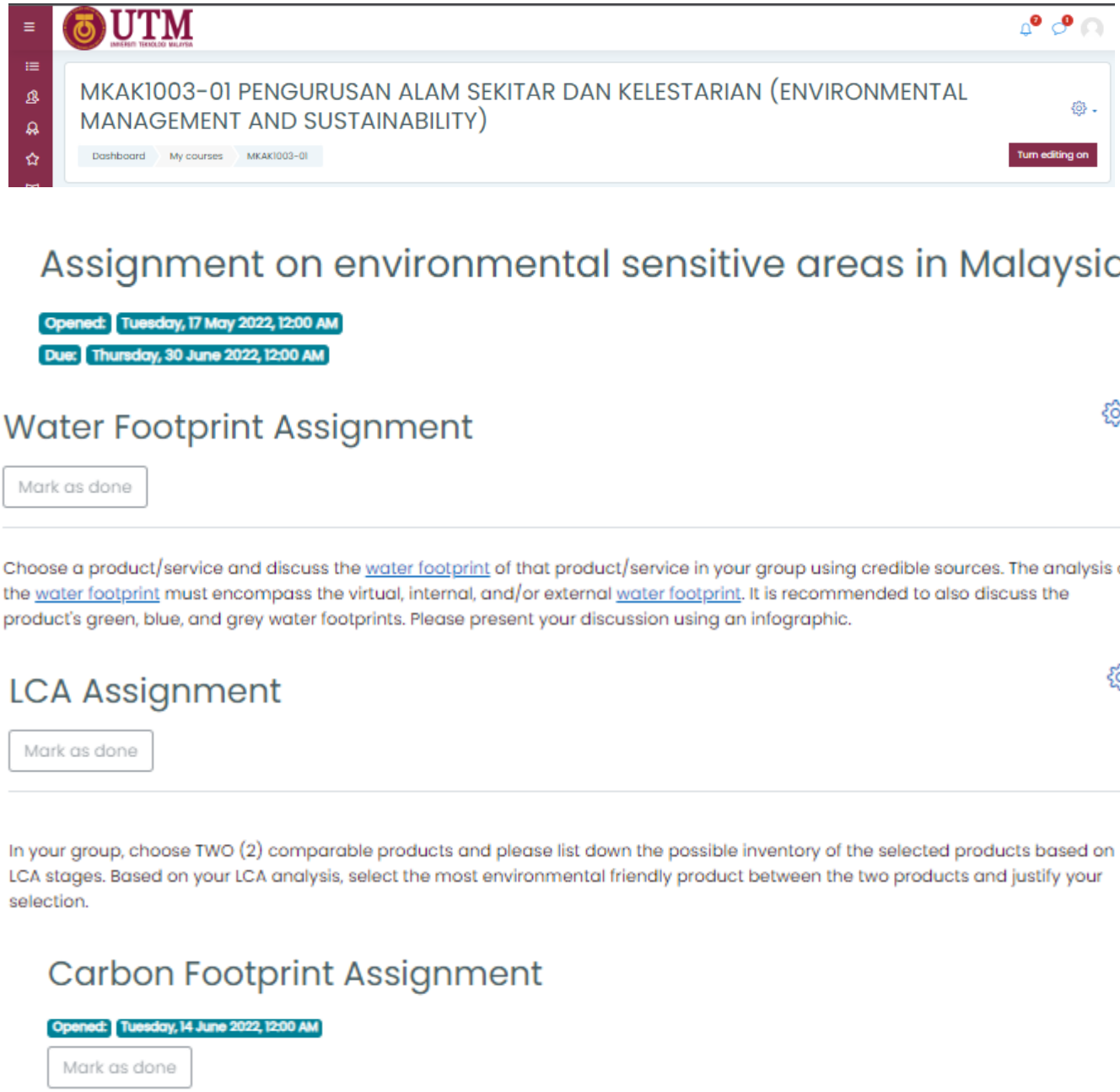
2.0 Course Structure

2.6 Video Related to the Environmental Management Sustainability



2.0 Course Structure

2.7 Assignments



Assignment detail information will be uploaded in e-Learning Platform

3.0 Others

3.1 Test / Final Exam Regulation

Universiti Teknologi Malaysia (UTM) is committed to academic integrity. Plagiarism, collusion, and cheating are strictly prohibited.

- Student should write your examination answer entirely on your own without unacknowledged input from the others.
- Distributing, receiving, possessing any information in electronic, printed or any other form or cooperated with any other person when completing the examination is STRICTLY prohibited.
- Student is expected to submit work and present as your own without copy text or material from other sources.
- PLAGARISM DETECTION SOFTWARE (Turnitin) will be used to test the similarity from online sources.

3.0 Others

3.2 Reading List

1. 1. Avlonas, K. and Nassos, G.P. Practical Sustainability Strategies: How to Gain a Competitive Advantage. John Wiley Publisher. 2013.
2. 2. Biswas, A.K. and Tortajada, C. Water Security, Climate Change and Sustainable Development. Springer. 2016 Brinkmann, R. Introduction to Sustainability. Wiley Blackwell. 2016
3. 3. Gannmon, P. Introduction to Energy, Environment and Sustainability, Kendall Hunt Publishing Company. 2013
4. 4. Kerr, J.A. Introduction to Energy and Climate: Developing a Sustainable Environment. CRC Tailor and Francis Group. 2017.
5. 5. Klopffer, W. and Grahl, B. Life cycle assessment (LCA). A guide to the best practice. John Wiley Publisher. 2014
6. 6. Mehta, L. and Movik, Synne. Liquid Dynamics: Challenges for Sustainability in the Water Domain. Wiley Interdisciplinary Reviews: Water. Volume 1, Issue 4, Pages: 369–384, DOI: 10.1002/wat2.1031. 2014.
7. 7. Theis, T. and Tomkin, J. Sustainability: A Comprehensive Foundation. http://cnx.org/content/col11325/1.38/ >2012 Wheater, H.S. and Gober, P. Water security and the science agenda. Agu Publication.10.1002/2015WR016892 2015

3.0 Others

3.3 Student Learning Time

Distribution of student Learning Time (SLT) Course content outline						Teaching and Learning Activities		TOTAL SLT
	Guided Learning (Face to Face)					Guided Learning Non-Face to Face	Independent Learning Non-Face to face	
CLO	**L**	**T**	**P**	**O**				
CLO 1	12h			9h		5h	25h	**51h**
CLO 2	10h			6h		5.5h	18h	**39.5h**
CLO 3				4h			6h	**10h**
Total SLT	**22h**			**19h**		**10.5h**	**49h**	**100.5h**
Continuous Assessment					PLO	Percentage		Total SLT
1	Assignment				AKW	20		**8.5h**
2	Assignment				CTPS	20		**8.5h**
3	Assignment and Presentation				AKW CS	20		As in CLO 2 (10h)
Final Assessment						Percentage		Total SLT
1	Final Examination				AKW, CTPS	40		**2.5h**
Grand Total						**100**		**120h**

3.0 Others

3.3 Questionnaire for Students

COURSE EVALUATION

MKAK 1003-01
ENVIRONMENTAL MANAGEMENT SUSTAINABILITY

No data in this section.