

**Q.P. Code : 34981**

**[Time: Three Hours]**

**[ Marks:70]**

Please check whether you have got the right question paper.

- N.B:
1. All questions are compulsory.
  2. Figures to the right indicate full marks.
  3. Draw neat labelled diagrams wherever necessary.

- Q.1 a What are Disintegrants? Explain the various mechanisms of tablet disintegration. 3  
b Elaborate on Effervescent tablets. 3  
c What are quality control tests for film coated tablets? 3  
d Discuss defects of hard gelatin capsule shells. 3  
e State advantages and disadvantages of aerosols. 3
- Q.2 a What is "Capping and Lamination" in tablets? Give its causes and remedies. 4  
b Which are the materials used in strip packaging? Give an account of the strip packing process. 4  
c Explain the formulation of dispersion type aerosols. 3
- Q.3 a Discuss the sugar coating process giving suitable examples in each step. 4  
b Give the flow chart for the manufacturing of gelatin. 3  
c Write a note on components of aerosol package. 4
- Q.4 a Explain in detail the physics of tablet compression. 4  
b Discuss the large scale manufacturing of soft gelatin capsules. 4  
c Enlist quality control tests for aerosols and explain any one test. 3
- Q.5 a Justify the importance of stability in preformulation studies. 3  
b Elaborate on spray and air variables in film coating process. 4  
c Describe the working of any one hard gelatin capsule filling machine based on 'auger' principle. 4
- Q.6 a Explain the steps in wet granulation process for tablet manufacture. 4  
b Define 'enteric coating' and give an account of polymers used for the same. 4  
c Illustrate the layout for a capsule section. 3