

# INDUSTRIAL PHARMACY

## UNIT - I

- ① Define application of preformulation studies in the development of a new dosage form / new chemical compound or
- Discuss application of preformulation considerations in development of tablet dosage form . or
  - Define significance of pH & pKa in preformulation studies . or
  - Define role of polymorphism in preformulation studies or
  - Define oxidation and hydrolysis in reference to stability of pharmaceutical preparations . or
  - Define chemical properties of drug substances to be considered in preformulation studies

## UNIT - II

- ① Describe ideal characteristics and formulation of tablets in detail or  
Describe granulation method of tablet formulation in detail or  
Define wet granulation method of tablet formulation in detail
- ② Define various compression and processing problems in tablet and also describe remedies to resolve these problems
- ③ Define rotary tablet press or multi station tablet press in detail .
- ④ Define various techniques employed in tablet coating in detail
- ⑤ Define evaluation of tablets or  
Define in process and finished product quality control test for tablets .
- ⑥ Write the formulation and evaluation considerations of syrups and emulsions .

## UNIT - III

- ① Write method of preparation of soft gelatin capsule and also write their evaluation tests.
- ② Write the method of preparation of hard gelatin capsule shells
- ③ Define various quality control test for capsules.
- ④ Define formulation of soft gelatin capsules and rotary die process in detail.
- ⑤ Explain formulation requirements and process of pelletization.

## UNIT - IV

- ① Define preparation of dry powder by lyophilization. Evaluate quality control test for parenterals
- ② Define & classify different types of parenteral products.
- ③ Illustrate the production facilities and various control for manufacturing of parenteral dosage forms.
- ④ Describe importance of adjusting pH and isotonicity for parenteral products.
- ⑤ Define basic requirements for ophthalmic preparation. discuss various additives used in their formulation and how do you sterilize such formulations.
- ⑥ Define formulation of :
  - Injections
  - Ampoules
  - Eye Drops
  - Eye Ointments.

## **UNIT - V**

- ① Describe various components / parts of Aerosol Products . Classify Propellants . or  
Write the properties of containers and valves of Aerosols.
- ② Write a detail note on packaging material science or  
Discuss various materials used for packaging of pharmaceutical products with regard to their benefits, limitations and remedy to overcome such limitations.
- ③ Discuss in brief about preparation of :
  - Cold Cream
  - Vanishing Cream
  - Toothpaste