



## Course Syllabus

<b>1</b>	<b>Course title</b>	<b>Pharmaceutical Technology</b>
<b>2</b>	<b>Course number</b>	0905454
<b>3</b>	<b>Credit hours</b>	3
	<b>Contact hours (theory, practical)</b>	(3,0)
<b>4</b>	<b>Prerequisites/corequisites</b>	0915351
<b>5</b>	<b>Program title</b>	BSc. In Chemical Engineering
<b>6</b>	<b>Program code</b>	5
<b>7</b>	<b>Awarding institution</b>	The University of Jordan
<b>8</b>	<b>School</b>	School of Engineering
<b>9</b>	<b>Department</b>	Department of Chemical Engineering
<b>10</b>	<b>Course level</b>	Forth year
<b>11</b>	<b>Year of study and semester (s)</b>	Froth year/1 <sup>st</sup> semester
<b>12</b>	<b>Other department (s) involved in teaching the course</b>	No departments are involved in teaching the course
<b>13</b>	<b>Main teaching language</b>	English
<b>14</b>	<b>Delivery method</b>	<input checked="" type="checkbox"/> Face to face learning <input type="checkbox"/> Blended <input type="checkbox"/> Fully online
<b>15</b>	<b>Online platforms(s)</b>	<input type="checkbox"/> Moodle <input type="checkbox"/> Microsoft Teams <input type="checkbox"/> Skype <input type="checkbox"/> Zoom <input type="checkbox"/> Others.....
<b>16</b>	<b>Issuing/Revision Date</b>	

### 17 Course Coordinator:

Name:	Contact hours:
Office number:	Phone number:
Email:	



### 18 Other instructors:

Name:

Office number:

Phone number:

Email:

Contact hours:

Name:

Office number:

Phone number:

Email:

Contact hours:

### 19 Course Description:

As stated in the approved study plan.

Chemical engineering in the pharmaceutical industry: an introduction. Current challenges and opportunities in the pharmaceutical industry. Dosage forms (liquid dosage forms, semisolid and solid dosage forms). The design and preparation of a successful dosage form with respect to the route of administration and large scale manufacture in a sterile and clean environment. Aspects of chemical kinetics, physical chemistry, physiology, cell biology, mass and heat transfer, and fluid dynamics will be described as they relate to the manufacture of effective dosage forms. Powders in pharmaceutical processes: particles properties and interactions, flow and packing of powders, processes including granulation, fluidization, mixing and blending.



## 20 Course aims and outcomes:

A- Aims:

B- Students Learning Outcomes (SLOs):

Upon successful completion of this course, students will be able to:

SLOs SLOs of the course	SLO (1)	SLO (2)	SLO (3)	SLO (4)
1				
2				
3				
4				
5				
6				

## 21. Topic Outline and Schedule:

Week	Lecture	Topic	Student Learning Outcome	Learning Methods (Face to Face/Blended/ Fully Online)	Platform	Synchronous / Asynchronous Lecturing	Evaluation Methods	Resources
1	1.1							
	1.2							
	1.3							
2	2.1							
	2.2							
	2.3							
Week	Lecture	Topic	Student Learning	Learning Methods (Face	Platform	Synchronous / Asynchronous	Evaluation	Resources

			Outcome	to Face/Blended/ Fully Online)		Lecturing	Methods	
Week	Lecture	Topic	Student Learning	Learning Methods (Face)	Platform	Synchronous / Asynchronous	Evaluation	Resources
3	3.1							
	3.2							
	3.3							
4	4.1							
	4.2							
	4.3							
5	5.1							
	5.2							
	5.3							
6	6.1							
	6.2							
	6.3							
7	7.1							
	7.2							
	7.3							
8	8.1							
	8.2							
	8.3							
9	9.1							
	9.2							
	9.3							
10	10.1							
	10.2							
	10.3							

			Outcome	to Face/Blended/ Fully Online)		Lecturing	Methods	
11	11.1							
	11.2							
	11.3							
12	12.1							
	12.2							
	12.3							
13	13.1							
	13.2							
	13.3							
14	14.1							
	14.2							
	14.3							
15	15.1							
	15.2							
	15.3							

## 22 Evaluation Methods:

Opportunities to demonstrate achievement of the SLOs are provided through the following assessment methods and requirements:

Evaluation Activity	Mark	Topic(s)	SLOs	Period (Week)	Platform



## 23 Course Requirements

(e.g: students should have a computer, internet connection, webcam, account on a specific software/platform...etc):

## 24 Course Policies:

- A- Attendance policies:
- B- Absences from exams and submitting assignments on time:
- C- Health and safety procedures:
- D- Honesty policy regarding cheating, plagiarism, misbehavior:
- E- Grading policy:
- F- Available university services that support achievement in the course:

## 25 References:

- A- Required book(s), assigned reading and audio-visuals:
- B- Recommended books, materials, and media:

## 26 Additional information:

Name of Course Coordinator: ----- Signature: ----- Date: -----

-----



Head of Curriculum Committee/Department: -----	Signature: -----
Head of Department: -----	Signature: -----
Head of Curriculum Committee/Faculty: -----	Signature: -----
Dean: -----	Signature: -----