

		Universitas Negeri Surabaya Fakultas Matematika dan Ilmu Pengetahuan Alam Program Studi S1 Kimia					Kode Dokumen																																																																																																					
RENCANA PEMBELAJARAN SEMESTER																																																																																																												
MATA KULIAH (MK)		KODE	Rumpun MK	BOBOT (sks)			SEMESTER	Tgl Penyusunan																																																																																																				
Bahasa Inggris Kimia		4720102009		T=2	P=0	ECTS=3.18	1	19 Oktober 2024																																																																																																				
OTORISASI		Pengembang RPS		Koordinator RMK			Koordinator Program Studi																																																																																																					
		Dr. Maria Monica Sianita Basukiwardojo, M.Si		Dr. Nuniek Herdyastuti, M.Si			AMARIA																																																																																																					
Model Pembelajaran	Case Study																																																																																																											
Capaian Pembelajaran (CP)	CPL-PRODI yang dibebankan pada MK																																																																																																											
	Capaian Pembelajaran Mata Kuliah (CPMK)																																																																																																											
	CPMK - 1	Students have ability to utilize their ability in English, the learning resources, and ICT to support mastery of concepts of chemistry terms, chemical and chemical equipment in laboratory, and the name of chemical inorganic compounds (nomenclature) in English.																																																																																																										
	CPMK - 2	Students have ability to make connection about their knowledge of English Vocabulary, Grammar and Structure with the Chemistry concepts in written text (text books, reading passages, articles, journals).																																																																																																										
	CPMK - 3	Students have ability to utilize their ability of listening and writing strategies to understand speech, lecture, talk, and seminar spoken in English and to make good presentation in English																																																																																																										
	CPMK - 4	Students have responsibility to use their knowledge in English and Chemistry to help people in daily life honestly, and make a better world																																																																																																										
	Matrik CPL - CPMK																																																																																																											
		<table border="1"> <tr><td>CPMK</td></tr> <tr><td>CPMK-1</td></tr> <tr><td>CPMK-2</td></tr> <tr><td>CPMK-3</td></tr> <tr><td>CPMK-4</td></tr> </table>							CPMK	CPMK-1	CPMK-2	CPMK-3	CPMK-4																																																																																															
	CPMK																																																																																																											
	CPMK-1																																																																																																											
CPMK-2																																																																																																												
CPMK-3																																																																																																												
CPMK-4																																																																																																												
Matrik CPMK pada Kemampuan akhir tiap tahapan belajar (Sub-CPMK)																																																																																																												
	<table border="1"> <tr> <th rowspan="2">CPMK</th> <th colspan="16">Minggu Ke</th> </tr> <tr> <th>1</th><th>2</th><th>3</th><th>4</th><th>5</th><th>6</th><th>7</th><th>8</th><th>9</th><th>10</th><th>11</th><th>12</th><th>13</th><th>14</th><th>15</th><th>16</th> </tr> <tr><td>CPMK-1</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td>CPMK-2</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td>CPMK-3</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td>CPMK-4</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> </table>							CPMK	Minggu Ke																1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	CPMK-1																	CPMK-2																	CPMK-3																	CPMK-4																
CPMK	Minggu Ke																																																																																																											
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16																																																																																												
CPMK-1																																																																																																												
CPMK-2																																																																																																												
CPMK-3																																																																																																												
CPMK-4																																																																																																												
Deskripsi Singkat MK	Mastering the principles of scientific method, designing and conducting research, managing and communicating scientific report, both in oral and written ways by utilizing the information and communication technology. Capable to adapt to various developments in chemistry, develop and learn continuously throughout life to continue education, both formal and informal																																																																																																											
Pustaka	Utama :																																																																																																											
	1. Sianita, Maria Monica, 2016. English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA 2. Lou, Robby, 2012. English Grammar and How to Use It – Workbook 1. Jakarta: Mobile English e-plus.																																																																																																											
	Pendukung :																																																																																																											
	1. Atkins, Peter, 2011. Where would we be without Chemistry. Chemistry International, The New Magazine of the International Union of Pure and Applied Chemistry (IUPAC), vol 33 no 2, March – April 2011 2. Teaching and Learning Unit, University of Melbourne, 2010. Reading Skills, Melbourne: The University of Melbourne 3. Brown, Catrin and Ford, Mike, 2008: Standard Level Chemistry –Developed specifically for the IB Diploma, 1st ed. England: Pearson Education Limited Glaeser. ISBN:978- 0- 435994-46-4. 4. Bauer, Richard C, Birk, James P., Sawyer, Douglas J., 2001. Laboratory Inquiry in Chemistry, Canada: Brooks/ Cole. ISBN: 0-534-37694-0																																																																																																											
Dosen Pengampu	Dr. Maria Monica Sianita Basukiwardojo, M.Si. Dr. Prima Retno Wikandari, M.Si. Prof. Dr. Tukiran, M.Si. Prof. Dr. Mitarlis, S.Pd., M.Si. Dr. Rusly Hidayah, S.Si., M.Pd. Dr. Dina Kartika Maharani, S.Si., M.Sc. Bertha Yonata, S.Pd., M.Pd. Muhammad Nurrohman Sidiq, S.Si., M.Sc., Ph.D. Nurina Rizka Ramadhania, S.Si. M.Si. dr. Shod Abdurrachman Dzulkarnain, M.Biomed																																																																																																											
Mg Ke-	Kemampuan akhir tiap tahapan	Penilaian		Bantuk Pembelajaran, Metode Pembelajaran, Penugasan Mahasiswa, [Estimasi Waktu]			Materi Pembelajaran [Pustaka]	Bobot Penilaian																																																																																																				

	belajar (Sub-CPMK)	Indikator	Kriteria & Bentuk	Luring (offline)	Daring (online)		(%)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	Explaining the chemistry terms, chemicals, laboratory equipment and their usage in English based on their knowledge	1.1. Introduce the role of Chemistry in daily life 2.2. Explain the unfamiliar English words on Chemistry	Kriteria: 1.Able to Introduce the role of Chemistry in daily life 2.Able to Explain the unfamiliar English words on Chemistry Bentuk Penilaian : Aktifitas Partisipasif	case study: procons about chemistry in daily life Interactive discussion: -pro-con about chemicals - guessing the meaning of unfamiliar words especially in Chemistry 2 X 50		Materi: Understanding Chemistry in English: Group activities: Types of Learner; Guidance to read: The Unfamiliar words, Grammar: Part of Speech, Articles, Referring back; Reading Selection: Chemistry in Daily Life. Pustaka: 1. Atkins, Peter, 2011. <i>Where would we be without Chemistry. Chemistry International, The New Magazine of the International Union of Pure and Applied Chemistry (IUPAC), vol 33 no 2, March – April 2011</i>	5%
2	Explaining the chemistry terms, chemicals, laboratory equipment and their usage in English based on their knowledge	1.1. Explain the laboratory equipment on Chemistry and their usage 2.2.Using the knowledge of part of speech, articles, and referring back to analyze paragraph and sentence on chemistry text	Kriteria: 1.Able to Explain the laboratory equipment on Chemistry and their usage 2.Able to Using the knowledge of part of speech, articles, and referring back to analyze paragraph and sentence on chemistry text Bentuk Penilaian : Aktifitas Partisipasif	case study: procons about chemistry in daily life Interactive discussion: -pro-con about chemicals - guessing the meaning of unfamiliar words especially in Chemistry 2 X 50		Materi: Chemicals and Laboratory Equipment: Group activities: Recognizing Chemical equipment in Local Laboratory; Guidance to read: Reading Skill; Grammar: Word order, Types of Sentence; Reading Selection: Laboratory Equipment and their usage. Pustaka: 4. Bauer, Richard C, Birk, James P., Sawyer, Douglas J., 2001. <i>Laboratory Inquiry in Chemistry, Canada: Brooks/ Cole. ISBN: 0-534-37694-0</i>	5%
3	Explaining the chemistry terms, chemicals, laboratory equipment and their usage in English based on their knowledge	1.1Explain the laboratory equipment on Chemistry and their usage 2.Using the knowledge of part of speech, articles, and referring back to analyze paragraph and sentence on chemistry text	Kriteria: 1.Explain the laboratory equipment on Chemistry and their usage 2.Using the knowledge of part of speech, articles, and referring back to analyze paragraph and sentence on chemistry text Bentuk Penilaian : Aktifitas Partisipasif	case study: procons about chemistry in daily life Interactive discussion: -pro-con about chemicals - guessing the meaning of unfamiliar words especially in Chemistry 2 X 50		Materi: Chemicals and Laboratory Equipment: Group activities: Recognizing Chemical equipment in Local Laboratory; Guidance to read: Reading Skill; Grammar: Word order, Types of Sentence; Reading Selection: Laboratory Equipment and their usage. Pustaka: 4. Bauer, Richard C, Birk, James P., Sawyer, Douglas J., 2001. <i>Laboratory Inquiry in Chemistry, Canada: Brooks/ Cole. ISBN: 0-534-37694-0</i>	5%
4	Changing the chemical formulas into chemical names in English and vice versa based on their basic knowledge on Chemistry	1.Change the chemical formulas into chemicals names 2.Change the chemical names into chemical formulas 3.Identify the characteristics of adjective clause and adverb clause	Kriteria: 1.Able to Change the chemical formulas into chemicals names 2.Able to Change the chemical names into chemical formulas 3.Able to Identify the characteristics of adjective clause and adverb clause Bentuk Penilaian : Aktifitas Partisipasif	Interactive discussion: Naming Inorganic Compound The difference between adjective and adverb clauses Assignment 2 X 50		Materi: Naming Inorganic Compound: Group activities: Recognizing Chemicals in Daily Life; Guidance to Read: Understanding Main Idea; Grammar: Adjective and Adverb Clause; Reading Selection: Naming Inorganic Substances. Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
5	Changing the chemical formulas into chemical names in English and vice versa based on their basic knowledge on Chemistry	1.Change the chemical formulas into chemicals names 2.Change the chemical names into chemical formulas 3.Identify the characteristics of adjective clause and adverb clause	Kriteria: 1.Able to Change the chemical formulas into chemicals names 2.Able to Change the chemical names into chemical formulas 3.Able to Identify the characteristics of adjective clause and adverb clause Bentuk Penilaian : Aktifitas Partisipasif	Naming Inorganic Compound Identifying the characteristic of adjective and adverb clauses Assignment 2 X 50		Materi: Naming Inorganic Compound: Group activities: Recognizing Chemicals in Daily Life; Guidance to Read: Understanding Main Idea; Grammar: Adjective and Adverb Clause; Reading Selection: Naming Inorganic Substances. Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%

6	Changing the chemical formulas into chemical names in English and vice versa based on their basic knowledge on Chemistry	1.Change the chemical formulas into chemicals names 2.Change the chemical names into chemical formulas 3.Identify the characteristics of adjective clause and adverb clause	Kriteria: 1.Able to Change the chemical formulas into chemicals names 2.Able to Change the chemical names into chemical formulas 3.Able to Identify the characteristics of adjective clause and adverb clause Bentuk Penilaian : Aktifitas Partisipatif	Naming Inorganic Compound Assignment Assignment 2 X 50		Materi: Naming Inorganic Compound: Group activities: Recognizing Chemicals in Daily Life; Guidance to Read: Understanding Main Idea; Grammar: Adjective and Adverb Clause; Reading Selection: Naming Inorganic Substances. Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
7	Describing the process on chemistry presented as non-prose reading into reading passage and vice versa using appropriate vocabulary and grammar.	1.Describe cycles on chemistry using appropriate words 2.Change the chemical names into chemical formulas 3.Identify the characteristics of adjective clause and adverb clause	Kriteria: 1.Able to Describe cycles on chemistry using appropriate words 2.Able to Change the chemical names into chemical formulas 3.Able to Identify the characteristics of adjective clause and adverb clause Bentuk Penilaian : Aktifitas Partisipatif	Case study: Non prose reading on Chemistry topic Assignment 2 X 50		Materi: Chemical Process: Group activities: Recognizing Chemistry Process; Guidance to Read: Non-prose Reading; Grammar: Adjective clause and Adjective Phrase; Reading Selection: Cycles on Chemistry Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
8	MIDTERM TEST	Indicators from first until seventh meeting	Kriteria: Able to master Indicators from first until seventh meeting Bentuk Penilaian : Tes	MIDTERM TEST 2 X 50		Materi: Chemistry Pustaka: Brown, Catrin and Ford, Mike, 2008: <i>Standard Level Chemistry – Developed specifically for the IB Diploma, 1st ed. England: Pearson Education Limited Glaeser. ISBN:978- 0- 435994-46-4.</i>	10%
9	Applying the listening strategies to understand the chemistry topic presented orally in English.	1.Differentiate between to hear and to listen 2.Apply listening strategies to understand the content of speech, lecture, seminar 3.Identify noun clause in chemistry text	Kriteria: Able to apply listening strategies to understand the content of speech, lecture, seminar Bentuk Penilaian : Aktifitas Partisipatif	Problem Based Learning: Listening on Chemistry topic Example: Listen to chemistry song on you-tube Interactive discussion: - Noun Clause - Solubility Rules Group assignment 2 X 50		Materi: Listening Practice on Chemistry: Group activities: To Hear and To Listen; Guidance to Read: Listening Strategies; Grammar: Noun Clause; Reading Selection: Solubility Rules Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
10	Applying the listening strategies to understand the chemistry topic presented orally in English.	1.Differentiate between to hear and to listen 2.Apply listening strategies to understand the content of speech, lecture, seminar 3.Identify noun clause in chemistry text	Kriteria: 1.Able to Apply listening strategies to understand the content of speech, lecture, seminar 2.Able to Identify noun clause in chemistry text Bentuk Penilaian : Aktifitas Partisipatif	Problem Based Learning: Listening on Chemistry topic Example: Listen to chemistry song on you-tube Interactive discussion: - Noun Clause - Solubility Rules Group assignment 2 X 50		Materi: Listening Practice on Chemistry: Group activities: To Hear and To Listen; Guidance to Read: Listening Strategies; Grammar: Noun Clause; Reading Selection: Solubility Rules Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%

11	Applying the writing strategies to make short passage on Chemistry in English.	1. Able to use listening strategies, Able to understand the concept of the rules of solubility in chemistry, Able to understanding the characteristics of noun clause and identifying its presence in a sentence 2. Choose the appropriate words in chemistry based on the topic chosen and list it 3. Write a short paragraph in general topic 4. Write short paragraph on chemistry topic	Kriteria: Able to Write short paragraph on chemistry topic Bentuk Penilaian : Aktifitas Partisipasif	Problem Based Learning: - Academic writing - Presentation performing Interactive discussion: - Passive sentence - Errors in Chemistry measurement - Individual assignment 2 X 50	Materi: Writing on Chemistry Topic: Group activities: Question Words use in Writing; Guidance to Read: Writing Paragraph and doing Presentation; Grammar: Passive Sentence; Reading Selection: Errors in Chemistry Measurement Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students</i>. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA	5%
12	Applying the writing strategies to make short passage on Chemistry in English.	1. Able to use listening strategies, Able to understand the concept of the rules of solubility in chemistry, Able to understanding the characteristics of noun clause and identifying its presence in a sentence 2. Choose the appropriate words in chemistry based on the topic chosen and list it 3. Write a short paragraph in general topic 4. Write short paragraph on chemistry topic	Kriteria: Able to Write short paragraph on chemistry topic Bentuk Penilaian : Aktifitas Partisipasif	Problem Based Learning: - Academic writing - Presentation performing Interactive discussion: - Passive sentence - Errors in Chemistry measurement - Individual assignment 2 X 50	Materi: Writing on Chemistry Topic: Group activities: Question Words use in Writing; Guidance to Read: Writing Paragraph and doing Presentation; Grammar: Passive Sentence; Reading Selection: Errors in Chemistry Measurement Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students</i>. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA	5%
13	Applying the writing strategies to make short passage on Chemistry in English.	1. Able to use listening strategies, Able to understand the concept of the rules of solubility in chemistry, Able to understanding the characteristics of noun clause and identifying its presence in a sentence 2. Choose the appropriate words in chemistry based on the topic chosen and list it 3. Write a short paragraph in general topic 4. Write short paragraph on chemistry topic	Kriteria: Able to Write short paragraph on chemistry topic Bentuk Penilaian : Aktifitas Partisipasif	Problem Based Learning: - Academic writing - Presentation performing Interactive discussion: - Passive sentence - Errors in Chemistry measurement - Individual assignment 2 X 50	Materi: Writing on Chemistry Topic: Group activities: Question Words use in Writing; Guidance to Read: Writing Paragraph and doing Presentation; Grammar: Passive Sentence; Reading Selection: Errors in Chemistry Measurement Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students</i>. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA	5%

14	Utilizing the appropriate words and terms to present the chosen topic on Chemistry in English	1. Able to use writing strategies, Able to understand the concept of using visual aids and appropriate language in doing presentation, Able to calculation in measuring solution, Able to understand the characteristics and usage of passive form 2. Match the appropriate words with the action in doing presentation 3. Choose a chemistry articles to be presented	Kriteria: Able to do presentation Bentuk Penilaian : Praktik / Unjuk Kerja	Case study: Doing presentation on Chemistry topic Interactive discussion: Topic on Chemistry 2 X 50		Materi: Group presentation Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
15	Applying the knowledge of Chemistry in English to make presentation about chemistry in English	1. Able to use writing strategies, Able to understand the concept of using visual aids and appropriate language in doing presentation, Able to calculation in measuring solution, Able to understand the characteristics and usage of passive form 2. Rewrite the articles chosen on a short passage 3. Change the short passage into presentation slide 4. Present the paper	Kriteria: Able to present paper Bentuk Penilaian : Aktifitas Partisipasif, Praktik / Unjuk Kerja	Case study: Doing presentation on Chemistry topic Interactive discussion: Topic on Chemistry 2 X 50		Materi: Group presentation Pustaka: 1. Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i> Materi: https://drive.google.com/drive/folders/1-SevGp9KrMPEbXeNMMknYwwhR70veluW Pustaka: Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i>	5%
16	UAS	utilize their ability in English, the learning resources, and ICT to support mastery of concepts of chemistry	Kriteria: Able to utilize their ability in English, the learning resources, and ICT to support mastery of concepts of chemistry Bentuk Penilaian : Tes	paper and pencil test 2 X 50		Materi: English for chemistry Pustaka: Sianita, Maria Monica, 2016. <i>English for Chemistry Students. Surabaya: FMIPA UNIVERSITAS NEGERI SURABAYA</i> Materi: English Grammar Pustaka: Lou, Robby, 2012. <i>English Grammar and How to Use It – Workbook 1. Jakarta: Mobile English e-plus.</i> Materi: Chemistry Pustaka: Atkins, Peter, 2011. <i>Where would we be without Chemistry. Chemistry International, The New Magazine of the International Union of Pure and Applied Chemistry (IUPAC), vol 33 no 2, March – April 2011</i>	20%

Rekap Persentase Evaluasi : Case Study

No	Evaluasi	Persentase
1.	Aktifitas Partisipasif	62.5%
2.	Praktik / Unjuk Kerja	7.5%
3.	Tes	30%
		100%

1. **Capaian Pembelajaran Lulusan Prodi (CPL - Prodi)** adalah kemampuan yang dimiliki oleh setiap lulusan prodi yang merupakan internalisasi dari sikap, penguasaan pengetahuan dan ketrampilan sesuai dengan jenjang studinya yang diperoleh melalui proses pembelajaran.
2. **CPL yang dibebankan pada mata kuliah** adalah beberapa capaian pembelajaran lulusan program studi (CPL-Prodi) yang digunakan untuk pembentukan/pengembangan sebuah mata kuliah yang terdiri dari aspek sikap, ketrampilan umum, ketrampilan khusus dan pengetahuan.
3. **CP Mata kuliah (CPMK)** adalah kemampuan yang dijabarkan secara spesifik dari CPL yang dibebankan pada mata kuliah, dan bersifat spesifik terhadap bahan kajian atau materi pembelajaran mata kuliah tersebut.
4. **Sub-CPMK Mata kuliah (Sub-CPMK)** adalah kemampuan yang dijabarkan secara spesifik dari CPMK yang dapat diukur atau diamati dan merupakan kemampuan akhir yang direncanakan pada tiap tahap pembelajaran, dan bersifat spesifik terhadap materi pembelajaran mata kuliah tersebut.
5. **Indikator penilaian** kemampuan dalam proses maupun hasil belajar mahasiswa adalah pernyataan spesifik dan terukur yang mengidentifikasi kemampuan atau kinerja hasil belajar mahasiswa yang disertai bukti-bukti.
6. **Kriteria Penilaian** adalah patokan yang digunakan sebagai ukuran atau tolok ukur ketercapaian pembelajaran dalam penilaian berdasarkan indikator-indikator yang telah ditetapkan. Kriteria penilaian merupakan pedoman bagi penilai agar penilaian konsisten dan tidak bias. Kriteria dapat berupa kuantitatif ataupun kualitatif.
7. **Bentuk penilaian:** tes dan non-tes.
8. **Bentuk pembelajaran:** Kuliah, Responsi, Tutorial, Seminar atau yang setara, Praktikum, Praktik Studio, Praktik Bengkel, Praktik Lapangan, Penelitian, Pengabdian Kepada Masyarakat dan/atau bentuk pembelajaran lain yang setara.
9. **Metode Pembelajaran:** Small Group Discussion, Role-Play & Simulation, Discovery Learning, Self-Directed Learning, Cooperative Learning, Collaborative Learning, Contextual Learning, Project Based Learning, dan metode lainnya yg setara.
10. **Materi Pembelajaran** adalah rincian atau uraian dari bahan kajian yg dapat disajikan dalam bentuk beberapa pokok dan sub-pokok bahasan.
11. **Bobot penilaian** adalah prosentasi penilaian terhadap setiap pencapaian sub-CPMK yang besarnya proposional dengan tingkat kesulitan pencapaian sub-CPMK tsb., dan totalnya 100%.
12. TM=Tatap Muka, PT=Penugasan terstruktur, BM=Belajar mandiri.

RPS ini telah divalidasi pada tanggal 1 Maret 2024

Koordinator Program Studi S1 Kimia

UPM Program Studi S1 Kimia



AMARIA
NIDN 0029066401



NIDN 0023089106

File PDF ini digenerate pada tanggal 6 Desember 2025 Jam 16:31 menggunakan aplikasi RPS-OBE SiDia Unesa

