

University of Montana

ScholarWorks at University of Montana

University of Montana Course Syllabi, 1990-2010

Spring 2-1-2008

BMED 331.01: Pharmaceutics

Howard D. Beall

University of Montana, Missoula, howard.beall@umontana.edu

Charles M. Thompson

University of Montana, Missoula, charles.thompson@umontana.edu

Donna Beall

University of Montana, Missoula, donna.beall@umontana.edu

Follow this and additional works at: <https://scholarworks.umt.edu/syllabi1990-2010>

Let us know how access to this document benefits you.

Recommended Citation

Beall, Howard D.; Thompson, Charles M.; and Beall, Donna, "BMED 331.01: Pharmaceutics" (2008).
University of Montana Course Syllabi, 1990-2010. 19.
<https://scholarworks.umt.edu/syllabi1990-2010/19>

This Syllabus is brought to you for free and open access by ScholarWorks at University of Montana. It has been accepted for inclusion in University of Montana Course Syllabi, 1990-2010 by an authorized administrator of ScholarWorks at University of Montana. For more information, please contact scholarworks@mso.umt.edu.

BMED 331 - Pharmaceutics**Spring 2008**

Instructors: Howard Beall – SB159, x5112, howard.beall@umontana.edu
Chuck Thompson – SB, x4643, charles.thompson@umontana.edu
Donna Beall – SB328, x4237 or x6710 (CHC), donna.beall@umontana.edu

Time and Place: TR, 9:40 – 11 AM, SB169; W, 11:10 AM – 12 N, SB169

Required Text: *BMED 331 Course Pack*

References: *Pharmaceutical Calculations*, Stoklosa & Ansel
Pharmaceutical Dosage Forms and Drug Delivery Systems, Allen, Popovich & Ansel
United States Pharmacopeia/National Formulary (USP/NF)
Remington: The Science and Practice of Pharmacy

Organization:

The course will meet 42 times (56 hours) during the semester. Class time will be used for lecture, discussion, calculations, problem sessions, presentations, reviews and exams.

Learning Objectives:

At the conclusion of this course, the students should be able to

1. understand and discuss the principles of physical pharmacy that are used for the design, manufacture and evaluation of dosage forms and drug delivery systems.
2. use their knowledge of the physical-chemical properties of drugs and dosage forms to solve drug delivery problems.
3. understand and discuss the basic concepts of biopharmaceutics that will provide the background for understanding and applying the principles of clinical pharmacokinetics.

Presentations:

Small group presentations in the general areas of pharmaceutical biotechnology or novel dosage forms and drug delivery systems are scheduled for the last week-and-a-half of classes. Topics can be selected from a list provided by the instructor, or groups can choose their own topics to be approved by the instructor.

Exams:

If you are unable to attend a scheduled exam, you must contact the instructor prior to the exam. No make-up exams will be given prior to a scheduled exam. Questions concerning grading must be submitted *in writing* or *by email* within one week after exams are returned.

| | | |
|-----------------|---------------------------------------|---------------|
| Grading: | Three exams (100 points each) | 300 pts |
| | Final exam | 150 pts |
| | Presentations and class participation | <u>50 pts</u> |
| | TOTAL | 500 pts |

Course Schedule:

DATE TOPICS [HOURS] - INSTRUCTOR

22 Jan Introduction to pharmaceutics [1] – H. Beall

22 Jan-14 Feb Physical pharmacy [15] – C. Thompson

Tuesday, 26 February – Exam 1

19-27 Feb Properties of solutions [4.5] – H. Beall

27-28 Feb Dosage forms, general considerations [2] – H. Beall

4 Mar Oral solutions [1] – H. Beall

4-5 Mar Ophthalmic, nasal and otic dosage forms [1] – H. Beall

5-12 Mar Solid dosage forms [4.5] – H. Beall

Tuesday, 18 March – Exam 2

13, 20 Mar Parenteral dosage forms [3] – H. Beall

19 Mar Aerosol, inhalation and spray dosage forms [1] – D. Beall

24-28 Mar Spring Break

1-3 Apr Pharmaceutical dispersions [3] – H. Beall

3-9 Apr Ointments, transdermal delivery systems [3] – H. Beall

9-10 Apr Suppositories [1] – H. Beall

Tuesday, 15 April – Exam 3

10-17 Apr Drug stability, kinetics [3] – H. Beall

17-23 Apr Biopharmaceutics [3] – H. Beall

24 Apr-1 May Student presentations [5.5] – Students

Tuesday, 6 May – Final Exam, 8-10 AM, SB169
