Module Handbook

Module Name:	Solid Preparation Pharmaceutics
Module Level:	Bachelor
Abbreviation, if applicable:	Lecture FAF202
	Practical Work FAF207
Sub-heading, if applicable:	
Courses included in the module, if applicable:	
Semester/term:	1 / Third year
Module coordinator(s):	Dr. Dwi Setyawan, Apt
Lecturer(s):	Dr.rer.nat ML. Ardhani L, Apt
	Helmy Yusuf, PhD., Apt
	Dr. Dwi Setyawan, Apt
Language:	Bahasa Indonesia
Classification within the curriculum:	Compulsory Course/~~Elective Studies~~
Teaching format/class hours per week during the semester:	Lecture 100 minutes lectures, 13 lecture classes/semester
	Practical Work 200 minutes practical work classes, 13 practical work classes /semester
Workload:	Lecture Total 22 hours a semester
	Practical Work Total 43 hours a semester
Credit Points:	Lecture 2
	Practical Work 2
Requirements:	Physical Pharmacy (FAT201) and Practical Work of Physical Pharmacy (FAT206).
Learning goal/competencies:	Knowledge – To understand the concept of pharmaceutics solid dosage form and Pharmaceutics solid dosage form practice.
	Skills – Disciplin, emphaty, communication, honest, teamwork, accuracy, leadership, making a right decission and initiative.
	Competence – To understand and able to apply the concept of making a pharmaceutics solid dosage form including unit process in production such us resize particle, mixing, granulating, drying and compressing, also formulation and evaluation of tablet, capsule, coated tablet, sustained release. – To understand and able to apply the concept of how to design formulas, manufacturing processes, in-process testing, quality testing of finished products, how to resolve issues that arise during the

	manufacturing process, and packaging of solid dosage.
Content:	Lecture Pharmaceutics Solid Dosage Form discuss about the concept of making a pharmaceutics solid dosage form including unit process in production such us resize particle, mixing, granulating, drying and compressing, also formulation and evaluation of tablet, capsule, coated tablet, sustained release.
	Practical Work Pharmaceutics Solid Dosage Form discuss about the concept of making a pharmaceutics solid dosage form including unit process in production such us resize particle, mixing, granulating, drying and compressing, also formulation and evaluation of tablet, capsule, coated tablet, sustained release.
Study/exam achievements:	Lecture Student are considered to be competent and pass if at least get 50% of maximum mark of the exams based learning. Final score is calculated as follow : 50% Exam I + 50% Exam II Final index is defined as follow : A : ≥ 75 AB : 70 – 74,9 B : 65 – 69,9 BC : 60 – 64,9 C : 55 – 59,9 D : 40 – 54,9 E : <40
	Practical Work Student are considered to be competent and pass if at least get 50% of maximum mark of the exams based learning. Final score is calculated as follow : 45% Exam I + 45% Exam II + 10% soft skill Final index is defined as follow : A : ≥ 75 AB : 70 – 74,9 B : 65 – 69,9 BC : 60 – 64,9 C : 55 – 59,9 D : 40 – 54,9 E : <40
Forms of Media:	Journal, experimental tools, experimental materials.
Literature:	1. J.T Carstensen, Ping Ching Can. 1977. Flow Rate and Repose Angles of Wet Process Granulation . J.Pharm.Sci., 66, p.1235-1328/1977
	2. D.Ganderton. 1968. Unit Processes in Pharmacy. William Heinemann Medical Book Ltd.

	3. W.A.Hanson. 1991. Handbook of Dissolution Testing. 2nd Edition/ Aster Publishing Corp./1991
	4. L.Lachman. 1986. The Theory and Practice of Industrial Pharmacy. 3 rd Edition/ Lea &Febiger/1986
	5. H.A. Lieberman, L.Lachman . 1981. Pharmaceutical Dosage Forms; Tablets. Volume 1, 2, 3/ Marcell Dekker Inc./1981
	6. K. Ridgway. 1987. Hard Capsules. The Pharmaceutical Press/1987
	7. H. Sucker. 1982. Test Methods for Granulates. Pharm. Ind., 44, Nr. 3, p. 312 –316./1982
	8. J.T. Wells. 1988. Pharmaceutical Preformulation; The Physicochemical Properties of Drug Substances. Ellis Horwood Ltd./1988
	9. S.J Carter. 1973. Cooper's and Gunn Tutorial Pharmacy. Pitman Medical /1973
	10. J.N Staniforth. 1982. Advances in Powder Mixing and Segregation in relation to pharmaceutical Process. Int. J. Pharm. Tech. Prod. Mfr,3 (Supl) / 1982
	11. J.E Rees. 1975. Mixing as a criterion in Process Development. Manufacturing Chemist &Aerosol tcews (12)/1975
	12. Diliph M Parikh. 1997. Handbook of Pharmaceutical Granulation. Marcel Dekker/1997
	13. Michael E. Aulton. 1988. Pharmaceutical : The Science of Dosage Forms. Churchill Livingstone/1988
	14. G.S Banker, C.T Rhodes. 2002. Modern Pharmaceutics. Marcel Dekker/2002
	15. James Swarbrick. 2007. Encyclopedia of Pharmaceutical Technology. Informa Healthcare
	16. J. Heler. 1987. Use of Polymers in Controlled Release of Active AgentControlled Drug Delivery Fundamentals and Application.
	17. H.W Hui, J.R Robinson. 1987. Design and Fabrication of Oral Controlled Release Drug Delivery System in Controlled Drug Delivery Fundamentals and Application.
	18. Graham Cole. 1995. Pharmaceutical Coating Technology. Taylor and Francis
	19. James W McGinity. 1989. Aqueous Polymeric Coating for Pharmaceutical Dosage Forms. Marcel Dekker
	20. United States Pharmacopoeial Convention. 2009. USP 32 NF 27. United States Pharmacopoeial Convention
	21. Departemen Kesehatan Republik Indonesia. 2015. Farmakope Indonesia V. Departemen Kesehatan RI
	22. J.T Carstensen, Ping Ching Can. 1977. Flow Rate and Repose Angles of Wet Process Granulation . J.Pharm.Sci., 66, p.1235-1328/1977
Notes:	