

MAHARASHTRA AGRICULTURAL UNIVERSITIES EXAMINATION BOARD, PUNE
SEMESTER END THEORY EXAMINATION

B.Sc.(Hons.) Agriculture

Semester	: I (New)	Term	: First	Academic Year	: 2024-25
Course No.	: AGRO-111	Title	: Fundamentals of Agronomy		
Credits	: 3(2+1)				
Day & Date	: Thursday, 13.02.2025	Time	: 10:00 to 13:00 hrs.	Total Marks	: 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 diagram wherever necessary.

SECTION 'A'

- Q.1 a) Define Agronomy and describe in short the scope of Agronomy.
b) Classify the crops on the basis of agronomic use with suitable example.
- Q.2 a) Define Seed and give the characteristic of good seed.
b) Enlist different methods of sowing and explain any one with their merits and demerits.
- Q.3 a) Define Tillage and state the various objectives of tillage.
b) Enlist the modern concept of tillage and explain any one of them.
- Q.4 a) Define Essential nutrient and give its classification with examples.
b) Explain in short Active and Passive absorption.
- Q.5 Give in detail the classification of manures and fertilizers including biofertilizers alongwith examples.
- Q.6 a) Describe in short various kinds of soil water.
b) Write in detail about different methods of irrigation.
- Q.7 a) Define Weed and give different weed control methods.
b) Write different approaches of scheduling of irrigation and explain any one of them.
- Q.8 a) Describe in short water resources of India.
b) Define Allelopathy. Write its effects on crop and weed.
- Q.9 a) Define Cropping system and give its classification with examples.
b) Explain in short various soil moisture constants.
- Q.10 a) Give the classification of weed on the basis of life cycle with examples.
b) Write short notes on (Any Two):
i) Integrated Nutrient Management
ii) Desirable characteristics of green manuring crop
iii) Sustainable crop production

(P.T.O.)

SECTION 'B'

Q.11 Do as directed:

- 1) What is the average rainfall of India?
- 2) Give one example of C₄ crop plant.
- 3) What do you mean by Crop and Variety?
- 4) Abbreviation 'FYM' stands for _____.
- 5) Abbreviation 'NADEP' stands for _____.
- 6) At which temperature, soil is heated in oven, for moisture estimation?
- 7) Who is known as the 'Father of Tillage'?
- 8) Which implement is used for drilling method of sowing?

Q.12 a) Define the following terms:

- 1) Growth
- 2) Crop geometry
- 3) Tilt
- 4) Manure

b) Fill in the blanks:

- 1) Growing of two or more crops on the same piece of land with definite geometrical proportion, is known as _____.
- 2) _____ is an example of green leaf manuring plant.
- 3) Tensiometer is used to measure _____.
- 4) Major portion of rainfall receives in India from _____ monsoon.

