

**GUJARAT TECHNOLOGICAL UNIVERSITY**  
**BPHARM – SEMESTER – II • EXAMINATION – WINTER 2012**

**Subject code: 220002****Date: 17-01-2013****Subject Name: Pharmacuetics - II****Time: 10:30 am – 01:30 pm****Total Marks: 80****Instructions:**

1. Attempt any five questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.

- Q.1** (a) Describe with diagrams Mechanism, applications and also variants of Ball-Mill **06**  
(b) Write a note on mechanisms of size reduction **05**  
(c) Write a note on wet-grinding. **05**
- Q.2** (a) What is the difference between 'Sedimentation' and 'Elutriation'.?Describe with diagram multiple stage elutriator. **06**  
(b) Describe with diagrams 'Cyclone separator'. **05**  
(c) Write a note on standards for powders. **05**
- Q.3** (a) With a neatly labeled diagram describe working and applications of planetary mixer. **06**  
(b) Write a note on types of Mixtures. **05**  
(c) Discuss mechanisms of Liquid Mixing. **05**
- Q.4** (a) Describe with a neatly labeled diagram working and applications of Swensen-Walker Crystallizer. **06**  
(b) Discuss limitations of Miers theory of supersaturation. **05**  
(c) Write a note on Crystal Size Control. **05**
- Q.5** (a) Describe in brief theory of Drug extraction, **06**  
(b) What are the difficulties in extracting crude vegetable **05**  
(c) Write a note on solvents for drug extractions. **05**
- Q. 6** (a) Discuss in brief effect of compression forces on a bed of granules. **06**  
(b) Explain in brief Kawakita equation.State it's applications in tablet dosage form. **05**  
(c) Write a note on instrumentation of a tablet machines. **05**
- Q.7** (a) Give an overview of various types of industrial hazards. **06**  
(b) Enlist various types of temperature measuring devices used in industry.Discuss in detail any two. **05**  
(c) Discuss in brief various pressure measuring instruments used in industries. **05**

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