			Document Code
	Universitas Negeri Surabaya **Faculty of Mathematics and Natural Sciences** **Physics Education Undergraduate Study Program**		

SEMESTER LEARNING PLAN

Courses		CODE	Course Family	Credit Weight				SEMESTER	Compilation Date
Assessment of Learning Processes and Outcomes		8420303011		T=3	P=0	ECTS=4.77		3	July 18, 2024

AUTHORIZATION	SP Developer	Course Cluster Coordinator	Study Program Coordinator
	....	....	Mita Anggaryani, M.Pd., Ph.D.

Learning model	**Project Based Learning**

Program Learning Outcomes (PLO)	**PLO study program which is charged to the course**
	Program Objectives (PO)
	PLO-PO Matrix

	P.O

PO Matrix at the end of each learning stage (Sub-PO)

P.O	Week															
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16

Short Course Description	Study of the meaning, objectives, functions and principles of assessment, taxonomy of cognitive, affective and psychomotor learning outcomes, including scientific literacy and HoTs, various approaches, methods and assessment strategies/techniques, forms of instruments, assessment rubrics/guidelines , analysis and interpretation of assessment results, as well as their use.

References	**Main :**

1. 1. Anderson, L.W., & Krathwohl, D.R. 2001. A taxonomy for learning, teaching, and assessing: A revision of Bloom 19s taxonomy of educational objectives . New York: Longman.
2. 2. Arikunto, Suharsimi / I. Jabar, Cepi Safruddin Abdul. 2008. Evaluasi program pendidikan: Pedoman teoritis bagi mahasiswa dan praktisi pendidikan . Jakarta: Bumi Aksara.
3. 3. Brookhart, Susan M. 2010. How to assess higher-order thinking skills in your classroom. Alexandria: ASCD.
4. 4. George, David. 2005. Examination and evaluation in education . New Delhi: Commonwealth.
5. 5. Glencoe Series. tt. Performance Assessment in The Science Classroom. New York: McGraw- Hill Company.
6. 6. Gronlund, N.E. 2003. Assessment of student achievement 7th ed . Boston: Allyn and Bacon.
7. 7. Gronlund, N.E. 2004. Writing instructional objectives for teaching and learning 7th ed . New Jersey: Pearson Merrill Prentice Hall.
8. 8. Johnson, D.W. & Johnson, R.T. 2002. Meaningful assessment: A manageable and cooperative process . Boston: Allyn and Bacon.
9. 9. Kubiszyn, Tom & I. Borich, Gary. 2007. Educational testing and measurement: classroom application and practice. New Jersey: John Wiley & Sons.
10. 10. Kumari, Sarita & I. Srivastava, D.S. 2005. Education: assessment, evaluation, and remedial . New Delhi: Isha Books.
11. 11. Martin, R, Sexton, C, Wagner, K, and Gerlovich, J. 1997. Teaching science for all children. Boston: Allyn and Bacon.
12. 12. O 19Malley, J.M. & Pierce, L.V. 1996. Authentic Assessment. Virginia: Addison-Wesley Publishing Company.
13. 13. Wright, R.J. 2008. Educational assessment . Los Angeles: Sage Publications.
14. 14. Ross, Kenneth N. (ed). 2005. Quantitative research Methods in Educationl Planning, Module 6: Overview of Test Construction. Paris: International Institute for Educational Planning, UNESCO.
15. 15. Walton, John A. 2005. Educational objectives and achievement testing . New Delhi: Commonwealth.

Supporters:

Supporting lecturer	HAINUR RASID ACHMADI Dr. Titin Sunarti, M.Si. Prof. Dr. Wasis, M.Si. Woro Setyarsih, S.Pd., M.Si. Dr. Eko Hariyono, S.Pd., M.Pd. Abu Zainuddin, S.Pd., M.Pd. Prof. Nadi Suprapto, S.Pd., M.Pd., Ph.D. Mukhayyarotin Niswati Rodliyatul Jauhariyah, S.Pd., M.Pd.

Week-	Final abilities of each learning stage (Sub-PO)	Evaluation		Help Learning, Learning methods, Student Assignments, [Estimated time]		Learning materials [References]	Assessment Weight (%)
		Indicator	Criteria & Form	Offline (*offline*)	Online (*online*)		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	Understand the concepts, approaches, principles, types and functions of assessment	1.Describe measurement, assessment, and evaluation 2.Compare various approaches, principles, types and functions of assessment.	**Criteria:** -	Presentations, questions and answers, and discussions. 3 X 50			0%
2	Analyzing the implementation of assessment in schools	1.Analyzing the characteristics of assessments in the 2013 Curriculum 2.Expressing critical responses to the implementation of assessment in schools	**Criteria:** -	Assignments, presentations and discussions. 3 X 50			0%
3	Develop indicators	1.Analyzing competencies 2.Formulate indicators of competency achievement	**Criteria:** -	Exposure, assignments, discussions and presentations 3 X 50			0%
4	Developing cognitive domain assessment instruments	1.Comparing Bloom's old and revised cognitive taxonomies 2.Describe the characteristics of levels C1-C6 in the revised Bloom's taxonomy 3.Describe factual, conceptual, procedural and metacognitive knowledge 4.Comparing different thinking skills of HoTs	**Criteria:** -	Assignments and discussions. 3 X 50			0%
5	Developing cognitive domain assessment instruments	1.Create questions and scoring guidelines according to the revised Bloom's taxonomy 2.Examining cognitive domain questions	**Criteria:** -	Assignments and discussions. 3 X 50			0%
6	Developing psychomotor assessment instruments	1.Describe psychomotor taxonomy 2.Comparing psychomotor and science process skills 3.Create psychomotor assessment instruments and science process skills 4.Develop an assessment rubric	**Criteria:** -	Exposure, questions and answers, assignment 3 X 50			0%
7	Developing affective assessment instruments	1.Describe the taxonomy of the affective domain 2.Create affective assessment instruments, especially spiritual and social attitudes 3.Develop an assessment rubric	**Criteria:** -	Exposure, questions and answers, assignment 3 X 50			0%
8	UTS	-	**Criteria:** -	- 3 X 50			0%
9	Develop authentic assessments	1.Comparing traditional, alternative, performance/performance, and authentic assessments 2.Describe the advantages and disadvantages of authentic assessment 3.Create examples of authentic assessment instruments 4.Examining authentic assessment instruments	**Criteria:** -	Presentation, questions and answers, assignments, discussions 3 X 50			0%

10	Develop authentic assessments	1. Comparing traditional, alternative, performance/performance, and authentic assessments 2. Describe the advantages and disadvantages of authentic assessment 3. Create examples of authentic assessment instruments 4. Examining authentic assessment instruments	**Criteria:** -	Presentation, questions and answers, assignments, discussions 3 X 50			0%
11	Developing a scientific literacy assessment	1. Describe literacy 2. Create example questions to measure literacy 3. Examining questions to measure literacy	**Criteria:** -	Questions and answers, discussions, assignments 3 X 50			0%
12	Analyze the quality of the instrument	1. Describe validity and reliability 2. Determining the validity of assessment instruments 3. Calculating the reliability of questions, tests, and SE 4. Describe the different power, level of difficulty, and item sensitivity index 5. Calculating power difference 6. Calculate the level of difficulty 7. Calculate the item sensitivity index 8. Skilled in using question item analysis software	**Criteria:** -	Assignments, questions and answers, discussions 3 X 50			0%
13	Analyze the quality of the instrument	1. Describe validity and reliability 2. Determining the validity of assessment instruments 3. Calculating the reliability of questions, tests, and SE 4. Describe the different power, level of difficulty, and item sensitivity index 5. Calculating power difference 6. Calculate the level of difficulty 7. Calculate the item sensitivity index 8. Skilled in using question item analysis software	**Criteria:** -	Assignments, questions and answers, discussions 3 X 50			0%
14	Analyze the quality of the instrument	1. Describe validity and reliability 2. Determining the validity of assessment instruments 3. Calculating the reliability of questions, tests, and SE 4. Describe the different power, level of difficulty, and item sensitivity index 5. Calculating power difference 6. Calculate the level of difficulty 7. Calculate the item sensitivity index 8. Skilled in using question item analysis software	**Criteria:** -	Assignments, questions and answers, discussions 3 X 50			0%
15	Process and utilize assessment results	1. Processing the results of assessments in the affective, cognitive and psychomotor domains. 2. Reporting assessment results 3. Describe the use of assessment results	**Criteria:** -	Lectures, discussions, assignments 3 X 50			0%
16	UAS	-	**Criteria:** -	- 3 X 50			0%

Evaluation Percentage Recap: Project Based Learning

No	Evaluation	Percentage
		0%

Notes

1. **Learning Outcomes of Study Program Graduates (PLO - Study Program)** are the abilities possessed by each Study Program graduate which are the internalization of attitudes, mastery of knowledge and skills according to the level of their study program obtained through the learning process.
2. **The PLO imposed on courses** are several learning outcomes of study program graduates (CPL-Study Program) which are used for the formation/development of a course consisting of aspects of attitude, general skills, special skills and knowledge.
3. **Program Objectives (PO)** are abilities that are specifically described from the PLO assigned to a course, and are specific to the study material or learning materials for that course.
4. **Subject Sub-PO (Sub-PO)** is a capability that is specifically described from the PO that can be measured or observed and is the final ability that is planned at each learning stage, and is specific to the learning material of the course.
5. **Indicators for assessing** ability in the process and student learning outcomes are specific and measurable statements that identify the ability or performance of student learning outcomes accompanied by evidence.
6. **Assessment Criteria** are benchmarks used as a measure or measure of learning achievement in assessments based on predetermined indicators. Assessment criteria are guidelines for assessors so that assessments are consistent and unbiased. Criteria can be quantitative or qualitative.
7. **Forms of assessment:** test and non-test.
8. **Forms of learning:** Lecture, Response, Tutorial, Seminar or equivalent, Practicum, Studio Practice, Workshop Practice, Field Practice, Research, Community Service and/or other equivalent forms of learning.
9. **Learning Methods:** Small Group Discussion, Role-Play & Simulation, Discovery Learning, Self-Directed Learning, Cooperative Learning, Collaborative Learning, Contextual Learning, Project Based Learning, and other equivalent methods.
10. **Learning materials** are details or descriptions of study materials which can be presented in the form of several main points and sub-topics.
11. **The assessment weight** is the percentage of assessment of each sub-PO achievement whose size is proportional to the level of difficulty of achieving that sub-PO, and the total is 100%.
12. TM=Face to face, PT=Structured assignments, BM=Independent study.