HASANUDDIN UNIVERSITY

Agricultural Engineering
Bachelor Program

2023
MODULE
DESCRIPTION

BACHELOR PROGRAM
AGRICULTURAL ENGINEERING
FACULTY OF AGRICULTURE
HASANUDDIN UNIVERSITY
2023

Irrigation and Drainage Engineering Practicum

Semester 5

Module designation	*Irrigation And Drainage Engineering Practicum*
Semester(s) in which the module is taught	*V*
Person responsible for the module	• Samsuar, S.TP., M.Si • Husnul Mubarak, S.TP., M.Si.
Language	*Indonesia*
Relation to curriculum	*Compulsory*
Teaching methods	*Lecture, Lab Works*
Workload (incl. contact hours, self-study hours)	*Estimated) Total workload:* *1 SKS x 1.7 = 1.7 ECTS = 45.9 hours* • *Lecture = 11.6 hours* • *Excercise = 14 hours* • *Sel study = 14 hours* • *Exam = 2 hours (MID term and final)* • *Exam preparation = 4.3 hours*
Credit points	*1 SKS = 1.7 ECTS*
Required and recommended prerequisites for joining the module	*Irrigation And Drainage Eng*
Module objectives/intended learning outcomes	*ILO 3: Apply knowledge of mathematics, sciences, and engineering principles in agricultural fields; (Knowledge 1)* *ILO 4: Use quantitative analysis, information technology and critical thinking in agricultural engineering profession; (Knowledge 2)* *ILO 6: Use techniques, skills, and modern tools necessary for agricultural engineering practices; (Skill 1)*
Content	*The student will be able to demonstrate the understanding of processes and phenomena in hydrological cycles, and also have capability to analyze data in all component hydrology. This course covers: (1) concept of Hydrological Cycle, (2) Data Processing of precipitation, interception, evaporation, surface and subsurface flow, infiltration and percolation, and groundwater, (3) Statistical hydrology and (4) Rainfall runoff Modeling.*
Examination forms	*Writing, oral presentation*
Study and examination requirements	*Attendance above 80%*
Reading list	*Schofield, W. & M. Breach, 2007. Engineering Surveying. Sixth Edition, Butterworth-Heinemann Elsevier. Sydney.*