



## EVALUATION OF BIOLOGY LEARNING OUTCOMES LESSON PLAN

	<b>MINISTRY OF EDUCATION, CULTURE, RESEARCH, AND TECHNOLOGY</b> <b>MULAWARMAN UNIVERSITY</b> <b>FACULTY OF TEACHER TRAINING AND EDUCATION</b> <b>BIOLOGY EDUCATION STUDY PROGRAM</b>	No. Doc	5.3
		Release Date	July 6, 2020
		No Revision	3
		Page	12

LESSON PLAN					
Subject	Course Code	Clusters of Courses	Weight (credit)	Semester	date Compilation
<b>Evaluation of Biology Learning Outcomes</b>	19050163W039	Course Offered by Study Program	3	5	March 10, 2020
<b>Authorization</b>	<b>Course Coordinator</b>	<b>TEAM Teaching Courses</b>		<b>coordinator Study Program</b>	
	 Dr. Hj. Herliani, M.Pd	1. Dr. Hj. Herliani, M.Pd 2. Masitah, S.Pd, M.Pd		 Dr. Hj. Herliani, M.Pd	
<b>Learning Outcomes</b>	<b>Learning Outcomes of Study Program Graduates (LO-Study Program) Charged on Courses</b>				
	Attitude	A2 Collaborate and take responsibility for work in their fields of biology and learning.			
	Knowledge	K2 Able to implement pedagogical science in learning Biology in the context of Tropical Rain Forest and its Environment			

	Specific Skills	SS3 Able to design, implement, develop evaluation instruments in accordance with the concept of learning in the field of Biology
	<b>Course Learning Outcomes (CLO)</b>	
	<ol style="list-style-type: none"> <li>1. Able to demonstrate a collaborate and take responsible for work attending Evaluation of Biology Learning Outcomes lectures</li> <li>2. Able to implement pedagogical science in learning Biology in the field of Evaluation of Biology Learning Outcomes</li> <li>3. Able to design, implement, develop evaluation instruments in accordance with the concept of learning in the field of Evaluation of Biology Learning Outcomes</li> </ol>	
<b>Integrated Principle Scientific Studies of Unmul</b>	Concepts, behavior, social strata in general and people in tropical rainforest areas on the island of Borneo	
<b>Course Description</b>	The Biology Learning Process and Outcomes Evaluation course consists of introductory study materials for educational evaluation and evaluation, learning outcomes evaluation techniques, test techniques and non-test techniques as a means of evaluating learning outcomes, techniques for preparing and implementing learning outcomes tests, test validity testing techniques and item validity. learning outcomes tests, learning outcomes test reliability testing techniques, examination techniques, scoring and processing learning outcomes tests, analysis techniques for learning outcomes test items, techniques for determining final grades, ranking and making learning achievement profiles	
<b>Reference</b>	<ol style="list-style-type: none"> <li>1. Prof. Drs. Anas Sudjiono, Introduction to Educational Evaluation. 2016. Jakarta. PT. Raja Grafindo Persada</li> <li>2. Doran R., 1980. Basic Measurement and Evaluation of Science Instruction, Washington: NSTA</li> <li>3. Ngalim Purwanto, 1986. Principles and techniques of Teaching Evaluation. Youth Work. Bandung</li> <li>4. Wayan Nurkancana and Sumartana, VAT 1983. Evaluation of Education. Surabaya:National Usak</li> </ol>	

<b>Learning Media</b>		<b>Software :</b>				<b>Hardware :</b>					
		1. Powerpoint 2. Camptasia				1. Laptops 2. HP		1. Laptops 2. HP			
<b>Prerequisite Courses (If any)</b>		-									
meeting-to	Sub-CPMK	Indicator	Study Material	Learning Strategies (Models and Methods)	Student Learning Experience	Evaluation			Reference		
						Type	Criteria	Weight (%)			
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)		
1	<b>Students are able to understand and apply the Lecture Contract including:</b> 1) Competency standards, basic competencies, and lecture indicators; 2) The purpose of the lecture; 3) Lecture techniques and assignments eevaluation of biology learning processes and outcomes 4) Learning evaluation techniques. 5) Explain the overall scope of the material evaluation of oroses and biology learning	1. Explaining the Lecture Contract 2. Explain the course description of Biology Learning Process and Outcomes; 3. Explain the meaning of Evaluation of Biology Learning Process and Outcomes;	1. Rights and obligations of lecturers and students, 2. Description of the educational profession course	<ul style="list-style-type: none"> <li>•Strategy:               <ol style="list-style-type: none"> <li>1. Models: Direct learning (conventional)</li> <li>2. Method: Lectures, Q&amp;A, assignments</li> </ol> </li> <li>•Lecturer submits lecture contract, course description</li> <li>•Explain ethe evaluation of the process and results of learning biology is seen from the concept, behavior, social</li> </ul>	Work independently and interact with other students of different ethnicities in group discussions about the meaning of the educational profession	Process assessment which includes: 1. attitude, 2. knowledge 3. skills 4. presence	<ul style="list-style-type: none"> <li>▪ Assessment criteria: PAP</li> <li>▪ Form of assessment : oral, written, portfolio</li> </ul>	5	1,2,3, 4		

	outcomes.			<p>strata in general and the community in the tropical rain forest area on the island of Borneo.</p> <ul style="list-style-type: none"> <li>• Students listen, and ask things that are not clear about evaluation of the process and results of learning biology seen from the concept, behavior, social strata in general and the community in the tropical rain forest area on the island of Kalimantan</li> <li>• Lecturers give assignments to students related to the educational profession</li> </ul>					
2-3	Students are able analyzing Learning Outcome Evaluation Techniques	Explaining the technique of evaluating learning outcomes	<b>Learning Outcome Evaluation Techniques</b>	<ul style="list-style-type: none"> <li>• Strategy: <ol style="list-style-type: none"> <li>1. Models: <i>STAD</i></li> <li>2. Methods: lectures,</li> </ol> </li> </ul>	Work independently, and interact with other students	Process assessment which includes: <ol style="list-style-type: none"> <li>1. attitude,</li> <li>2. knowledge</li> </ol>	<ul style="list-style-type: none"> <li>▪ Assessment criteria: PAP</li> <li>▪ Form of assessment</li> </ul>	12.5	1,2,3,4

			<p>1) Basic Principles of Evaluation</p> <p>2) Characteristics of Evaluation of Learning Outcomes</p> <p>3) Cognitive, affective and psychomotor domains as objects of evaluation of learning outcomes</p>	<p>discussions, presentations, questions and answers, giving assignments about learning outcomes evaluation techniques</p> <p>▪ With the provision of understanding independently, and in groups, mutually strengthen understanding of learning outcomes evaluation techniques</p> <p>Students, under the guidance of lecturers, make related conclusions learning outcomes evaluation techniques</p>	<p>discussing learning outcomes evaluation techniques</p>	<p>3. skills</p> <p>4. task</p>	<p>: oral, written, portfolio</p>		
4-5	Student Able to analyze test techniques	Analyzing test techniques and	<p>1. Test Technique</p> <p>2. Non-Test</p>	<p>Strategy:</p> <p>1. Models:</p>	Work independently,	Process assessment	▪ Assessment criteria:	15	1,2,3,4

	and non-test techniques as a tool for evaluating learning outcomes	non-test techniques as a tool for evaluating learning outcomes	Techniques	<p><i>STAD</i></p> <p>2. Methods: lecture, discussion, presentation, question and answer, assignment.</p> <p>With the provision of understanding independently, and in groups, mutually strengthen understanding of Test Techniques and non-test techniques as a tool for evaluating learning outcomes</p> <p>Students, under the guidance of lecturers, draw conclusions regarding test techniques and non-test techniques as a</p>	and interact with other students discussing Test Techniques and non-test techniques as a tool for evaluating learning outcomes	which includes: 1. attitude, 2. knowledge 3. skills 4. task	<p>PAP</p> <ul style="list-style-type: none"> <li>▪ Form of assessment : oral, written, portfolio</li> </ul>		
--	--	--	------------	--	--	---	--	--	--

				tool for evaluating learning outcomes					
6-7	Students are able to analyze the technique of preparing and implementing learning outcomes tests	Analyze techniques for preparing and implementing learning outcomes tests	<ol style="list-style-type: none"> <li>1. Characteristics of the test</li> <li>2. The basic principles of test preparation.</li> <li>3. Forms of learning outcomes tests and techniques the arrangement</li> <li>4. The technique of implementing the learning outcomes test</li> </ol>	<p>Strategy:</p> <ol style="list-style-type: none"> <li>1. Models: <i>STAD</i></li> <li>2. Methods: lecture, discussion, presentation, question and answer, assignment.</li> </ol> <p>With the provision of understanding independently, and in groups, mutually strengthen understanding of the technique of preparing and implementing learning outcomes tests</p> <p>Students, under the guidance of lecturers, make conclusions regarding the</p>	Work independently, interact with other students about the technique of preparing and implementing learning outcomes tests	Process assessment which includes: <ol style="list-style-type: none"> <li>1. attitude,</li> <li>2. knowledge</li> <li>3. skills</li> <li>4. task</li> </ol>	<ul style="list-style-type: none"> <li>Assessment criteria: PAP</li> <li>Form of assessment : oral, written, portfolio</li> </ul>	15	1,2,3,4

				technique of preparing and implementing learning outcomes tests					
8	<b>Mid-Semester Exam (UTS)</b>								
9-10	Student able to analyze the test validity test techniques and the validity of the learning outcomes items	Analyzing test validity testing techniques and the validity of learning outcomes items	<ol style="list-style-type: none"> <li>The technique of testing the validity of the learning outcomes test</li> <li>The technique of testing the validity of learning outcomes</li> </ol>	<p>Strategy:</p> <ol style="list-style-type: none"> <li>Models: <i>STAD</i></li> <li>Methods: lecture, discussion, presentation, question and answer, assignment</li> </ol> <p>With the provision of understanding independently, and in groups, students in addition, strengthen each other's understanding of the test validity testing technique and the validity of the learning outcomes items</p>	Work independently, and interact with other students of different ethnicities in group discussions about test validity testing techniques and the validity of learning outcomes items	Process assessment which includes: <ol style="list-style-type: none"> <li>attitude,</li> <li>knowledge</li> <li>skills</li> <li>task</li> </ol>	<ul style="list-style-type: none"> <li>Assessment criteria: PAP</li> <li>Form of assessment : oral, written, portfolio</li> </ul>	15	1,2,3,4
11-12	Students are able to analyze the reliability testing technique of	Analyzing the reliability testing technique of	<ol style="list-style-type: none"> <li>Reliability Testing Techniques for</li> </ol>	<p>Strategy:</p> <ol style="list-style-type: none"> <li>Models: <i>STAD</i></li> </ol>	Work independently and interact	Process assessment which includes:	<ul style="list-style-type: none"> <li>Assessment criteria: PAP</li> </ul>	15	1,2,3,4



	learning outcomes test	learning outcomes test	<p>Learning Outcome Tests in the Form of Description</p> <p>2. Reliability Testing Techniques for Objective Learning Outcomes</p>	<p>2. Methods: lecture, discussion, presentation, question and answer, assignment</p> <p>With the provision of understanding independently, and in groups, students strengthen each other's understanding of the reliability testing techniques of learning outcomes tests</p>	with other students through Questions and Answers about test reliability testing techniques for learning outcomes	<p>1. attitude,</p> <p>2. knowledge</p> <p>3. skills</p> <p>4. task</p>	<p>Form of assessment : oral, written, portfolio</p>		
13	Students are able to analyze examination techniques, scoring and processing study test results	Analyzing examination techniques, scoring and processing learning test results	<p>1. Examination Techniques for Studying Test Results</p> <p>2. The technique of scoring the results of the learning outcomes test</p> <p>3. Processing and converting techniques (Conversion) Scores of</p>	<p>Strategy:</p> <p>1. Models: STAD</p> <p>2. Methods: lecture, discussion, presentation, question and answer, assignment</p> <p>With the provision of understanding</p>	Work independently and interact with other students through questions and answers about examination techniques, scoring and processing study test results	<p>Process assessment which includes:</p> <p>1. attitude,</p> <p>2. knowledge</p> <p>3. skills</p> <p>4. task</p>	<p>Assessment criteria: PAP</p> <p>Form of assessment : oral, written, portfolio</p>	7.5	1,2,3,4

			learning test results into grades	independently, and in groups, students strengthen each other's understanding of examination techniques, scoring and processing study test results					
14	Students are able to analyze the technique of analyzing learning outcomes test items	Analyzing the technique of analyzing learning outcomes test items	<ol style="list-style-type: none"> <li>1. Difficulty degree analysis technique</li> <li>2. Distinguishing power analysis techniques</li> <li>3. The technique of analyzing the distractor function</li> </ol>	<p>Strategy:</p> <ol style="list-style-type: none"> <li>1. Models: <i>STAD</i></li> <li>2. Methods: lecture, discussion, presentation, question and answer, assignment</li> </ol> <p>With the provision of understanding independently and in groups, students strengthen each other's understanding of the technique of analyzing learning</p>	Work independently and interact with other students through questions and answers about the technique of analyzing learning outcomes test items	Process assessment which includes: <ol style="list-style-type: none"> <li>1. attitude,</li> <li>2. knowledge</li> <li>3. skills</li> <li>4. task</li> </ol>	<ul style="list-style-type: none"> <li>▪ Assessment criteria: PAP</li> <li>▪ Form of assessment : oral, written, portfolio</li> </ul>	7.5	1,2,3,4

				outcomes test items					
15	Students are able to analyze techniques for determining final grades, compiling rankings and making learning achievement profiles	Analyzing techniques for determining final grades, compiling rankings and making learning achievement profiles	<ol style="list-style-type: none"> <li>1. Final score determination technique</li> <li>2. Ranking technique</li> <li>3. Techniques for profiling learning achievement</li> </ol>	<p>Strategy:</p> <ol style="list-style-type: none"> <li>1. Models: <i>STAD</i></li> <li>2. Methods: lecture, discussion, presentation, question and answer, assignment</li> </ol> <p>With the provision of understanding independently and in groups, students strengthen each other's understanding of techniques for determining final grades, ranking rankings and making learning achievement profiles</p>	Work independently and interact with other students through questions and answers about techniques for determining final grades, ranking rankings and making learning achievement profiles	Process assessment which includes: <ol style="list-style-type: none"> <li>1. attitude,</li> <li>2. knowledge</li> <li>3. skills</li> <li>4. task</li> </ol>	<ul style="list-style-type: none"> <li>▪ Assessment criteria: PAP</li> <li>▪ Form of assessment : oral, written, portfolio</li> </ul>	7.5	
16	<b>Final Semester Exam (UAS)</b>								

Coordinator of Biology Education Study program



Dr. Hj. Herliani, M. Pd  
NIP. 196709121992032002

Samarinda, March 10, 2020  
Course Coordinator



Dr. Hj. Herliani, M. Pd  
NIP. 196709121992032002