

Module Handbook

Module Name:	Organometallic Compounds
Module Level:	Bachelor
Abbreviation, if applicable:	KII 302
Sub-heading, if applicable:	-
Courses included in the module, if applicable:	-
Semester/term:	5 TH / Third Years
Module coordinator(s):	Harsasi Setyawati, S.Si, M.Si
Lecturer(s):	Ahmadi Jaya Permana, S.Si, M.Si
Language:	BahasaIndonesia
Classification within the curriculum	Compulsory Course / Elective Studies
Teaching format / class hours per week during semester:	2 hours lectures (50 min / hour)
Workload:	2 hours lectures, 2 hour structural activities, 2hours individual study, 13 week per semester, and total 78hours per semester ~ 2.6 ECTS *
Credit Points:	2 SCU
Requirements:	Inorganic Chemistry II
Learning goals/competencies:	<p>General Competence (knowledge) : Being able to conclude on overall organic metal compounds properly.</p> <p>Specific Competence :</p> <ol style="list-style-type: none"> 1. Be able to explain the history and development of the Organometallic Compound, ligand nomenclature and name, formation theory, the basic theory of the synthesis and reactions Organometallic Compound, Isolobal & Cluster, Institute of Metals in Organometallic Compound, Organometallic Compound characterization, application Organometallic Compound. 2. Able to calculate the number of electrons in the Organometallic Compound using rule 18
Content:	On this subject will be discussed about the ligands, nomenclature, the theory of the formation of organic metal compounds, synthesis and reactions of organic metal compounds including catalysis and reaction isolobal, characterization and application of organic metal compounds.
Attribut soft skill	Good communication, Confidence
Study/exam achievements:	<p>Students are considered to be competent and pass if at least get 55</p> <p>The final value is calculated as follows: 20% + 10% softskill assignment + middle exams (UTS) 35% + final exams (UAS) 35%</p> <p>Table Value Graduation</p> <p>A: 100> NA≥75 AB: 74,9≥NA≥70 B: 69,9≥NA≥65 BC: 64,9≥NA≥60 C: 59,9≥NA≥55 D: 54,9≥NA≥40</p>

	E: 39,9≥NA
Forms of Media:	Slides and LCD projectors, whiteboards
Learning Methods	Lectures, assignment, group discussion
Literature:	<ol style="list-style-type: none"> 1. Miessler, G.L., Fischer, P.J., and Tarr, D.A., 2014, Inorganic Chemistry 5th ed, Prentice Hall, International Inc., New Jersey 2. Crabtree, H., R, 2009, <i>The Organometallic Chemistry of the transition metals</i>, John Wiley & Sons, USA 3. Huheey, J. E., Keiter, E. A. and Keiter, R. L., 1993, Inorganic Chemistry, Principles of Structure and Reactivity, 4th ed., Harper and Publisher, New York 4. Powell, P., 1988, <i>Principles of Organometallic Chemistry</i>, 2nded, Chapman & Hall, London <p>Pearson, A.J., 1985, <i>Metallo-organic Chemsitry</i>, John Wiley & Sons, Chichester</p>
Notes:	<p>*Total ECTS = {(total hours workload x 50 min) / 60 min } / 25 hours</p> <p>Each ECTS is equals with 25 hours</p>