Module designation	**School Curriculum Analysis** **Indonesian title:** *Analisis Kurikulum Sekolah* **Course code:** 1000002051
Semester(s) in which the module is taught	Semester 6 (Third year)
Person responsible for the module	**Coordinator:** Dr. Endah Budi Rahaju, M.Pd. **Teaching staff:** Prof. Dr. Masriyah, M.Pd.; Prof. Dr. Rini Setianingsih, M.Kes.; Dr. Endah Budi Rahaju, M.Pd.; Dr. Ismail, M.Pd.; Ika Kurniasari, S.Pd., M.Pd.; Yulia Izza El Milla, S.Pd., M.Pd.; Liza Puspita Yanti, S.Pd., MAE.
Language	Indonesian
Relation to curriculum	Compulsory
Teaching methods	Lectures, collaborative document and textbook analysis, case-based discussion, problem-based learning, and project-based learning with student presentations **Media and tools:** Slides, LCD projector, whiteboard, UNESA Learning Management System (LMS), curriculum documents and school textbooks (print and digital), GeoGebra, Desmos, Google Workspace
Workload (incl. contact hours, self-study hours)	**(Estimated) total workload:** 2 CU × 170 minutes × 16 weeks = 5,440 minutes = 90.67 hours (≈ 3.18 ECTS) **Contact hours:** lectures, 2 × 50 minutes per week × 16 weeks = 26.67 hours (class hours per week: 340 minutes = 5.67 hours, including structured activities) **Private study including examination preparation:** structured assignments, 2 × 60 minutes per week × 16 weeks = 32.00 hours; independent study, 2 × 60 minutes per week × 16 weeks = 32.00 hours (total 64.00 hours)
Credit points	2 CU (3.18 ECTS) *1 CU = 170 minutes per week × 16 weeks = 45.3 hours; 1 ECTS = 28.48 hours (144 CU = 229 ECTS), so 1 CU = 1.59 ECTS (UNESA Rector's Decree No. 736/HK/KM/2023).*
Required and recommended prerequisites for joining the module	School Curriculum
Module objectives/intended learning outcomes	**Programme learning outcomes (PLO) addressed:** • PLO-3: Develop logical, critical, systematic and creative thinking in carrying out specific work in the field of expertise and in accordance with the work competency standards in the relevant field. • PLO-6: Demonstrate mathematical knowledge and insight. • PLO-7: Demonstrate pedagogical knowledge in designing, implementing and evaluating mathematics learning. • PLO-8: Design, implement and evaluate mathematics learning using IT. • PLO-10: Make decisions based on data/information in completing tasks that are the student's responsibility and evaluating the work that has been done. **Course learning outcomes (CLO): after completing this module, students are able to:**

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- CLO-1: Critically analyse the rationale, theoretical models, policy context, and coherence of the school mathematics curriculum, including the learning progression of essential mathematical ideas across phases (PLO 3, PLO 10)
- CLO-2: Analyse how the curriculum is enacted, from the intended to the implemented and the attained curriculum, by examining teaching modules, textbooks, and classroom tasks using task analysis and cognitive demand frameworks (PLO 3, PLO 8)
- CLO-3: Evaluate the alignment among learning outcomes, instruction, and assessment (including national and international assessment frameworks) using systematic alignment methods, and make data-based decisions on curriculum quality (PLO 8, PLO 10)
- CLO-4: Design technology-supported, curriculum-based learning resources, including task sequences and hypothetical learning trajectories, that respond to the findings of a curriculum analysis (PLO 6, PLO 10)
- CLO-5: Conduct a small-scale curriculum analysis study, and communicate the findings and a curriculum improvement proposal in a written report and an oral presentation (PLO 6, PLO 7)

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<tr><td>Content</td><td>This course builds on School Curriculum and moves from knowing what the curriculum says to examining it critically with evidence. Topics are curriculum theory and models, the policy context of the national mathematics curriculum, and the coherence and learning progression of essential mathematical ideas across phases; curriculum enactment, in which the intended, implemented, and attained curriculum are examined through teaching modules, textbooks, and the cognitive demand of tasks; alignment among learning outcomes, instruction, and assessment, including national and international assessment frameworks; curriculum evaluation and data-based decision making; and the design of technology- supported task sequences and learning trajectories that respond to the findings. Learning combines document and textbook analysis, case discussions, and a small-scale curriculum analysis study that students report, present, and defend with evidence.</td></tr>
<tr><td>Examination forms</td><td>Final score is calculated from the weekly assessment scheme below (CLO/PLO addressed and weight of each assessment):
<table>
<tr><th>Week</th><th>CLO</th><th>PLO</th><th>Weight (%)</th></tr>
<tr><td>1</td><td>CLO-1</td><td>PLO-3, PLO-7</td><td>3</td></tr>
<tr><td>2</td><td>CLO-1</td><td>PLO-3, PLO-7</td><td>3</td></tr>
<tr><td>3</td><td>CLO-1</td><td>PLO-3, PLO-7</td><td>3</td></tr>
<tr><td>4</td><td>CLO-1</td><td>PLO-3, PLO-7</td><td>3</td></tr>
<tr><td>5</td><td>CLO-2</td><td>PLO-3, PLO-10</td><td>3</td></tr>
<tr><td>6</td><td>CLO-2</td><td>PLO-3, PLO-10</td><td>3</td></tr>
<tr><td>7</td><td>CLO-2</td><td>PLO-3, PLO-10</td><td>3</td></tr>
<tr><td>8</td><td>CLO-2</td><td>PLO-3, PLO-10</td><td>20</td></tr>
<tr><td>9</td><td>CLO-3</td><td>PLO-10, PLO-7</td><td>4</td></tr>
<tr><td>10</td><td>CLO-3</td><td>PLO-10, PLO-7</td><td>4</td></tr>
<tr><td>11</td><td>CLO-3</td><td>PLO-10, PLO-7</td><td>4</td></tr>
<tr><td>12</td><td>CLO-4</td><td>PLO-8, PLO-7</td><td>4</td></tr>
<tr><td>13</td><td>CLO-4</td><td>PLO-8, PLO-7</td><td>4</td></tr>
<tr><td>14</td><td>CLO-5</td><td>PLO-8, PLO-6</td><td>4</td></tr>
<tr><td>15</td><td>CLO-5</td><td>PLO-8, PLO-6</td><td>5</td></tr>
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	16	CLO-5	PLO-8, PLO-6	30

Study and examination requirements

Students are considered competent and pass if the final score, calculated from weekly tasks, document analysis reports, and participation (50%), the midterm formative examination (20%), and the project-based final formative examination (30%), is at least 55 or C.

Final index (grade conversion):

Index	Converted score	Score range (A = final score)
A	4.00	85 ≤ A ≤ 100
A-	3.75	80 ≤ A < 85
B+	3.50	75 ≤ A < 80
B	3.00	70 ≤ A < 75
B-	2.75	65 ≤ A < 70
C+	2.50	60 ≤ A < 65
C	2.00	55 ≤ A < 60
D	1.00	40 ≤ A < 55
E	0.00	0 ≤ A < 40

Reading list

1. Kementerian Pendidikan, Kebudayaan, Riset, dan Teknologi. (2024). Peraturan Menteri Pendidikan, Kebudayaan, Riset, dan Teknologi Nomor 12 Tahun 2024 tentang Kurikulum pada Pendidikan Anak Usia Dini, Jenjang Pendidikan Dasar, dan Jenjang Pendidikan Menengah.
2. Badan Standar, Kurikulum, dan Asesmen Pendidikan. (2022). Capaian pembelajaran mata pelajaran matematika pada kurikulum merdeka (current version). Kemendikbudristek.
3. Stein, M. K., Remillard, J., & Smith, M. S. (2007). How curriculum influences student learning. In F. K. Lester (Ed.), Second handbook of research on mathematics teaching and learning (pp. 319-369). Information Age Publishing.
4. Remillard, J. T., & Heck, D. J. (2014). Conceptualizing the curriculum enactment process in mathematics education. ZDM Mathematics Education, 46(5), 705-718.
5. Schmidt, W. H., McKnight, C. C., Houang, R. T., Wang, H., Wiley, D. E., Cogan, L. S., & Wolfe, R. G. (2001). Why schools matter: A cross-national comparison of curriculum and learning. Jossey-Bass.
6. Simon, M. A. (1995). Reconstructing mathematics pedagogy from a constructivist perspective. Journal for Research in Mathematics Education, 26(2), 114-145.
7. Porter, A. C. (2002). Measuring the content of instruction: Uses in research and practice. Educational Researcher, 31(7), 3-14.
8. Webb, N. L. (1997). Criteria for alignment of expectations and assessments in mathematics and science education (Research Monograph No. 6). Council of Chief State School Officers.
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	Press. 10. OECD. (2023). PISA 2022 assessment and analytical framework. OECD Publishing. 11. Mullis, I. V. S., & Martin, M. O. (Eds.). (2017). TIMSS 2019 assessment frameworks. TIMSS & PIRLS International Study Center, Boston College. 12. Ministry of Education Singapore. (2020). Mathematics syllabus: Secondary one to four. Curriculum Planning and Development Division. 13. Goos, M., Stillman, G., & Vale, C. (2007). Teaching secondary school mathematics: Research and practice for the 21st century. Allen & Unwin. 14. Sukmadinata, N. S. (2013). Pengembangan kurikulum: Teori dan praktek. Remaja Rosdakarya. 15. Sultan, A., & Artzt, A. F. (2011). The mathematics that every secondary school math teacher needs to know. Routledge. 16. Sa'diyah, M., Sa'dijah, C., & Susiswo, S. (2024). Students' ability to formulate situation mathematically from context- based mathematics problems. TEM Journal, 13(2), 1443-1451. https://doi.org/10.18421/TEM132-58