

KEMENTERIAN PENDIDIKAN, KEBUDAYAAN, RISET, DAN TEKNOLOGI UNIVERSITAS NEGERI YOGYAKARTA

UNIVERSITAS NEGERI YOGYAKAKTA FAKULTAS MATEMATIKA DAN ILMU PENGETAHUAN ALAM

Kampus Karangmalang Yogyakarta 55281

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KEPUTUSAN DEKAN FAKULTAS MATEMATIKA DAN ILMU PENGETAHUAN ALAM Nomor: B/27/UN.34.13/HK.03/2023

TENTANG

TUGAS MENGAJAR DAN MENGUJI DOSEN SEMESTER GENAP TAHUN AKADEMIK 2022/2023

DEKAN FAKULTAS MATEMATIKA DAN ILMU PENGETAHUAN ALAM

Menimbang:

bahwa untuk pelaksanaan tugas pendidikan dan pengajaran pada semester Genap Tahun Akademik 2022/2023, perlu menetapkan Keputusan Dekan tentang **Tugas Mengajar dan Menguji Dosen Mata Kuliah** semester Genap Tahun Akademik 2022/2023;

Mengingat

- Undang-undang Nomor 1 Tahun 2004 tentang Perbendaharaan Negara (Lembaran Negara Rebublik Indonesia Tahun 2004 Nomor 5, Tambahan Lembaran Negara Republik Indonesia Nomor 4355;
- Undang-undang Nomor 12 Tahun 2012 tentang Pendidikan Tinggi (Lembaran Negara Republik Indonesia Tahun 2012 Nomor 158, Tambahan Lembaran Negara Republik Indonesia Nomor 5336);
- Peraturan Pemerintah Nomor 4 Tahun 2014 tentang Penyelenggaraan Pendidikan Tinggi dan Pengelolaan Perguruan Tinggi (Lembaran Negara Tahun 2014 Nomor 16, Tambahan Lembaran Negara Republik Indonesia Nomor 5500);
- Peraturan Pemerintah Nomor 35 Tahun 2022 tentang Perguruan Tinggi Badan Hukum Universitas Negegri Yogyakarta (Lembaran Negara Republik Indonesia Tahun 2022 Nomor 207, Tambahan Lembaran Negara Republik Indonesia Nomor 6823);
- Keputusan Menteri Pendidikan dan Kebudayaan Nomor 6723/MPK/RHS/KP/ 2021 tentang Pengangkatan Rektor Universitas Negeri Yogyakarta Periode Tahun 2021-2025;
- 6. Peraturan Rektor Universitas Negeri Yogyakarta Nomor 15 Tahun 2022 tentang Organisasi dan Tata Kerja Universitas Negeri Yogyakarta;

MEMUTUSKAN:

Menetapkan

KEPUTUSAN DEKAN TENTANG TUGAS MENGAJAR DAN MENGUJI DOSEN SEMESTER GENAP TAHUN AKADEMIK 2022/2023

KESATU

Dosen yang namanya sebagaimana dimaksud dalam Lampiran merupakan dosen tetap Fakultas Matematika dan Ilmu Pengetahuan Alam Universitas Negeri Yogyakarta yang diserahi Tugas Mengajar dan Menguji pada Semester Genap Tahun Akademik 2022/2023;

KEDUA

Dosen yang namanya tersebut sebagaimana dimaksud dalam diktum kesatu

mengampu dan menguji mata kuliah program studi masing-masing sebagaimana

dimaksud dalam Lampiran;

KETIGA

Biaya yang diperlukan dengan adanya Keputusan ini dibebankan pada

Anggaran RKA-UKPK UNY Tahun 2023;

KEEMPAT

Keputusan Rektor ini berlaku pada tanggal 30 Januari 2023 sampai dengan 8 Juni

2023

TEMBUSAN Keputusan Dekan ini disampaikan kepada:

- 1. Rektor UNY:
- 2. Para Wakil Dekan di FMIPA UNY;
- 3. Para Koorprodi di FMIPA UNY;
- 4. Kepala Layanan Administrasi di FMIPA;
- 5. Sekretaris Layanan Administrasi di FMIPA UNY:
- 6. Bendahara Gaji FMIPA UNY;
- 7. Yang bersangkutan untuk diketahui dan dilaksanakan;

Ditetapkan di Yogyakarta

Pada tanggal, 30 Januari 2023

DEKAN FAKULTAS MATEMATIKA DAN ILMU

PENGETAHUAN ALAM

Prof. Dr. Ariswan, M.Si

NIP. 19590914 198803 1 003%

Lampiran SK Dekan FMIPA UNY

Nomer

B/27/UN34.13/HK.03/2023

Tanggal

30 Januari 2023

DAFTAR TUGAS MENGAJAR DAN MENGUJI DOSEN FAKULTAS MATEMATIKA DAN ILMU PENGETAHUAN ALAM - UNIVERSITAS NEGERI YOGYAKARTA SEMESTER GENAP TAHUN AKADEMIK 2022/2023

Nama NIP : Prof. Dr. Hari Sutrisno, M.Si.

Pangkat

: 196704071992031002 : Pembina Utama Madya

Golongan

: IV/d

Jabatan

: Guru Besar

NPWP

: 25.301.586.1-542.000

No	Kode MK	Mata Kuliah	SKS Matakuliah	Sem	Prodi	Rombel	Jenis	SKS Rombel	Beban Mengajar	Jumlah Peserta	Keterangan
1	MPK6344	Kimia Anorganik Non Logam	3	2	PEND. KIMIA - S1	A	Teori	2	1,00	45	TIM
2	KIM6235	Teknologi Nanokimia	2	6	KIMIA - SI	PIL	Teori	2	2,00	33	
3	MPK6344	Kimia Anorganik Non Logam	3	2	PEND. KIMIA - S1	С	Teori	2	1,00	43	TIM
4	MPK6344	Kimia Anorganik Non Logam	3	2	PEND. KIMIA - S1	A2	Praktik	1	1,00	16	
5	MPK8206	Kimia Struktur Anorganik	2	1	PENDIDIKAN KIMIA - S2	52 C	Teori	2	2,00	16	
6	FMI8303	Metodologi Penelitian Pendidikan	3	1	PENDIDIKAN KIMIA - S2	52 C	Teori	3	3.00	16	
7.	MPK8206	Kimia Struktur Anorganik	2	1	PENDIDIKAN KIMIA - S2	RPL	Teori	2	2,00	8	(110
8	FMI8303	Metodologi Penelitian Pendidikan	3	1	PENDIDIKAN KIMIA - S2	RPL	Teori	3	3,00	14	
9	MPK9208	Topik Khusus dalam Kimia Anorganik dan Kimia Fisik	2	1	PENDIDIKAN KIMIA - S3	S3_PK	Teori	2	1,00	2	TIM
						lumla	h Rehan	Mennaiar	16:00 SKS	SUDAY	

Dekan,

Prof. Dr. Ariswan, M.Si.

NIP, 195909141988031003

Appendix:

MCE 2.2.2.c Example of a Module Handbook



UNIVERSITAS NEGERI YOGYAKARTA GRADUATE SCHOOL MASTER OF EDUCATION IN CHEMISTRY

MODULE HANDBOOK

COURSE		CODE	COURSE GROUP	CREDIT UNIT (sks)	SEM.	DEVELOPMENT DATE
Inorganic Strue Chemistry		KIM8207	Master of Education in Chemistry	2	1	May 29, 2019
Authorization	on	Course Lecturer Prof. Dr. Hari Sutrisno, I	M.Si.			Head of Study Program Prof. Dr. Hari Sutrisno, M.Si.
	Le	arning Outcomes (LO) -				,
Learning Outcomes	Attitude and Value	social sensitivity LO2. Respect to the opinions/ finding LO3. Upholding the rucommunity. LO4. Enabling to inte	and high concern for the condiversity of cultures, views, but and love the country and sulle of law and having the spir	nmunity and it eliefs, and reli upport world p it to prioritize t spirit, academ	s environr gions as v eace as c the interes ic values	well as other people's original itizens sts of the nation and the wider and norms that are properly

	Work Ability	 LO5. Implementing and developing knowledge and technology in the field of chemistry education through reasoning and scientific research based on logical, critical, systematic, and creative thinking. LO6. Developing chemistry education through scientific research, or producing scientific works along with study concepts based on scientific rules arranged in the form of a thesis. LO7. Publishing the results of research in the field of chemistry education in scientific journals nationally and internationally accredited. LO8. Increasing the capacity of independent learning. LO9. Having structured learning skills for self-development, science, and career sustainability. LO10. Enabling to think critically, make informed decisions, and communicate effectively, academically, and ethically. 					
	Knowledge Assignment	 O11. Documenting, storing, auditing, securing, and rediscovering research data for further research purposes. O12. Identifying the scientific field of the research object and positioning it into a research map. O13. Carrying out chemistry education research based on research maps, with an inter- or multi-disciplinary approach, independently or in collaboration with other institutions. 					
	Authority and Responsibility	 LO14. Developing and maintaining networks with colleagues, including in the broader research institutions and communities. LO15. Arranging and communicating ideas and arguments that can be scientifically accountable and academic ethics, through various forms of media to the community, especially the academic community. 					
	Cour	se Outcames					
	CO1	Demonstrate an awareness of responsible and ethical conducts as well integrity in the context of their profession and obligations to society					
	CO2	Demonstrate knowledge of advanced theories and methods of chemistry					
Courses	CO3	Demonstrate proficiency in analyzing, applying, and solving engineering problems using the acquired chemical methods.					
Course Outcames	CO4	Demonstrate the problem solving ability in understand, extract and analyze engineering problems and reorganize the knowledge in chemistry forms for specific purposes					
	CO5	Ability to convey ideas on chelistry knowledge clearly and effectively in both written and spoken forms. In addition, ability to work collaboratively as part of a team undertaking a range of different team roles					
	CO6	Demonstrate the awareness of contemporary issues in Inorganic chemistry and the ability to respond the challenges					

	CO7 Ability to pursue independent study and demonstrate the awareness for lifelong learning and professional development							
Short Description of Course	Inorganic Structurale Chemistry courses are courses for students of Master of Education in Chemistry will descriptions including: chemical structure description, symmetry and molecular groups, chemical bonds and latter energy, molecular structures 1 (compounds of the main group elements) and 2 (transition metal compounds crystal gratings, symmetry and groups crystals, X-ray diffraction instruments and determination of simple crystatructures. This course aims to enable students to understand the structure and grid contained in molecular compounds 1 and 2.							
Learning Materials / Subjects	Subjects include: 1. Description of chemical structure 2. Theory of repulsion of valence electron pairs 3. Symmetry and molecular groups 4. Chemical bonds and lattice energy 5. Atom size size 6. Symmetry and crystal groups 7. Molecular structure 1: compounds of the main group elements 8. Molecular structure 2: transition metal compounds 9. Structure of nonmetal elements 10. X-ray diffractometer 11. Determination of simple crystal structure							
References	 Primary P1. Muller, U., (2006). Inorganic Structural Chemistry, second edition. West Sussex: John Wiley & Sons Ltd P2. Huheey, J. E., Keiter, E. A. & Keiter, R. L. (1993). Inorganic Chemistry: Principle of Structure and Reactivity. New York: Harper Collins College Publisher. P3. Li, W. K., Zhou, G. D. & Wai Mak, T. C. (2008). Advanced Structural Inorganic Chemistry. New York: Oxford Science Publication P4. Miessler, G. L. & Tarr, D. A. (2009). Inorganic Chemistry, third edition. New Delhi: Pearson Education. Support S1. West, A. R. (1989). Solid State Chemistry and Its Applications. Singapore: John Wiley & Sons Ltd. S2. Journal Inorganic Chemistry 							
Instructional	Software Hardware Laptop							
Media	File dan Powerpoint Board and stationery Projector							
Team- Teaching	-							
Prerequisite Course								

LEARNING ACTIVITIES

Week	Sub-CO	Indicator	Criteria & Form of Assessment	Learning Method (Estimated Time)	Learning Materials (Library)	Quality of Ass. (%)
1	Describe chemical structure and symmetry	 Students can describe chemical structures Students are able to explain the symmetry of a chemical compound 	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction 2 x 50 minute	P1, P2, P3	2%
2-3	Analyze polymorphism and the phase of transition from chemical compounds	Students are able to analyze the polymorphism and transition phase of various chemical compounds	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction 4 x 50 minute	P1, P2	2%
4-5	Analyzing chemical bonds and lattice energy contained in chemical compounds	Students are able to analyze chemical bonds and lattice energy that occur in various chemical compounds	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction 2 x 50 minute	P1, P4	2%
6-7	Explain atomic size effects	 Students are able to explain the definition of atomic size effects Students can explain the factors that influence the size effect of an atom 	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction 2 x 50 minute	P1, P3, P4	2%
8	Midterm Exam					40%
9-10	Analyze the molecular structure in group 1: compounds of the main group elements	Students are able to analyze group theory contained in the compounds of the main group elements	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction Individual task 6 x 50 minute	P1, P2, P3	2%

11-12	Analyzing the molecular structure of group 2: transition metal compounds	Students are able to analyze group theory contained in the compounds of the main group elements	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction Individual task 4 x 50 minute	P1, P3	2%		
13	Analyze the structure of nonmetal elements	Students are able to analyze chemical structures not metals Students are able to analyze group theory and lattice found in nonmetal compounds	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction Individual task 4x 50 minute	P1, P3, S1	4%		
14-15	Analyze structures like diamonds	Students are able to analyze chemical structures not metals Students are able to analyze group theory and lattice found in nonmetal compounds	Assessment Criteria: logic and meaningfulness Form of assessment: Observation with the class Observation rubric	Direct Instruction Individual task 4 x 50 minute	P1, S1	4%		
16	Final Exams							

ASSESSMENT WEIGHT

No	Course Outcames	Object of assessment	Valuation Techniques	Quality					
1	CO 3	The independent task of writing and / or listening skills	Assignment	15%					
2	CO 5 dan 7	Structured tasks are reading and / or writing skills	Assignment	15%					
3	CO 3, 4	Speaking ability and presentation skills journal analysis (Skills)	Speaking ability	10%					
4	CO 1 dan 2	Attitude and Value	Observation of Attitude	10%					
5	CO 3, 5 dan 6	Midterm Exam	Written Test	25%					
6	CO 3; 6; dan 7	Final Exam	Written Test	25%					
	Total								

LO AND CO MAPPING

							L	earning.	Outco	mes (LC)					
		A	ttitude a	and Vali	ue			Work	Ability			Know Assig	ledge nment	Autho and Respo ity	ority Onsibil	
		LO1	LO2	LO3	LO4	LO5	LO6	LO7	LO8	LO9	LO10	LO11	LO12	LO13	LO14	LO15
Course	Course : KIM8207 - Inorganic Sructural Chemistry															
	CO1			$\sqrt{}$	$\sqrt{}$											
ဟ	CO2					V										
se	CO3		V							V						
Course	CO4				V							V				
Course Outcames	CO5		√					V			V		√			
0	CO6								V			V				
	CO7															V

Knowing, Head of Study Program Yogyakarta, May 29, 2019 Lecturer

Prof. Dr. Hari Sutrisno, M.Si NIP 196704071992031002 Prof. Dr. Hari Sutrisno, M.Si NIP 196704071992031002

ANALYSIS OF ACHIEVEMENT CO / LO

Study Program : Master of Education in Chemistry

Course : Inorganic Structural Chemistry Code: KIM8207 Credit Unit (sks): 2 (Teory)

Semester : 1 Prerequisite Course : -

Course Lecturer : Prof. Dr. Hari Sutrisno, M.Si

A. TABLE OF OF ACHIEVEMENT CO

Task/ Exam	CO 1	CO 2	CO 3	CO 4	CO 5	CO 6	CO 7
Structured Tasks 1					80	75	
Structured Tasks 2				84			85
Independent task 1			80				
Independent task 2					80		
Skills			80				
Attitude	85	86					
Midterm Exam				72			
Final Exam				78	80	80	
AVERAGE	85	86	80	76	80	77,5	85

B. TABLE OF OF ACHIEVEMENT LO

	CO 1	CO 2	CO 3	CO 4	CO 5	CO 6	CO 7	AVERAGE
LO 1	85							85
LO 2					82			82
LO 3	85							85
LO 4	85			76				78
LO 5			82					82
LO 6			86					86
LO 7					75	80		82,5
LO 8		76				80		78
LO 9		80	78					79
LO 10					80			80
LO 11				75		80		82,5
LO 12					75		76	75,5
LO 13						76		76
LO 14				80				80
LO 15							80	80
AVERAGE								80.77

FORM PENILAIAN

PROGRAM STUDI : PENDIDIKAN KIMIA - S2

MATAKULIAH : MPK8206 - Kimia Struktur Anorganik

PENGAMPU : Prof. Dr. Hari Sutrisno M.Si.

JUMLAH PESERTA : 16 : S2_C KELAS

SEMESTER Genap TAHUN 2022

NO	NIM	NAMA	NILAI [HURUF]
1	22328251034	Rasamimanana Joronavalona	A-
2	22328251035	Mizzan Ayubi	B+
3	22328251036	Alessandro Jeremi Manarisip	B+
4	22328251037	Dwiani Ratna Sari	A-
5	22328251038	Mikelin Ardania	B+
6	22328251039	Rabiatul Adawiyah	B+
7	22328251040	Syaza Syahana	A-
8	22328251041	Meliana Fajri Nurkhasanah	A-
9	22328251042	Muhammad Akbar Chaniago	A-
10	22328251043	Hana'Fadhilah Retiyanto	B+
11	22328251044	Habibil Mazid	A-
12	22328251045	Vegha Dwi Arthamena	B+
13	22328251046	Sarmila Eka Putri	B+
14	22328251047	Lisya Asmiati	B+
15	22328251048	Elma Pujiana	B+
16	22328251049	Muhammad Habib Ash Shiddiqi	B+

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Rekap Nila	i : A =	, B =	, C =	. , D =	. , E/K =
Yogyakarta	a ,				

Dosen/Koord. Team Penguji:

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