**Course Description Form**

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| 1. Course Name:
 |
| Organic Pharmaceutical Chemistry II |
| 1. Course Code:
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| 1. Semester / Year:
 |
|  First course/ 2024-2025 |
| 1. Description Preparation Date:
 |
| 21/ 9/2024 |
| 1. Available Attendance Forms:
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| The fourth stage |
| 1. Number of Credit Hours (Total) / Number of Units (Total)
 |
| 45 hr/ 4 units |
| 1. Course administrator's name (mention all, if more than one name)
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| Name: Dr. Mohammed Kamil HadiEmail: **mohammed.hadi@copharm.uobaghdad.edu.iq**Name: Dr. Zainab Abdelhadi Dakhel**E-mail:** **Zainab.abd@copharm.uobaghdad.edu.iq** |
| 1. Course Objectives
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| **Course Objectives** | 1-Study the relationship between the chemical structure of compounds and their efficacy (such as some drugs used in the treatment of autonomic nervous system disorders and drugs used in the treatment of adrenal system disorders).2- Studying the pharmacokinetics of a drug within an organism includes mechanisms of absorption, metabolism, and excretion.3- Preparing students to understand the chemical structures of compounds and their relationship to the biological activities of the human body. |
| 1. Teaching and Learning Strategies
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| **Strategy** | **Knowledge:** 1- How to handle chemical compounds2- To know the methods of manufacturing some compounds and medications.3- Performing practical experiments for the manufacturing and purification of compounds**Skills:** 1- Acquiring the skill of preparing compounds and medications2- Acquiring skill in using different methods in the production and preparation of medications3- Acquiring the skill of how to handle chemical compounds4- Acquiring the skill of writing practical reports**Learning and teaching methods:**1- The theoretical lectures2- Conduct scientific experiments3- Seminars4- The daily duties5- The written exams6- Curriculum and supportive books7- Explanatory videos |
| 1. Course Structure
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| **Week**  | **Hours**  | **Required Learning Outcomes**  | **Unit or subject name**  | **Learning method**  | **Evaluation method**  |
| 1-4 | 13 | Cholinergic agents | cholinergic receptors and their subtypesCholinergic blocking agent; structure-activity relationships (SAR); Solanaceous alkaloid and analogues; synthetic cholinergic blocking agents and products; ganglionic blocking agents (neuromuscular blocking agents) | Lectures | Oral and written exam |
| 5-8 | 8 | Adrenergic agents | Adrenergic receptors; Drugs affecting Adrenergic neurotransmission; Sympathomimetic agents; Adrenergic receptor antagonists | Lectures | Oral and written exam |
| 9-11 | 10 | Analgesic agents | Analgesic receptors, endogenous opioids; Products; Antitusive agents; Anti-inflammatory analgesics | Lectures | Oral and written exam |
| 12-14 | 10 | CNS depressant | Benzodiazepines and related compounds; Barbiturates; CNS depressant with skeletal muscle relaxant properties; Antipsycotics | Lectures | Oral and written exam |
| 15 | 4 | CNS Stimulants | Central sympathomimetic agentsAntidepressants | Lectures | Oral and written exam |
| 1. Course Evaluation
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| Distributing the score out of 100 according to the tasks assigned to the student such as daily preparation, daily oral, monthly, or written exams, reports .... etc 20 marks for practical work in the lab and quiz20 marks for mid-term exam and quiz60 marks for final exam |
| 1. Learning and Teaching Resources
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| Required textbooks (curricular books, if any) | Wilson and Gisvold Textbook of Organic medicinal and Pharmaceutical chemistry, Delgado JN, Remers WA, (Eds); 12th ed, 2011 |
| Main references (sources) | Wilson and Gisvold Textbook of Organic medicinal and Pharmaceutical chemistry, Delgado JN, Remers WA, (Eds); 12th ed, 2011 |
| Recommended books and references (scientific journals, reports...) | Wilson and Gisvold Textbook of Organic medicinal and Pharmaceutical chemistry, Delgado JN, Remers WA, (Eds); 12th ed, 2011 |
| Electronic References, Websites |  |