

**MAHARASHTRA AGRICULTURAL UNIVERSITIES EXAMINATION BOARD, PUNE**  
**SEMESTER END EXAMINATION**

**B.Sc. (Hons.) Horticulture**

<b>Semester</b> : V (New)	<b>Term</b> : I	<b>Academic Year</b> : 2019-20
<b>Course No.</b> : H /PATH 352	<b>Title</b> : Diseases of Fruit, Plantation, Medicinal and Aromatic Crops	
<b>Credits</b> : 3 (2+1)		
<b>Day &amp; Date</b> : Friday, 08.11.2019	<b>Time</b> : 14.00 to 17.00	<b>Total Marks</b> : 80

- Note :**
1. Solve ANY EIGHT questions from SECTION "A".
  2. All questions from SECTION "B" are compulsory.
  3. All questions carry equal marks.
  4. Draw neat diagrams wherever necessary.

**SECTION "A"**

- Q.1 Describe symptoms of the following diseases.
- a) Anthracnose of mango
  - b) Soft rot of papaya
  - c) Powdery mildew of ber
  - d) Tea rust
- Q.2 Describe disease cycle of following diseases with a suitable diagram.
- a) Citrus canker
  - b) Powdery mildew of grape.
- Q.3 Enlist the important diseases of grape with their causal organisms and describe in detail the symptoms, disease cycle and integrated disease management of Downy mildew of grape.
- Q.4 Enlist the important diseases of citrus with causal organisms and describe in detail the symptoms, disease cycle and integrated disease management of citrus gummosis.
- Q.5 Enlist the important diseases of mango with causal organisms and describe in detail the disease cycle and integrated disease management of anthracnose of mango.
- Q.6 Which are the fungal diseases responsible for low production of banana in India? Describe in detail the symptoms, causal organism, disease cycle and integrated disease management of Panama disease.
- Q.7
- a) Enlist the viral diseases of papaya along with the causal agents and describe the collateral host, insect vector and integrated disease management practices of leaf curl disease.
  - b) Write causal organisms, symptoms, host range and IDM of abnormal leaf spot of rubber.
- Q.8 Write short notes.
- a) Koleroga of arecanut
  - b) Oily spot of pomegranate
- Q.9 Describe control measures of the following diseases.
- a) Fire blight of apple
  - b) Ganoderma wilt of coconut
  - c) Dieback of jackfruit
  - d) Heart rot of pine apple

(P.T.O.)

Q.10 Describe in brief the following diseases.

- a) Guava wilt
- b) Base rot of pineapple

#### SECTION "B"

Q.11 Answer in one sentence.

- 1) Which climatic conditions favor the powdery mildew of ber?
- 2) Why *Casuarina* or *Eucalyptus* is used as wind breaks around the cashew plantation?
- 3) What is viriod?
- 4) Which chemical in what concentration is used to control coconut wilt?
- 5) Give the two examples of antagonistic bacteria?
- 6) Which insect vector transmits the pineapple wilt virus?
- 7) Which types of spores are produced by the fungus *Cerotilium fici*?
- 8) What is the primary source of infection of apple scab?

Q.12 a) State True or False.

- 1) The powdery mildew fungus of mango can infect ber.
- 2) Angular leaf spot is caused by *Pseudomonas azadirachtae*.
- 3) Kadang kadang disease of coconut is caused by viroid.
- 4) The steam bleeding of coconut is a soil borne disease

b) Fill in the blanks.

- 1) Powdery mildew of mint is caused by \_\_\_\_\_.
- 2) *Rhizoctonia solani* causes \_\_\_\_\_ disease of hemp.
- 3) The bacterial nature of fire blight of apple was described by the scientist \_\_\_\_\_ in 18
- 4) The causal organism of root rot of pyrethrum is \_\_\_\_\_.

