PREVIEW QUESTION BANK

Module Name : Agricultural Meteorology - 60-ENG
Exam Date : 29-Jun-2024 Batch : 14:30-16:30

Sr. No.	Client Question ID	Question Body and Alternatives	Marks	Negative Marks
Objective Question				
1	201	Movement of DNA from one bacterium to another through a tubular bridge or pilus: 1. Conjugation 2. Transposition 3. Transfection 4. Transduction A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
2	202	Which of the following is responsible for eliminating toxic oxygen by-products from cells? 1. Mitochondria 2. Golgi complex 3. Peroxisomes 4. Chloroplasts A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
3	203	A form of multiple parasitism in which a parasite preferentially attacks a host that is already parasitized by another species is known as 1. Cleptoparasitism 2. Ectoparasitoid 3. Obligate parasitism 4. Superparasitism A1 : 1	4.0	1.00

		A2 : 2 A3 : 3 A4 : 4		
Objective Question				
4	204	For mass multiplication of DD-136 nematode, the common host used is 1. Silk moth 2. Fruit sucking moth 3. Codling moth 4. Lesser wax moth A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
5	205	Chlorpyriphos methyl is effective against stored product insects except 1. *Rhizopertha dominica* 2. *Tribolium castaneum* 3. *Caryedon serratus* 4. *Oryzaephilus surinamensis* A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
6	206	Which of the following insects often cause inhalational allergies in human following large emergence of adult insects 1. Stick insects 2. May flies 3. Ear wigs 4. Preying mantis A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
7	207	Given below are two statements: Statement (I): Climate is a weather condition related to smaller areas at a given place and at a given time, Statement (II): Weather is a condition of atmosphere at a given place and at a given time In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
8	208	The local name of cyclone in Phillippines is 1. Hurricane 2. Cyclone 3. Baquio 4. Typhoon A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
9	209		4.0	1.00

		Which one of the following are secondary tillage implements? (A).Subsoiler (B).Cultivator (C).Disc harrow (D).Wetland plough Choose the ***correct*** answer from the options given below: 1. (A), (B) and (D) only. 2. (B) and (C) only. 3. (B), (C) and (D). 4. (B) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
10	210	_____ is the most suitable, drought resistant and persistant grass? 1. *Atylosia sp.* 2. *Cenchrus ciliaris* 3. *Stylosanthes hamata* 4. *Sorghum bicolor* A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
11	211	The rainfed area in India is aproximately 1. 30 mha 2. 40 mha 3. 57 mha 4. 70 mha A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
12	212	Which nutrient is often a limiting factor in agricultural production? 1. Nitrogen 2. Carbon 3. Oxygen 4. Hydrogen A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
13	213	What is a potential disadvantage of agroforestry systems? 1. Increased soil erosion 2. Decreased carbon sequestration 3. Reduced biodiversity 4. Enhanced susceptibility to pests A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
14	214	Pungency in mustard oil is due to 1. Amino acid 2. Allyl isothiocyanate 3. Erusic acid 4. Oxalic acid A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
15	215	Sesamum belongs to the family 1. Chenopodiaceae 2. Papilionaceae 3. Leguminosae 4. Pedaliaceae A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
16	216	Dark period is critical in which type of plant? 1. Short day plant 2. Long day plant 3. Day neutral plant 4. All the options A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
17	217	Which of the following is NOT a significant contributor to greenhouse gas emissions from livestock farming? 1. Carbon dioxide 2. Methane 3. Nitrous oxide 4. Ammonia A1 : 1 A2 : 2 A3 : 3	4.0	1.00

		A4 : 4		
Objective Question				
18	218	Fe deficiency is mostly seen in crops growing on 1. Calcareous or alkaline soils 2. Salt affected soils 3. Acidic soils 4. Neutral soils A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
19	219	EDV (Essentially Derived Varieties) are those which are derived from: 1. crossing two commercially known varieties 2. hybrid introduced from other countries 3. existing variety through genetic engineering or mutation 4. crossing commercially known variety with its wild relative A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
20	220	What is the role of "companion planting" in agriculture? 1. Enhancing soil fertility through crop rotation 2. Growing different crop species together to deter pests 3. Cultivating plants in hydroponic system 4. Increasing soil compaction through cover cropping A1 : 1 A2 : 2 A3 : 3	4.0	1.00

		A4 : 4		
Objective Question				
21	2501	Amount of water retained at low values of matric suction is mainly affected by 1. Soil texture 2. Soil structure 3. Air-entry suction 4. Specific-surface of the soil A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
22	2502	A system of uniform grains in a soil structure is called as 1. Monodisperse 2. Hyperdisperse 3. Polydisperse 4. Multidisperse A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
23	2503	What is the coordination number of cubic tetrahedral type packing of soil spherical particles? 1. 6 2. 8 3. 10 4. 12 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

24	2504	What is not an assumption of Stoke's law? 1. All particles have the same density 2. The particles are rigid, smooth ad spherical 3. Fluid flow around the particle is turbulent 4. The particles are large enough to be unaffected by the thermal motion A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

25	2505	Apparent drought is caused by 1. Wrong selection of crop 2. Late onset of monsoon 3. Wrong selection of crop variety 4. Early withdrawal of monsoon A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

26	2506	What is the most highly variable gas in our atmosphere ? 1. CO_2 2. O_2 3. Water vapour 4. Trace gases A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

27	2507		4.0	1.00

		Which theory is most suited for formation of warm clouds 1. Collision theory 2. Bergeron-Findeisen theory 3. Frontal theory 4. Occlusion thery A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
28	2508	Bilinear interpolation is the type of Interpolation where for each new location the intensity of the 1. Four pixels 2. immediate pixel 3. Eight pixels 4. Sixteen pixels A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
29	2509	Sentinel-2 satellite contains how many spectral bands ? 1. 10 2. 13 3. 15 4. 9 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
30	2510		4.0	1.00

		Reference crop evapotranspiration computation (FAO-56) assumes the height of reference crop is 1. 12 cm 2. 15 cm 3. 8 cm 4. 10 cm A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
31	2511	Closely spaced isobar indicates the 1. Low pressure gradient 2. No pressure gradient 3. Very low pressure gradient 4. High pressure gradient A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
32	2512	Specific surface of sand may be 1. > 2 m^2/g 2. < 2 m^2/g 3. < 5 m^2/g 4. > 10 m^2/g A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
33	2513		4.0	1.00

		Multilayer adsorption can be estimated using 1. Langmuir's equation 2. BET equation 3. De Boer's equation 4. Teller's equation A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
34	2514	Kaolin minerals tend to appear in the region of 1. Along the equator 2. Mediterranean 3. Temperate 4. Tropical A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
35	2515	Water risen in a capillary tube is characterized by a 1. +ve pressure potential 2. -ve pressure potential 3. zero pressure potential 4. Gravitational potential A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
36	2516		4.0	1.00

		The wind speed of cyclonic storm is 1. 25 to 33 knot 2. 34 to 47 knot 3. 47 to 67 knot 4. More than 67 knot A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
37	2517	Given below are two statements: Statement (I): When the chlorine oxide reacts with ozone, the ozone concentration is reduced in the stratosphere. Statement (II): The polar vortex is illuminated by the sun. In light of the above statements,choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are true. 2. Both Statement (I) and Statement (II) are false. 3. Statement (I) is true but Statement (II) is false. 4. Statement (I) is false but Statement (II) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
38	2518	Absolute humidity is the ratio of: 1. volume of water vapour to volume of air 2. mass of water vapour to mass of air 3. mass of water vapour to volume of air 4. AVP to SVP A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question				
39	2519	Thermal concept of Monsoon was proposed by 1. Walker 2. Halley 3. Bergeron 4. Campbell A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
40	2520	Hot, dry southerly wind that blows in Egypt in spring is called 1. Khamsin 2. Samsoco 3. Wester 4. Quesqueen A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
41	2521		4.0	1.00

Match **List-I** with **List-II**

List-I	List-II
(Climatic types)	**(Moisture indices)**
(A). B2-Humid	(I). 0 to 20
(B). E-Arid	(II). -100 to -66.7
(C). D-Semiarid	(III). -66.7 to -33.3
(D). C2-Moist subhumid	(IV). 40 to 80

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
3. (A) - (IV), (B) - (II), (C) - (III), (D) - (I)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

42	2522	In case of modified Koppen System, the average temperature of the coolest month for “A” type of climate is 1. Less than 5^0C 2. 5^0C to 10^0C 3. 10^0C to 18^0C 4. More than 18^0C A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

43	2523		4.0	1.00

		Growing degree days concept is originated from 1. Kirchoof's law 2. Stephan Boltzmann law 3. Wein's law 4. Vant Hoff's law A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
44	2524	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : January is the coldest month at Delhi Reason (R) : The earth gets minimum radiation as the sun-earth distance is maximum in January In light of the above statements, choose the *correct* answer from the options given below. 1. Both (A) and (R) are true and (R) is the correct explanation of (A). 2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A). 3. (A) is true but (R) is false. 4. (A) is false but (R) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
45	2525	Which of the following law states that an increase in temperature will cause an increase in the rate of an endothermic reaction? 1. Kliff's law 2. Van't Hoff's law 3. Lamarck's law 4. Law of Dalton Hooker A1 : 1 A2 : 2 A3 : 3	4.0	1.00

A4 : 4

Objective Question

46 2526 4.0 1.00

Match **List-I** with **List-II**

List-I	**List-II**
(A). Short day plants	(I). Wheat
(B). Long day plants	(II). Tomato
(C). Day neutral plants	(III). Andropogon
(D). Intermediate plant	(IV). Rice

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (II), (B) - (III), (C) - (I), (D) - (IV)
3. (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
4. (A) - (IV), (B) - (I), (C) - (II), (D) - (III)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

47 2527 4.0 1.00

Which of the following particles are used for cloud seeding in artificial rain making.

(A) Silver iodide

(B) Dry ice

(C) Common salt

(D) Dust particle

1. (A), (B) and (C) only.
2. (A), (B) and (D) only.
3. (A), (B), (C) and (D).
4. (B), (C) and (D) only.

A1 : 1

A2 : 2

		A3 : 3 A4 : 4		
Objective Question				
48	2528	Surface boundary layer of the Earth is dominated by which force? 1. Coriolis force 2. Pressure gradient force 3. Gravitational force 4. Frictional force A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
49	2529	Presence of inversion near the ground indicates which type of atmospheric condition? 1. Unstable 2. Stable 3. Windy 4. Rainy A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
50	2530		4.0	1.00

		Which effects are generated by advection in the crop fields? (A). Oasis effect (B). Clothesline effect (C). Seebeck effect (D). Peltier effect Choose the ***correct*** answer from the options given below: 1. (A) and (B) only. 2. (A), (B) and (D) only. 3. (A), (B), (C) and (D). 4. (B), (C) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
51	2531	As per India State of Forest Report (ISFR)-2021, the area (sq km) of forest cover under the category of 'Open Forest' in India is 1. 3, 04, 499 sq km 2. 3, 07, 120 sq km 3. 3, 12, 684 sq km 4. 3, 21, 359 sq km A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
52	2532	India's first State of Forest Report was release in year: 1. 1985 2. 1986 3. 1987 4. 1988 A1 : 1	4.0	1.00

		A2 : 2 A3 : 3 A4 : 4		
Objective Question				
53	2533	Given below are two statements: Statement (I): The Indian Council of Forestry Research and Education was established in the year 1985 for taking care of forestry research, education and extension needs of the country. Statement (II): The Indian Council of Forestry Research and Education was declared an autonomous Council under the then Ministry of Environment and Forests, Govt. of India in June, 1991 In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
54	2534	As per the latest ISFR-2021, the order of forest carbon stock under different carbon pools is: 1. Litter > soil organic carbon > above + below ground biomass > dead wood 2. Above + below ground biomass > soil organic carbon > litter > dead wood 3. Dead wood > soil organic carbon > above + below ground biomass > litter 4. Soil organic carbon > above + below ground biomass > litter >dead wood A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
55	2535		4.0	1.00

		World Agroforestry Centre, a brand name used by the International Centre for Research in Agroforestry, an international institute is headquartered in: 1. Beijing, China 2. Yokohama, Japan 3. Nairobi, Kenya 4. Vienna, Austria A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
56	2536	Botanical Survey of India (BSI) located in Kolkata, West Bengal, India was established in the year: 1. 1864 2. 1878 3. 1890 4. 1906 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
57	2537	The Center for International Forestry Research (CIFOR) and World Agroforestry (ICRAF) are the world's leading research and development organizations focused on forestry and agroforestry joined with each other in: 1. 2010 2. 2014 3. 2019 4. 2023 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

58	2538	The *Eucalyptus tereticornis*, a very important industrial tree species widely grown in different parts of India is native of : 1. Central America 2. Australia 3. Bahama 4. China A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

59	2539	Given below are two statements: Statement (I): The Convention on Biological Diversity (CBD) was adopted during the Earth Summit held in Rio de Janeiro in 1991. Statement (II): India became a party to the Convention on Biological Diversity (CBD) in 1995. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

60	2540	Which is the state among the followings which has reservation policy for diiferent level of job(s) for B.Sc. Forestry professionals with appropriate weightage/ preferences in their state forest department? 1. Uttarakhand 2. Karnataka 3. Uttar Pradesh 4. Haryana A1 : 1	4.0	1.00

		A2 : 2 A3 : 3 A4 : 4		
Objective Question				
61	2541	Environmental science is defined by which of the following statements? 1. Study of the interactions between the environment's and humans only 2. Study of the interactions between the environment's and physical components 3. Study of the interactions between the environment's and chemical components 4. Study of the interactions between the environment's physical, chemical, and biological components A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
62	2542	Which is the first zone of purification in a sand bed? 1. Heterotrophic zone 2. Schmutzdecke zone 3. Electrolytic zone 4. Autotrophic zone A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
63	2543	Which process of water treatment is done to avoid floating debris, branches, trees, or other large particles suspended in water? 1. Primary sedimentation 2. Secondary sedimentation 3. Screening 4. Aeration A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
64	2544	When Environmental Lapse Rate (ELR) is greater than Adiabatic Lapse Rate (ALR), then which of the following occurs? 1. Super adiabatic lapse rate 2. Neutral lapse rate 3. Adiabatic lapse rate 4. Sub adiabatic lapse rate A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
65	2545	Which of the following air pollution control device has maximum efficiency? 1. Spray tower 2. Wet cyclonic scrubber 3. Dynamic precipitator 4. Electrostatic precipitator A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
66	2546	Which of the following device is used to prevent the clogging of sewer pipes? 1. Drop manhole 2. Storm regulators 3. Flushing tank 4. Lamp hole A1 : 1 A2 : 2 A3 : 3	4.0	1.00

		A4 : 4		
Objective Question				
67	2547	Which of the following gas is released when alum is added to water? 1. $Ca(OH)_3$ 2. CO_2 3. $Al(OH)_3$ 4. $CaSO_4$ A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
68	2548	Which of the following is not commonly used as a filter material in the treatment of water? 1. Garnet sand 2. Crushed rock 3. Sand 4. Anthracite A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
69	2549	Which of the following is correct regarding disposal of waste by land filling? 1. Economical method 2. Preferred in low lying areas 3. Foul gases are not produced 4. Separation of different types of waste not required A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question				
70	2550	Under which rule of Government, guidelines for solid waste management are followed today? 1. Municipal Solid Waste Rules, 2000 2. Municipal Solid Waste Rules, 2016 3. Solid Waste Rules, 2000 4. Solid Waste Rules, 2016 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
71	1003051	The depletion of the ozone layer in the stratosphere is a concern because ozone helps to absorb harmful: 1. Ultraviolet (UV) radiation 2. Visible light 3. Infrared radiation 4. Microwaves A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				

72	1003052	Latent heat is the energy absorbed or released during a change of state of a substance, such as water. During evaporation, water absorbs latent heat, which: 1. Increases the air temperature 2. Decreases the air temperature 3. Has no effect on air temperature 4. Creates condensation A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
73	1003053	Regarding the laws of radiation: Which of the following statements accurately describes the relationship between an object's temperature and the peak wavelength of the radiation it emits? 1. As the temperature of an object increases, the peak wavelength of emitted radiation remains constant 2. Higher object temperatures lead to a shorter peak wavelength of emitted radiation 3. Lower object temperatures result in a higher intensity of emitted radiation across all wavelengths 4. The peak wavelength of emitted radiation is independent of the object's material composition A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
74	1003054	Balanced forces in the atmosphere refer to a situation where: 1. Horizontal pressure gradients are minimal, and Coriolis force remains negligible 2. The force due to the pressure gradient is exactly balanced by the Coriolis force, resulting in a steady-state horizontal motion 3. Friction from the Earth's surface significantly disrupts the influence of pressure gradients on wind direction 4. Vertical air motions dominate, with strong updrafts and downdrafts influencing wind speed A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

75	1003055	Gradient wind is a type of wind that exists when: 1. The Coriolis force exactly balances the pressure gradient force, resulting in geostrophic flow 2. There is an imbalance between the pressure gradient force and the Coriolis force, causing air to curve slightly across isobars 3. Friction from the Earth's surface significantly disrupts the direction of horizontal winds 4. Vertical air motions are dominant, causing air parcels to rise or sink rapidly A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

76	1003056	An air parcel is considered stable when: 1. It readily cools and condenses upon rising, leading to the formation of clouds 2. A displaced air parcel tends to return to its original position after a vertical disturbance 3. A parcel of air never displaced from its position 4. A parcel of air that drifts horizontally due to wind A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

77	1003057	Which of the following statements is not true about hail formation? 1. Hailstones grow by repeated collisions with supercooled water droplets and ice crystals within the cloud 2. Hail requires strong updrafts within a thunderstorm cloud to keep hailstones suspended and growing 3. The layered structure of hailstones reflects the changing conditions they experience during their growth 4. Hailstones typically form in the warmest part of a thunderstorm cloud, near the cloud base A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00

Objective Question

78	1003058	A weather station uses a tipping bucket rain gauge to measure precipitation. This instrument works by: 1. Recording the wind speed and direction as rain falls onto a rotating vane 2. Collecting rainfall in a funnel that tips after a specific amount is collected, triggering a counter 3. Measuring changes in air pressure as precipitation falls onto a pressure-sensitive membrane 4. Using a laser beam to detect the presence and intensity of falling rain droplets A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
79	1003059	As per ICAR, how many Agro-Ecological Regions (AER) are there in India? 1. 8 2. 15 3. 20 4. 36 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
80	1003060	Arrange the latitudes in order of increasing values. (A). Horse latitudes (B). Equator (C). Screaming sixties (D). Furious fifties Choose the **correct** answer from the options given below: 1. (A), (B), (C), (D). 2. (B), (C), (D), (A) 3. (B), (A), (D), (C). 4. (C), (B), (D), (A). A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
81	1003061	Which type of wind a cyclone is? 1. Geostrophic wind 2. Gradient wind 3. Cyclostrophic wind 4. Trade wind A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
82	1003062	Arrange the latitude as per their mean annual temperature (from the warmest to the coldest) 1. 0º-10ºN-50ºN-90ºN 2. 10ºN-0º-50ºN-90ºN 3. 90ºN-50ºN-0º-10ºN 4. 90ºN-50ºN-10ºN-0º A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
83	1003063		4.0	1.00

Match **List-I** with **List-II**

List-I	**List-II**
(Fact /feature/event/phenomena**)**	**(**Scientist Associated**.)**
(A). Climatic classification	(I). Penmann
(B). Solar radiation distribution	(II). Troll
(C). Potential Evapotranspiration	(III). Halley
(D). Origin of monsoon	(IV). Milankovitch

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (II), (B) - (I), (C) - (IV), (D) - (III)
3. (A) - (I), (B) - (II), (C) - (IV), (D) - (III)
4. (A) - (II), (B) - (IV), (C) - (I), (D) - (III)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

84 1003064 4.0 1.00

Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R).

Assertion (A) : January is the coldest month at Delhi

Reason (R) : The earth gets minimum radiation as the sun-earth distance is maximum in January.

In light of the above statements, choose the *correct* answer from the options given below.

1. Both (A) and (R) are true and (R) is the correct explanation of (A).
2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A).
3. (A) is true but (R) is false.
4. (A) is false but (R) is true.

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

85	1003065	Specific humidity is maximum at the 1. Equator 2. Pole 3. Tropic of Cancer 4. Tropic of Capricorn A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
86	1003066	What is the optimum cardinal temperature (°C) of wheat? 1. 20 2. 25 3. 30 4. 35 A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
87	1003067	What is the optimum temperature range of milk production? 1. 0-15 ^{o}C 2. 15-20 ^{o}C 3. 21-25 ^{o}C 4. 26-30 ^{o}C A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
88	1003068		4.0	1.00

		What is the best temperature range for best yield of tomatoes? 1. 0 to 5 ^{o}C 2. 6 to 10 ^{o}C 3. 16 to 21 ^{o}C 4. 25 to 30 ^{o}C A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
89	1003069	Arrange the surface according to albedo of shortwave radiation. 1. Crop plants> Dark soils> Fresh snow> Dry sand dunes 2. Fresh snow> Crop plants> Dark soils> > Dry sand dunes 3. Dry sand dunes> Fresh snow> Dark soils> Crop plants 4. Dark soils> Crop plants> Dry sand dunes> Fresh snow A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
90	1003070		4.0	1.00

Match **List-I** with **List-II**

List-I	List-II
(Crop)	**(Water reqirement)**
(A). Wheat	(I). 300 – 500 mm
(B).Tomato	(II).600 - 800 mm
(C). Bean	(III). 900 – 2500 mm
(D). Rice	(IV).450 – 650 mm

Choose the **correct** answer from the options given below:

1. (A) - (I), (B) - (II), (C) - (III), (D) - (IV)
2. (A) - (IV), (B) - (II), (C) - (I), (D) - (III)
3. (A) - (II), (B) - (III), (C) - (IV), (D) - (I)
4. (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

A1 : 1

A2 : 2

A3 : 3

A4 : 4

Objective Question

91 1003071 4.0 1.00

Conditions favourable for the development of thunder storms

(A). Weak advection due to intense heating of the land surface,

(B). Radiational cooling at upper levels

(C). Passage of cold, moist air mass over the warm water surface

(D). Warm advection aloft

Choose the ***correct*** answer from the options given below:

1. (A) and (C) only.
2. (B) and (C) only.
3. (C) and (D) only.
4. (A) and (D) only.

A1 : 1

A2 : 2

A3 : 3

		A4 : 4		
Objective Question				
92	1003072	Given below are two statements: Statement (I): Generally hail storms develop in the cumulonimbus cloud. Statement (II): Large hails are always associated with thunderstorms . In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
93	1003073	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : The extinction coefficient is primarily determined by the inclination and arrangement of leaves Reason (R) : In a herbaceous plant community, the extinction coefficients are usually 0.7 to 1.0 in stands with more or less horizontal leaves. In light of the above statements, choose the *correct* answer from the options given below. 1. Both (A) and (R) are true and (R) is the correct explanation of (A). 2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A). 3. (A) is true but (R) is false. 4. (A) is false but (R) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
94	1003074		4.0	1.00

		Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : A degree day is a measurement of the departure of the mean daily temperature above minimum threshold temperature for a crop. Reason (R) : The degree-day concept assumes that the relationship between growth and temperature is linear as predicted by the Van't Hoff law. In light of the above statements, choose the *correct* answer from the options given below. 1. Both (A) and (R) are true and (R) is the correct explanation of (A). 2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A). 3. (A) is true but (R) is false. 4. (A) is false but (R) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
95	1003075	Given below are two statements: Statement (I): Shelter does not change radiation balance significantly, except near the barrier. Statement (II): The transfer of sensible heat to the evaporating or transpiring surface is also considerably reduced, particularly under advection. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
96	1003076		4.0	1.00

		Given below are two statements: Statement (I): Condensation of water vapour in pure moist air does not occur unless the relative humidity becomes 40-50%. Statement (II): The condensation of water vapour does not begin unless it has suitable nucleus on which water vapour may condense. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
97	1003077	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : The crop weather calendar consists of three parts viz. crop husbandry, normal weather requirements and weather warnings Reason (R) : The help in improving quality of agro-advisory based on medium range weather forecasting. In light of the above statements, choose the *correct* answer from the options given below. 1. Both (A) and (R) are true and (R) is the correct explanation of (A). 2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A). 3. (A) is true but (R) is false. 4. (A) is false but (R) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
98	1003078		4.0	1.00

		Given below are two statements: Statement (I): Hydrological drought is said to occur when the surface and ground water resources are too inadequate to meet the demand for water. Statement (II): According to IMD, hydrological drought over an area is defined as a situation when the seasonal rainfall received over the area is less than 75% of its long term average value. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
99	1003079	Given below are two statements: Statement (I): Dew point is the temperature at which saturation of the air occurs i.e. the temperature at which the observed vapour pressure is equal to saturation vapour pressure. Statement (II): : If the parcel of air is hypothetically held at constant pressure and vapour content, the temperature at which it must be cooled to reach saturation is called its dew point. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
100	1003080	The concept of water balance refers to the: 1. Exchange of water vapor between the Earth's surface and the atmosphere (evapotranspiration) 2. Balance between precipitation, infiltration, runoff, and evapotranspiration in a specific area over time 3. Difference between the amount of water vapor in the atmosphere at saturation and the actual amount present 4. Process by which liquid water on the Earth's surface transforms into water vapor	4.0	1.00

		A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
101	1003081	Advective energy refers to the: 1. Energy transferred through the atmosphere by horizontal air movement 2. Energy available for plant growth processes like photosynthesis and respiration 3. Energy transferred from the sun to the Earth's surface in the form of radiation 4. Energy released during the process of water evaporation from plant leaves A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
102	1003082	A plant scientist studying drought tolerance in different crop varieties observes that one variety consistently maintains higher water use efficiency (WUE) compared to others under water stress conditions. What physiological adaptation might explain this higher WUE? 1. A larger root system that allows for deeper water extraction from the soil profile 2. Reduced stomatal conductance, leading to lower transpiration rates even under moderate water stress 3. Increased leaf area to capture more sunlight and enhance photosynthesis during water stress 4. Earlier flowering and seed production to complete the life cycle before severe drought conditions A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
103	1003083	Which of the following methods is used for the measurement of actual evapotranspiration? 1. Penman-Monteith method 2. FAO Penman-Monteith method 3. Lysimeter method 4. Modified FAO Penman-Monteith method	4.0	1.00

		A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
104	1003084	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : The value of crop coefficient varies during the crop growth periods and it can be more than one Reason (R) : The actual evapotranspiration of a crop can never be more than the reference evapotranspiration In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both (A) and (R) are correct and (R) is the correct explanation of (A). 2. Both (A) and (R) are correct but (R) is NOT the correct explanation of (A). 3. (A) is correct but (R) is not correct. 4. (A) is not correct but (R) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
105	1003085	Remote sensing technologies are increasingly used in agriculture for various purposes. Which of the following applications of remote sensing is not directly related to crop water management? 1. Using satellite imagery to estimate crop canopy temperature and identify areas with potential water stress 2. Mapping soil moisture content variations across a field using sensors mounted on agricultural machinery 3. Monitoring the areal extent of irrigated fields based on vegetation greenness detected from satellite data 4. Predicting potential crop yields based on historical yield data and weather information A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
106	1003086		4.0	1.00

		Clothesline effect occurs under which condition? 1. where vegetation height is smaller than that of the surroundings 2. where vegetation height is same with the surroundings but of different types 3. where vegetation height is greater than that of the surroundings 4. this effect has nothing to do with the crop height A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
107	1003087	Following are the state variables in the agricultural system simulation model (A). Thermal time requirement (B). Leaf Area Index (C). Sensible heat (D). Light extinction coefficient Choose the ***correct*** answer from the options given below: 1. (A), (B) and (C) only. 2. (A), and (B) only. 3. (A), (C) and (D) only. 4. (A) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
108	1003088	Crop model 'CERES' stands for 1. Crop Environment Resource Synthesis 2. Crop Environment Resource Simulation 3. Crop Engineered for Resource Synthesis 4. Crop Environment Interaction Research A1 : 1 A2 : 2	4.0	1.00

		A3 : 3 A4 : 4		
Objective Question				
109	1003089	Crop simulation model is (A). Deterministic type (B). Mechanistic type (C). Stochastic type (D). Conceptual type Choose the ***correct*** answer from the options given below: 1. (A), (B) and (D) only. 2. (A) and (B) only. 3. (A), (B), (C) and (D). 4. (B), (C) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
110	1003090	Given below are two statements: Statement (I): Model is an equation or set of equations which represents the behaviour of a system. Statement (II): Crop weather models are complex representation of the simple relationship between weather or climate and crop performance. In light of the above statements, choose the *most appropriate* answer from the options given below. 1. Both Statement (I) and Statement (II) are correct. 2. Both Statement (I) and Statement (II) are incorrect. 3. Statement (I) is correct but Statement (II) is incorrect. 4. Statement (I) is incorrect but Statement (II) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				

111	1003091	Which statements are true for the statistical models? (A). They are generic in nature (B). They have limited applicability in space and time (C). They account the underlying mechanism of cause and effects (D). Require historical data for their development Choose the ***correct*** answer from the options given below: 1. (A), (B) and (D) only. 2. (B) and (D) only. 3. (A), (B), (C) and (D). 4. (B), (C) and (D) only. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
112	1003092	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : Crop simulation model is a mathematical model Reason (R) : Crop simulation model is a physical representation of a real object. In light of the above statements, choose the *correct* answer from the options given below. 1. Both (A) and (R) are true and (R) is the correct explanation of (A). 2. Both (A) and (R) are true but (R) is NOT the correct explanation of (A). 3. (A) is true but (R) is false. 4. (A) is false but (R) is true. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
113	1003093	Among these, who was the pioneer of the applications of systems analysis approaches in agriculture? 1. J.L. Monteith 2. CT de Wit 3. Wladimir Köppen 4. Charles Warren Thornthwaite	4.0	1.00

		A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
114	1003094	The synoptic approach to weather forecasting involves analyzing atmospheric data at various levels. Which of the following data types is not typically used in synoptic analysis? 1. Sea surface temperature data 2. Upper-air wind speed and direction data 3. Soil moisture content data 4. Surface weather station observations (temperature, pressure, precipitation) A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
115	1003095	Meteorological satellites play a vital role in weather forecasting. Which of the following is not a primary benefit of using satellites for weather observations? 1. Providing continuous, global coverage of weather systems, overcoming limitations of ground-based weather stations 2. Measuring atmospheric parameters like temperature and humidity at various altitudes. 3. Offering real-time observations of cloud cover, movement, and type, aiding in tracking weather systems 4. Monitoring the movement and development of tropical cyclones and other severe weather events A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
116	1003096		4.0	1.00

		Weather forecast models rely on a vast amount of data for accurate predictions. How do satellite observations contribute to the input data used in these models? 1. By providing weather reports from many locations 2. By directly feeding weather forecast models with the latest satellite imagery for visual analysis 3. By offering crucial data on atmospheric conditions over vast oceans, where ground-based observations are scarce 4. By directly validating and correcting weather model outputs based on observed weather patterns A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
117	1003097	At what height, geostationary satellites are placed above the earth surface? 1. lower than 800 km 2. around 1000 km 3. about 18,000 km 4. around 36,000 km A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
118	1003098	Which of the following is correct about the 'Orange alert' issued by IMD for weather warnings? 1. Be prepared 2. Take action 3. Be updated 4. No action needed A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00
Objective Question				
119	1003099		4.0	1.00

		What is the criteria for below-normal rainfall for the whole of India during the monsoon season? 1. lower than 80% of LPA rainfall 2. lower than 90% of the LPA rainfall 3. lower than 95% of the LPA rainfall 4. lower than two times the long-term standard deviation of monsoon rainfall A1 : 1 A2 : 2 A3 : 3 A4 : 4		
Objective Question				
120	1003100	Given below are two statements, one is labelled as Assertion (A) and other one labelled as Reason (R). Assertion (A) : Crop yield forecasts can be improved using the remote sensing-based vegetation Indices Reason (R) : Vegetation indices are remote sensing-based indices providing information about vegetation health conditions In light of the above statements, choose the *most appropriate* answer from the options given below . 1. Both (A) and (R) are correct and (R) is the correct explanation of (A). 2. Both (A) and (R) are correct but (R) is NOT the correct explanation of (A). 3. (A) is correct but (R) is not correct. 4. (A) is not correct but (R) is correct. A1 : 1 A2 : 2 A3 : 3 A4 : 4	4.0	1.00