

# Rajiv Gandhi University of Health Sciences, Karnataka

## III Year B.Pharm Degree Examination – JAN-2019

**Time: Three Hours****Max. Marks: 70 Marks**

### PHARMACEUTICAL ENGINEERING (Revised Scheme 3)

**Q.P. CODE: 2614**

Your answers should be specific to the questions asked  
Draw neat labeled diagrams wherever necessary.

**LONG ESSAYS (Answer any Two)****2 x 10 = 20 Marks**

1. Define Filtration. Discuss the theories of filtration.
2. Define Drying. Discuss the rate of drying curve.
3. Derive an equation for the Fourier's law and write its application

**SHORT ESSAYS (Answer any Six)****6 x 5 = 30 Marks**

4. Explain the principle of Molecular distillation.
5. Discuss pneumatic conveyor.
6. Explain the principle of Krystal crystallizer.
7. Explain the principle of Fluid energy mill.
8. Principle of Cyclone separator
9. Discuss combating of corrosion.
10. Explain vortex formation and its prevention.
11. Discuss construction of climbing Film evaporators

**SHORT ANSWERS****10 x 2 = 20 Marks**

12. Define Supersaturation.
13. Uses of Ball mill
14. Define Filter aids with examples.
15. Uses of manometers
16. Define Bound and Unbound moisture.
17. State Stefan-Boltzman equation.
18. Laws governing Size reduction
19. Advantages of glass as a construction material
20. Define Dry bulb and Wet bulb temperature.
21. Define with example dimensionless numbers.

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