

HPPSC Horticulture Development Officer Exam Pattern

Subjects	Questions	Duration
Essential Qualification (Technical Subject)	80 Questions	2 Hours
General Knowledge of National Level/ International Level	10 Questions	
General Knowledge of Himachal Pradesh	10 Questions	

HPPSC Horticulture Development Officer Syllabus

UNIT- I

PRINCIPALS OF HORTICULTURE

- Scope and importance of horticulture
- The scenario of horticulture industry in the regional, National and global economy
- Area and production
- Horticultural therapy and etc.
- Export and import
- Nutritive value of horticultural crops

UNIT – II

PROPAGATION AND NURSERY TECHNIQUES OF HORTICULTURAL CROPS

- Sexual propagation,
- Factors influencing seed germination
- Seed dormancy and methods to overcome the dormancy
- Polyembryony,
- Principles,

- Growing structures
- Media
- Management of fruit nursery.
- Portrays
- Containers
- Advantages, and Disadvantages
- Apomixis,

UNIT – III

GROWTH AND DEVELOPMENT OF HORTICULTURAL CROPS

- Important phases of growth and development
- Canopy development: Different stages of growth,
- Leaf Area Index (LAI)
- Definitions,
- Optimum LAI in horticultural crops.
- Photosynthetic productivity,
- Growth curves and etc.

UNIT – IV

BREEDING OF HORTICULTURAL CROPS

- Scope and importance of plant breeding in horticultural crops
- Breeding systems and objectives
- Modes of Reproduction
- Mechanisms of pollination control,
- Effect of Mating systems.
- Sterility, and Incompatibility
- Plant genetic resources

HORTICULTURE (DEGREE STANDARD)

UNIT- I

FUNDAMENTALS OF HORTICULTURE

- Scope and importance
- Area and production

- Nutritive value of Horticultural Crops
- National and regional agencies involved in the promotion of the Horticultural Industry in India (NHB, APEDA, and Commodity Boards).
- State,
- The national and Global scenario of horticultural crops
- Horticultural zones of Tamil Nadu and India
- Import and Export

UNIT – II

GROWTH AND DEVELOPMENT OF HORTICULTURAL CROPS

- Important phases of growth and development
- Biennial perennial (woody and herbaceous perennials)
- External and internal factors associated with unfruitfulness
- Annual,
- Bearing habits
- Fruitfulness and unfruitfulness
- Classification of horticultural crops based on life cycle
- Physiology of flowering.

UNIT – III

PROPAGATION OF HORTICULTURAL CROPS

- Establishment of the nursery
- Humidifiers
- Tools and implements propagation structures
- Mist chamber,
- Media and containers
- Site selection
- Polytunnels,
- Greenhouse
- Glasshouse,
- Cold frames and hotbeds,
- Pit Nursery
- Definition
- Phytotron
- Glasshouse

- Poly house
- Shade net,
- Propagation
- Soil sterilization

UNIT – IV

MANAGEMENT TECHNIQUES FOR HORTICULTURAL CROPS

- Planning
- Fencing
- Layout and management of orchards
- Soil Reaction
- Functions
- Windbreaks and shelter beds
- Spacing
- Planting system
- Soil fertility
- Organic manures and inorganic fertilizers
- Essential Elements
- Acid,
- Saline and Alkaline Soils
- Physical and chemical properties

UNIT – V

POST- HARVEST TECHNOLOGY OF HORTICULTURAL CROPS

- Importance of post
- Methods of packing
- Grading
- Grades and standards
- Post-harvest handling methods
- Washing
- Types of containers and their advantages and disadvantages.
- Harvest handling in horticultural crops
- Waxing
- Maturity indices

General Knowledge

- Geography of India
- Tribes
- Handicrafts
- Countries and capitals
- International issues
- Scientific observations
- Indian Culture
- World organizations
- Famous Places
- Economic issues in India
- About India and it's neighboring countries
- Political Science
- Music & Literature
- National Dance
- Famous Places in India
- Artists
- Sculptures
- New inventions
- Tourism spots of Historical Importance
- National news (current)
- Books And Author
- Important Dates
- Science and innovations
- Musical Instruments etc