

Roll No.

Total No. of Pages : 02

Total No. of Questions : 09

B.Sc. (Agriculture) (Sem.-5)

**INSECT PESTS OF CROPS AND STORED GRAINS**

Subject Code : BSAG-505

M.Code : 74169

Date of Examination : 12-07-22

Time : 3 Hrs.

Max. Marks : 60

**INSTRUCTION TO CANDIDATES :**

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains FIVE questions carrying FIVE marks each and students have to attempt any FOUR questions.
3. SECTION-C contains THREE questions carrying TEN marks each and students have to attempt any TWO questions.

**SECTION-A**

**1. Write short notes on :**

- a. What type of damage is done by rice brown planthoppers in rice? Give its economic threshold level and chemical control.
- b. Which insect pests are recorded on Bt cotton? Give typical damage symptoms by whitefly.
- c. What are main pests of pulse crops? Give chemical control of pod borer.
- d. What damage is caused by mite and pyrilla on sugarcane, give symptoms?
- e. How Bt delta endotoxin works to control *Helicoverpa armigera* on cotton? Give its mode of action in insect larvae.
- f. Give chitti pest complex. How will you differentiate mite and thrips damage on chilli?
- g. How lesser grain borer, *Rhyzopertha dominica* completes its biology on wheat? Is this primary or secondary pest?
- h. Which are the major pests on citrus in Punjab? Give its management.

- i. What is storage entomology? List primary and secondary pests on stored grains.
- j. How will you diagnose mite attack on cucurbitaceous crops? Give its control.

### SECTION-B

2. List various pests of mango. Outline the management strategies for management of mango pests?
3. Name the storage pests which are internal as well as external and external feeders. Give their damage symptoms on stored grains.
4. Give brief about different species of bollworm attacking cotton and their damage symptoms. Outline the for integrated pest management of bollworms.
5. What are major pests on brinjal? Give their damage symptoms and detailed management strategies for brinjal shoot and fruit borer.
6. Describe the damage and management strategies for major insect pests on guava.

### SECTION-C

7. Elaborate different sources of stored grain infestation. Explain various methods of stored grain pest management.
8. Give integrated pest management of maize borer and stemborers in maize and rice, respectively as devised by PAU, Ludhiana.
9. List various sucking and borer pests of sugarcane. Describe the IPM for management of borer pests of sugarcane.

**NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.**