MODUL
ENVIRONMENTAL GIS

MASTER PROGRAM OF ENVIRONMENTAL SCIENCE
SCHOOL OF POSTGRADUATED STUDIES
DIPONEGORO UNIVERSITY

Modul Description :

Modul design	Environmental GIS
Modul level, if applicable	
Code, if applicable	P-CIL-8-214
Subtitles, if any	
Course, if applicable	
Semester(s) in which the Modul is taught	semester 2
Modul responsible*	
Teaching Lecturer	1. Dr. Eng. Maryono, ST, MT 2. Prof. Dr. Denny Nugroho Sugianto, ST, M.Sc 3. Dr. Muhammad Helmi, S.Si., M.Si"
Language	*Indonesian and English*
Relationship with curriculum	
Type of teaching, hours of contact	*Studying:1 x 120 minutes x 16 meetings = 32 hours/week* *Q&A:1x 20 minutes 16 meetings = 5.3 hours/week* *Discussion:1x 20 minutes 16 meetings = 5.3 hours/week* *Presentation:1x 20 minutes 16 meetings = 5.3 hours/week* *Individual assignments: 36 minutes/day = 3 hours/week* *Total work for 1 semester = 100 hours = 4 ECTS*
Workload	*(Estimated) workload, divided into contact hours (lectures, exercises, laboratory sessions, etc.) and personal study, including test preparation, specified in hours,[1]and overall.*
credit points	*2 credits / 4 ECTS*
Requirements according to the exam regulations	*Lecture attendance of at least 75%*
Recommended prerequisites	*For example, competence in…*

*Advanced lecture material conducted by the main supervisor, co-supervisors and students refers to the research topic.

Modul the desired learning objectives/outcomes	Students are able to know the benefits of GIS-based software in answering environmental problems and are also able to operate GIS-based software to answer environmental problems.
Fill	In this course students will study one of the main goals of geographic information systems, namely the use of computer-based systems to manage geographic data. The theoretical foundation of geographic information systems, components, data formats and spatial data processing methods will be provided so that students have knowledge of how to compile, process, analyze, and interpret spatial data in geographic information systems. In order to understand and gain experience in compiling spatial data, students will be given the task of compiling simple spatial data which is organized as attribute data in spatial data. The process of converting spatial data used in geographic information systems will also be given in this course.
Study and examexam requirements and forms	• *Open the book and close the book* • *Multiple choice, case studies, interviews, practicals*
Media used	*Powerpoint, youtube, website*
Reference	1. Adil Ahmat. 2017. Geographic Information System. ANDI Publisher. Yogyakarta 2. Irwansyah Eddy. 2013. Basic Principles and GIS Application Development. Digibook Printing and Publishing. Yogyakarta 3. Wahana Computer.2015.GIS Modeling for Disaster Mitigation. PT. Elex Media Komputindo. Jakarta