	Universitas Negeri Surabaya Faculty of Education, Special Education Undergraduate Study Program	Document Code

SEMESTER LEARNING PLAN

Courses	CODE	Course Family	Credit Weight			SEMESTER	Compilation Date
Science Learning for Children with Special Needs	8620202188		T=2	P=0	ECTS=3.18	4	July 18, 2024

AUTHORIZATION	SP Developer	Course Cluster Coordinator	Study Program Coordinator
	.....	.....	Dr. H. Pamuji, M.Kes.

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

This course examines the nature of science learning for ABK, the concept of science, the implementation of science learning for ABK in special and inclusion classes. The discussion also includes providing understanding and knowledge, as well as experience, skills to students through theories, concepts, the nature of science, objectives, functions and benefits to obtain skills in the cognitive, affective and psychomotor development of ABK in participating in science learning programs for ABK both in the classroom special and in inclusion classes. Implementation of strategies, delivery techniques and assessment of science learning for children with special needs to plan, apply, modify, analyze, evaluate and complete science education for children with special needs and equip students to be able to make decisions in applying science learning for children with special needs to find alternative solutions in solving problems field of science learning for children with special needs.

References

Main :

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4. Gega, Peter.C. 1982. Science in Elementary Education. Fourth Edition . Canada: John Wiley & Sons, Inc.
5. Hamilton, R., Ghatala, E.1994. Learning and Instruction. USA: McGraw-Hill.
6. Hill, John.W, Kolb, Doris. K. 1997. Chemistry for Changing Times. New York: Prentice Hall.
7. Mastropieri,Margo A., Scruggs, Thomas E.2000. The Inclusive Classroom: Strategies for Effective Instruction. New Jersey: Prentice Hall
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9. Mehmet Sahin, Nurettin Yorek.2009. Teaching science to visually impaired students: A small-scale qualitative study. Volume 6, No. 4. US-China Education Review, ISSN1548-6613, USA
10. Miner, Dorothy L., Ron Nieman, Anne B. Swanson, and Woods, Michael.2001. Teaching Chemistry to Students with Disabilities: A manual for High Schools, Coleges, and Graduate Programs. USA: The American Chemical Society
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13. Vaughn, Sharon., Bos, Candace S., Schumm, Jeanne Shay. 2000. Teaching Exceptional, Diverse, and at-Risk Student in The General Education Classroom . United State of America: A Pearson Education Company

Supporters:

Supporting lecturer: Dr. Asri Wijiastuti, 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 competencies, descriptions, sequence of science learning course material for ABK and lecture contracts	Mentions competencies, descriptions, sequence of science learning subject material for ABK	**Criteria:** 1.4: mention and explain the 4 CPs correctly 2.3: just mention and explain correctly the 3 CPs 3.2: name and explain correctly 2 CP 4.1: mention and explain 1 CP 5.0: did not answer	· Expository Discussion 2 X 50			0%
2	· Understand the nature of Science for ABK. Understand the scope of Science Learning for ABK	· describe the nature of science for ABK. Describe the scope of Science Learning for ABK	**Criteria:** 1.4: the writing is close to the same or 300 words, and describes the nature of giftedness and the scope of education for gifted children correctly. 2.3: the writing is generally correct, only one aspect is incorrectly explained 3.2: the writing only contains two correct aspects. 4.1: writing in general does not answer commands.	· Scientific Collaborative Inquiry 2 X 50			0%
3	Describe science learning for children with visual impairments	Formulate the concept of science learning for ATN	**Criteria:** 1.4: writing close to the same or 200 words, and explaining the definition of a gifted child correctly. 2.3: the writing is generally correct, only one aspect is incorrectly explained 3.2: the writing only contains two correct aspects. 4.1: writing in general does not answer commands.	· Scientific · Direct instruction recitation 2 X 50			0%
4	Identifying science learning strategies for children with hearing impairments	· Demonstrate the characteristics of science learning for ATR	**Criteria:** 1.4: correct content and placement; 2.3: the content is correct, there is a placement error, OR the content is incorrectly placed 3.2: partially correct content, and partially correct placement 4.1: partially correct and incorrect placement OR correct placement and incorrect content.	· Scientific · inquiry 2 X 50			0%

5	· Describe science learning strategies for children with intellectual disabilities	· Formulate science learning strategies for children with intellectual disabilities	**Criteria:** 1.4: correct content, coherent/coherent, maximum length 150 words. 2.3: correct content, not coherent/coherent, maximum 150 words, 3.2: partially incorrect content, not coherent/coherent, less than 100 words long, 4.1: wrong content	· Scientific direct instruction · recitation 2 X 50			0%
6	· Describe the principles of science learning for children with autism	· Demonstrate the principles of science learning for children with autism	**Criteria:** 1.4: say completely and explain correctly 2.3: call incomplete and explain correctly 3.2: mention some and explain correctly 4.1: mention some and explain wrong	· Scientific discovery 2 X 50			0%
7	· Describe science learning strategies for children with special needs	· Prepare a science learning strategy chart for children with special needs. · Present a science learning strategy chart for children with special needs	**Criteria:** 1.4: complete and correct content and attractive appearance 2.3: the content is complete and correct, the appearance is not attractive OR the appearance is attractive but there are inaccuracies in the content 3.2: the content is partly correct, the appearance is attractive 4.1: the content is incorrect and the appearance is not attractive	· Collaborative Scientific 2 X 50			0%
8	Final ability at encounters 1 - 7	Meetings 1-7	**Criteria:** attached	Take home 2 X 50			0%
9	· Analyzing science books in elementary school about the nature of science as science, product and process · Making an analysis of the SLB science curriculum and inclusion	· Explain the nature of science as a science, process and product · Differentiate the science curriculum in inclusion and SLB	**Criteria:** 1.4: mention 2 fields and explain them correctly. 2.3: mention 2 fields, and explain what is wrong. 3.2: mentions 2 fields, explains everything wrong 4.1: call wrong and explain wrong.	· Scientific Discussion 2 X 50			0%
10	· Apply the basics and principles of a differentiated curriculum	· Develop differentiated science learning plans in inclusion classes · Analyze the content, processes and products of differentiated science learning in inclusion classes	**Criteria:** 1.4: correct according to theoretical and empirical, 2.3: theoretically correct, empirically partly incorrect; OR theoretical is partially wrong, empirical is correct, 3.2: theoretical is partly wrong, and empirical is partly wrong 4.1: theoretical is wrong, empirical is wrong	· Scientific collaborative 2 X 50			0%

11	· Criticize the concept of material science learning and its changes for ABK	· Explain the concept of material and its changes in e-learning · Analyze the effectiveness of material science learning and its changes for children with special needs	**Criteria:** 1.4: contents are complete and correct, coherent/coherent 2.3: the content is incomplete, the explanation is correct, not coherent/coherent 3.2: the content is incomplete, the explanation is partly incorrect, not coherent/coherent 4.1: content, explanation, sequence is wrong	· Scientific Discussion 2 X 50			0%
12	· Implement science learning strategies for gifted children in inclusion classes	· Describe science learning strategies for gifted children in inclusion classes · Analyze the management of the science learning environment for gifted children	**Criteria:** 1.4: contents are complete and correct, coherent/coherent 2.3: the content is incomplete, the explanation is correct, not coherent/coherent 3.2: the content is incomplete, the explanation is partly incorrect, not coherent/coherent 4.1: content, explanation, sequence is wrong	· Collaborative Scientific · inquiry 2 X 50			0%
13	· Implementing material change technology assistance for children with special needs in inclusion classes	· Explain the basics of science learning technology assistance for ABK · Analyze the key components of science learning technology assistance for ABK	**Criteria:** 1.4: contents are complete and correct, coherent/coherent 2.3: the content is incomplete, the explanation is correct, not coherent/coherent 3.2: the content is incomplete, the explanation is partly incorrect, not coherent/coherent 4.1: content, explanation, sequence is wrong	· Scientific Discussion · Inquiry 2 X 50			0%
14	· Implementing strategies for differentiation of material content and science processes for gifted children in inclusion classes	· Explain the basics of differentiation of material content and processes · Analyze the key components of the science curriculum for gifted children	**Criteria:** 1.4: contents are complete and correct, coherent/coherent 2.3: the content is incomplete, the explanation is correct, not coherent/coherent 3.2: the content is incomplete, the explanation is partly incorrect, not coherent/coherent 4.1: content, explanation, sequence is wrong	Scientific Humanistic Discussion 2 X 50			0%

15	· Design simple science tools for children with special needs · Make simple science experiment tools from used materials · Prepare K13-based science learning plans for ABK in Inclusion Classes	· Demonstrating simple experimental tools in science learning: materials and changes, Developing a K 13-based science learning plan for ABK	**Criteria:** 1. 4: complete and correct content and attractive appearance 2. 3: the content is complete and correct, the appearance is not attractive OR the appearance is attractive but there are inaccuracies in the content 3. 2: the content is partly correct, the appearance is attractive 4. 1: the content is incorrect and the appearance is not attractive	Scientific Humanistic discovery 2 X 50			0%
16							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.