

**PHYTOTHERAPY**

Module designation	<i>Phytotherapy</i>
Semester(s) in which the module is taught	2
Person responsible for the module	1. Prof. Dr. Mangestuti Agil, M.S., Apt. ( <b>Course Coordinator</b> ) 2. Prof.Dr. Sukardiman., MS., Apt. 3. Prof. Dr. Bambang Prajogo E.W, MS., Apt. 4. Dr. Wiwied Ekasari, M.Si., Apt
Language	<i>Bahasa Indonesia</i>
Relation to curriculum	<i>Compulsory / elective / specialisation</i>
Teaching methods	<i>lecture, discussion, assignment</i>
Workload (incl. contact hours, self-study hours)	<i>(Estimated) Total workload: Contact hours (structured activities.): 90,67 hours Private study including independent learning activities: 90,67 hours</i>
Credit points	<i>2 SCU / 6 ECTS</i>
Required and recommended prerequisites for joining the module	NA

Module objectives/intended learning outcomes	<p>Students are:</p> <p>LO1: Able to realize excellence based on religious morals (excellence with morality), able to work together, and show a responsible attitude to work in their field of expertise independently</p> <p>LO2: Able to internalize the spirit of independence, struggle, and entrepreneurship</p> <p>LO4: Able to develop a pharmaceutical professional performance with analytical acumen in solving pharmaceutical problems and managing research in the pharmaceutical field related to national and global systems and policies, both inter and inter-disciplinary approaches.</p> <p>LO5: Able to access and review information through an Information and Communication Technology (ICT) system, decide on a specific subject of study, maintain the feasibility of implementing research designs, conduct research, analyze data, conclude research results comprehensively, and create strategic issues based on the study that reflect the latest updates in the field of pharmaceutical sciences, and communicate them in the media and scientific forums at the national and international level through an interdisciplinary or multidisciplinary approach in the form of a thesis or other equivalent forms.</p> <p>LO7: Able to analyze natural materials to obtain active ingredients and/or pharmaceutical excipients with due observance of nature conservation.</p> <p>LO9: Able to carry out molecular manipulation of substances and develop formulations and manufacturing of pharmaceutical preparations with active pharmaceutical ingredients derived from natural products and synthetic compounds through the manufacture of polymorphs, nanoparticles, solid dispersions.</p> <p>LO14: Able to build drug management systems from active pharmaceutical ingredients to finished products that are ready for therapeutic uses.</p>
Content	The material given face-to-face includes the notion of phytotherapy, approaches to using medicinal plants for nutraceuticals, reproductive tract, cancer prevention, metabolic disorders, adaptogenic agents, immune agents, central nervous system, anti-inflammatory, infectious diseases, gastrointestinal tract.
Exams and assessment formats	<i>Take-home assignment</i>
Study and examination requirements	<i>The final grade in the module is composed of 25% presentation 65% take-home assignments, 10% in-class participation and soft-skills assessment. Students must have a final grade of 70% or higher to pass</i>
Reading list	<ol style="list-style-type: none"> <li>1. <i>Michael Heinrich, Joanne Barnes, Simon Gibboms. Elizabeth M. Williamson, 2004. Fundamentals of Pharmacognosy and Phytochemistry. London: Churchill Livingstone</i></li> <li>2. <i>Simon Mills, Kerry Bone. 2000. Principles and Practice of Phytotherapy. London: Churchill Livingstone</i></li> </ol>