PREVIOUS YEAR PAPER

DSSSB Laboratory Assistant (Biology) 2021 — 28 August 2021, Shift 1

DSSSB Other Posts · 28 August 2021 · Shift 1

166 of the paper's 200 questions · +1 for a correct answer, −0.25 for a wrong one · 120 minutes

Left out of the original paper: 34 (any question that needs a figure, a symbol or formatting we cannot show, or whose text did not read back cleanly from the booklet).

Questions from the Delhi Subordinate Services Selection Board's paper of 28 August 2021, Shift 1. Each question is followed by its answer, and the answer key is repeated on the last page.

Take it as a timed practice test: exambharo.com/dsssb-other-posts/previous-year-papers/dsssb-other-posts-2021-laboratory-assistant-biology-28-aug-shift-1/

General Ability

1. Identify the wrong term in the series.
Z3, Y7, X12, V13

(a) Z3
(b) Y7
(c) X12
(d) V13

Answer: (d)

2. Out of the given options, three are similar in a cer n manner. However, one option is NOT like the other three. Select the option which is different m the rest.

(a) Earth
(b) Moon
(c) Saturn
(d) Venus

Answer: (b)

3. Out of the given options, three are similar in a certain manner. However, one option is NOT like the other three. Select the option which is different from the rest.

(a) Pen
(b) Perfume
(c) Pencil
(d) Marker

Answer: (b)

4. Select the option that is related to the third term on the same basis as the second term is related to the first term.
Doctor : Medicine :: Gardener:?

(a) Wire
(b) Grasses
(c) Water
(d) Harrow

Answer: (d)

5. Select the option that is related to the third term on the same basis as the second term is related to the first term.
Plant : Botany :: Animal :?

(a) Veterinary
(b) Ethology
(c) Zoology
(d) Zymology

Answer: (c)

6. In a certain code if ANCIENT is written as NAICNET, then HUSBAND will be written as:

(a) UHBSNAD
(b) HSUABDN
(c) SUHNABD
(d) BUSHNDA

Answer: (a)

7. In a certain code language, if DEER is coded [illegible]ION is coded as 12.5 then what is the code for BEAR ?

(a) 36
(b) 6.5
(c) 18.5
(d) 45

Answer: (b)

9. Tanya, Manya, Sanya, Ananya, Lavanya, Sharanya are sitting around a circle facing the centre under the following conditions:
1. Sharanya is sitting second to the left of Tanya, who lies at the immediate right of Manya.
2. Ananya is second to the right of the Lavanya.
Who is facing Sanya?

(a) Ananya
(b) Manya
(c) Lavanya
(d) Sanya

Answer: (b)

10. In the question given below, an assertion is given, followed by a reason. You have to decide whether the assertion is true, reason is true or both are true and if the reason is the correct explanation of the assertion.
Assertion- The Eiffel Tower is one of the largest structures made of steel.
Reason- Steel is an alloy of iron and carbon.

(a) Assertion is true, reason is false

(b) Assertion is false, reason is true

(c) Both assertion and reason are true, reason is the correct explanation of the assertion

(d) Both assertion and reason are true, reason is not the correct explanation of the assertion

Answer: (d)

11. In the question given below, a statement is given, followed by two arguments I and II. You have to consider the statement to be true even if it seems to be at variance from commonly known facts. You have to decide which of the given arguments is strong.
Statement- Indian doctors and engineers working abroad be called back to the country to avoid "Brain Drain".
Argument I- Yes, they should work for the motherland as they obtained education which could have been funded by taxpayers.
Argument II- No, they have freedom to decide where they want to work after working so hard.

(a) Only argument I is strong

(b) Only argument II is strong

(c) Neither I nor II is strong

(d) Both argument I and II are strong

Answer: (b)

12. Select the option that is related to the third term in the same basis as the second term is related to the first term.
12 : 180 :: 15 : ?

(a) 150

(b) 200

(c) 225

(d) 180

Answer: (c)

13. Complete the following series, 39,78,156, ___

(a) 312

(b) 321

(c) 310

(d) 301

Answer: (a)

15. Shubha is walking south to her home. She turns 90 degrees clockwise and walks 500m. Then she turns 45 degrees to her left and continues to walk. In which direction is she walking now?

(a) South-east
(b) South-west
(c) North-east
(d) North-west

Answer: (b)

16. A man walks out of his home and moves 10 km straight in the North direction. He then turns left and moves 14 km. How far is he from his initial position ?

(a) 17.2 km
(b) 10 km
(c) 1.72 km
(d) 20 km

Answer: (a)

General Awareness

21. In which city from the following cities, are the caves of ''Ajanta and Ellora'' Located ?

(a) Jaipur
(b) Aurangabad
(c) Bhopal
(d) Thane

Answer: (b)

22. Bharhut, known for its ancient sculptures is located in the state of _____.

(a) Madhya Pradesh
(b) Odisha
(c) Rajasthan
(d) Uttar Pradesh

Answer: (a)

23. According to the Government of India Report 2011-12, what percent of Indian population live below the poverty line?

(a) 15%
(b) 25%
(c) 21%
(d) 22%

Answer: (d)

24. Indian Council of Medical Research (ICMR) recommends how many kilo calories consumption per-person per-day for rural India?

(a) 2300
(b) 2400
(c) 2200
(d) 2100

Answer: (b)

25. Who among the following scientist is not related to Physics?

(a) Albert Einstein
(b) Ernest Rutherford
(c) Isaac Newton
(d) Charles Darwin

Answer: (d)

26. The book Systema Naturae is written by:

(a) Charles Darwin
(b) Carl Linnaeus
(c) John Dalton
(d) Rachel Carson

Answer: (b)

27. Which among the following have highest average life span?

(a) Tiger
(b) Human Being
(c) Tortoise
(d) Dog

Answer: (c)

28. Which of the following is not an important aspect of Human Development?

(a) Health
(b) Education
(c) Food
(d) Luxurious life

Answer: (d)

29. Which country amongst the following has the highest sex Ratio as per World Population Prospects 2019 released by World Bank?

(a) Latvia
(b) Australia
(c) Namibia
(d) Germany

Answer: (a)

30. Who was the first Governor General of India from 1773-1785?
    (a) John Shore
    (b) Warren Hastings
    (c) Gilbert Minto
    (d) John Adam
    Answer: (b)

31. What is the Blue Rebellion held in Bengal in 1859 about?
    (a) Refusal Of Indigo Cultivation
    (b) Water Crisis
    (c) Fish Cultivation
    (d) Green Revolution
    Answer: (a)

32. Initially, which among the following was the capital of Magadh Kingdom?
    (a) Patliputra
    (b) Ayodhya
    (c) Rajgir
    (d) Dilli
    Answer: (c)

33. In which form of government, power is exercised by a group of men?
    (a) Oligarchy
    (b) Kingship
    (c) Commandership
    (d) Zamindari
    Answer: (a)

34. On 11th July 2021, Prime Minister Narendra Modi asked people for nominations for which awards?
    (a) The Arjuna Awards
    (b) The Rajiv Gandhi Khel Ratna Awards
    (c) The Jnanpith Awards
    (d) The Padma Awards
    Answer: (d)

35. Nobel Peace Prize in 2020 was awarded to _____.
    (a) Amartya Sen
    (b) World Food Programme (WFP)
    (c) Kailash Satyarthi
    (d) World Health Organization
    Answer: (b)

36. Lal Bahadur Shashtri passed away (died) in which year?
    (a) 1966
    (b) 1967
    (c) 1968
    (d) 1969
    Answer: (a)

37. Through which Constitutional Amendment of India did Privy Purse get abolished?
    (a) 25th Amendment
    (b) 23rd Amendment
    (c) 26th Amendment
    (d) 21st Amendment
    Answer: (c)

38. Ryder cup is related to which sport?
    (a) Kho-Kho
    (b) Kabaddi
    (c) Hockey
    (d) Golf
    Answer: (d)

39. Salt Lake Stadium located in Kolkata is also know[illegible] _____.
    (a) National Stadium
    (b) Vivekananda Yuba Bharati Krirangan
    (c) Bharat Bharti Stadium
    (d) Shivaji Stadium
    Answer: (b)

40. How many countries took part in the first Commonwealth Games?
    (a) 18
    (b) 20
    (c) 11
    (d) 15
    Answer: (c)

Arithmetic Ability

42. A train starts with certain number of passengers. At the first station, one-third of the passengers get down and 96 new passengers get into the train at the next station. One half of passengers are now in train is 240. What was the number of passengers in the beginning?
    (a) 475
    (b) 572
    (c) 576
    (d) 498
    Answer: (c)

43. Find the average of first 40 multiples of 8?

(a) 150

(b) 162

(c) 164

(d) 158

Answer: (c)

44. The marked price of a chair was Rs 15,000/-. The shopkeeper was offering it for a discount of 25% but on further bargaining agreed to offer a successive discount and finally sold the chair for Rs 10,125/- What was the second discount offered by him?

(a) 5%

(b) 10%

(c) 20%

(d) 25%

Answer: (b)

45. An engineering student has to secure 50% marks to pass. He gets 213 marks and fails by 37 marks. Find the maximum marks?

(a) 400

(b) 450

(c) 500

(d) 480

Answer: (c)

47. By selling 25 books, the seller earns pr[illegible]equa[illegible] the cost price of 5 books. His profit percent is_____.

(a) 10%

(b) 20%

(c) 25%

(d) 15%

Answer: (b)

49. The ratio between two numbers is 3:2. If sum of these numbers is 60, then the product of the numbers is _____.

(a) 769

(b) 796

(c) 864

(d) 846

Answer: (c)

50. If (a+b):(b+c): (c+a)= 4:8:5 and a+b+c=17. Then the value of b is_____.

(a) 10

(b) 7

(c) 8

(d) 11

Answer: (b)

51. A certain sum amount to Rs.2600 in 2 years and Rs.2750 in 5 years. Find the rate percentage per annum?

(a) 5%

(b) 2.5%

(c) 2%

(d) 10%

Answer: (c)

52. Find the compound interest on Rs.50,000 for 3 years if the rates for 3 years are 5%,8%, and 10% respectively.

(a) Rs 11,780

(b) Rs 15,360

(c) Rs 13,270

(d) Rs 12,370

Answer: (d)

53. Without stoppage, the speed of train is 48 km/h and with stoppage it is 42 km/hr. For how many minutes, does the train stop per hour

(a) 12 min

(b) 15 min

(c) 7.5 min

(d) 9.5 min

Answer: (c)

54. The distance of the college and home to Rohit is 100 km. One day he was late by 1 hour than the normal time to leave for the college. So he increased his speed by 5 km/h and thus he reached to college at the normal time. What is the normal speed of Rohit?

(a) 10 km/h

(b) 15 km/h

(c) 20 km/h

(d) 25 km/h

Answer: (c)

55. A can do a job in 10 days and B can do it in 15 days. In how many days they together can do the job?

(a) 6.5

(b) 5.5

(c) 7.5

(d) 6

Answer: (d)

56. If 4 men or 6 women can do a piece of work in 12 days, how long will 8 men and 12 women take to finish the work?

(a) 3 days

(b) 5 days

(c) 6 days

(d) 9 days

Answer: (a)

57. A cylinder of radius 6 cm and height 16 cm is melted and recasted into a sphere of radius 2 cm. How many such spheres are got?

(a) 45

(b) 54

(c) 36

(d) 64

Answer: (b)

General English

61. The sentence below has been divided into three parts. Select the part of the sentence that has an error. If the sentence has no error, select the option 'No Error'.
The cobra is/ one of the world's/ deadliest snake.

(a) The cobra is

(b) one of the world's

(c) deadliest snake.

(d) No Error

Answer: (c)

62. The sentence below has been divided into three parts. Select the part of the sentence that has an error. If the sentence has no error, select the option 'No Error'.
We do not only meet to share/ each other's burdens but also to/ partake in each other's joys.

(a) We do not only meet to share

(b) each other's burdens but also to

(c) partake in each other's joys.

(d) No Error

Answer: (a)

63. Select the word segment that substitutes (replaces) the bracketed word segment correctly and completes the sentence meaningfully. Select the option 'no correction required' if the sentence is correct as given.
When Mrs Cornor opened the (door, I asked that, “Have you seen Sarah.”)

(a) door, I asked, “Have you seen Sarah?”

(b) door, I asked that, “Have you seen Sarah?”

(c) door, I asked, “Have you seen Sarah.”

(d) No correction required

Answer: (a)

64. Select the word segment that substitutes (replaces) the bracketed word segment correctly and completes the sentence meaningfully. Select the option 'no correction required' if the sentence is correct as given.
You asked (me if they lived here.)

(a) me whether they lived here?

(b) me if they live here?

(c) me if had they lived here?

(d) No correction required

Answer: (d)

65. Fill in the blank with the most appropriate choice
Generally speaking, the Philips Curve tells the _____ ___ between inflation and unemployment.

(a) vulgarity

(b) linearity

(c) solidarity

(d) integrity

Answer: (b)

66. Fill in the blank with the most appropriate choice Thou is an _____ form of you.

(a) archaic

(b) mosaic

(c) photovoltaic

(d) voltaic

Answer: (a)

67. Some parts of a sentence have been jumbled up, and labelled P, Q, R and S. Select the option that gives the correct sequence in which these parts can be rearranged to form a meaningful and grammatically correct sentence.
Removal of this
P. from further calculations
Q. to the inferences
R. aberrant chromosome
S. makes no change
drawn.

(a) RPSQ
(b) RQSP
(c) RQPS
(d) RSPQ

Answer: (a)

68. The question below consist of a set of labelled sentences. Out of four options given, select the most logical order of the sentences which form a paragraph.
Rapper, actor and music producer Eminem is one of the best-selling musicians of the 21st century and one of the most influential rappers of all time.
P. Born Marshall Bruce Mathers III in 1972 in Missouri, Eminem had a turbulent childhood.
Q. He dropped out of school in the ninth grade and worked odd jobs until finally making it as a rapper upon the release of The Slim Shady LP in early 1999.
R. The album went multi-platinum, garnering Eminem [illegible] Grammy Awards and four MTV Video Music Awards.
S. In 2000, Eminem released his next and best selli[illegible]bum of all-time; The Marshall Mathers LP; it was noted as the fastest-selling album in rap histor
Two years later, he delivered the Academy [illegible]ning song "Lose Yourself," from the semi-autobiographical drama 8 Mile.

(a) SRQP
(b) PQRS
(c) RQPS
(d) SPQR

Answer: (b)

69. Select the word that is opposite in meaning (ANTONYM) to the word given below dissonance

(a) agreement
(b) ebullient
(c) hackneyed
(d) effusive

Answer: (a)

70. Select the word that is similar in meaning (SYNONYM) to the word given below veracity

(a) deceit
(b) credible
(c) unfair
(d) theory

Answer: (b)

71. Four words are given, out of which only one word is spelt correctly. Choose the correctly spelt word.

(a) dissemble
(b) dissamble
(c) disamble
(d) disemble

Answer: (a)

72. Four words are given, out of which only three words are spelt correctly. Choose the one spelt incorrectly.

(a) honorary
(b) intermedairy
(c) alleviate
(d) exculpate

Answer: (b)

73. Select the most appropriate meaning of the given idiom A house divided against itself cannot stand

(a) A hopeless case, a person or situation having no hope of positive change.
(b) Everyone involved must unify and function together or it will not work out.
(c) It's easy for a foolish person to lose his/ her money
(d) Being upset for something that happened in th ast

Answer: (b)

74. Select the most appropriate meaning of n giv diom A taste of your own medicine

(a) When you are mistreated the same way mistreat others
(b) Contrary the principles of fairness
(c) Speaking with enthusiasm
(d) You frequently see the same people in different places

Answer: (a)

75. Select the most appropriate 'one word ' for the expressions given below Urging or requesting (someone) solemnly or earnestly to do something

(a) Adjure
(b) Aeon
(c) Aisle
(d) Agony

Answer: (a)

76. According to experts, what distance were the Stonehenge transported and from where?

(a) From England over a distance of 135 miles
(b) From West Whales over a distance of 135 miles
(c) From Scotland about a distance of 135 miles
(d) From Ireland over a distance of 135 miles

Answer: (b)

78. In which country is the Stonehenge situated?
(a) Northern Ireland
(b) Scotland
(c) England
(d) West Whales
Answer: (c)

79. In how many stages were the Stonehenge built?
(a) four
(b) three
(c) two
(d) five
Answer: (b)

Discipline1

101. Who gave the first conclusive evidence on the role of bacteria in human diseases?
(a) Francesco Redi
(b) Robert Koch
(c) Antony Van Leeuwenhoek
(d) Louis Pasteur
Answer: (b)

102. Which enzyme is used by Chlorophyceae to br[illegible]k down the glycolate ?
(a) glycolate oxidase
(b) thylakoids
(c) glycolate dehydrogenase
(d) cellulose
Answer: (c)

103. In a polysaccharide the individual monosaccharides are linked by _____.
(a) glycosidic bond
(b) peptide bond
(c) Polysaccharides
(d) Rubisco
Answer: (a)

104. Which one of the following is not an viral antigen?
(a) hepatitis B surface antigen
(b) influenza virus hemagglutinin proteins
(c) rabies virus G protein
(d) Capsular polysaccharide
Answer: (d)

105. Which one of the following is not a general character of the ferns ?

(a) Plant body is a sporophyte.

(b) Roots are adventitious.

(c) Flowers have both androecium and gynoecium

(d) The rhizome is the stem of the fern plant.

Answer: (c)

106. Which one of the following is not a part of Xylem ?

(a) Tracheids

(b) Xylem parenchyma

(c) Vessels

(d) companion cells

Answer: (d)

107. Which meristem occurs in the mature regions of roots and shoots and responsible for secondary growth ?

(a) Intercalary meristem

(b) Lateral meristem

(c) Simple tissue

(d) Apical meristem

Answer: (b)

108. Which of the following is not an objective of Pla breeding?

(a) Development of high productivity crop varie

(b) Disease resistance

(c) Adaptability to wide range of habitats

(d) Not resistant to alkaline and saline soil conditions

Answer: (d)

109. 'Metha Jahar' which is useful in rheumatism is obtained from -

(a) Claviceps

(b) Aconitum napellus

(c) Plantago ovata

(d) Sesamum indicum

Answer: (b)

110. Which among the following is responsible for modification in DNA and causes a variation in the phenotype and genotype of a creature ?

(a) Mutation

(b) Dominance

(c) Segregation

(d) Codominance

Answer: (a)

111. Which technique is based on the principle of blotting for the analysis of specific RNA in a complex mixture?

(a) DNA Technology
(b) Northern Blot
(c) Western Blot
(d) Gene Therapy

Answer: (b)

112. Which among the following involves the removal of non-coding sequences and joining of the coding sequences ?

(a) Transcription
(b) Translation
(c) RNA Splicing
(d) DNA Replication

Answer: (c)

113. Which of the following is not a type of Ecology?

(a) Animal Ecology
(b) Global Ecology
(c) Population Ecology
(d) Landscape Ecology

Answer: (a)

114. The term taxonomy was coined by -

(a) Aristotle
(b) A. P. de Candolle
(c) Theophrastus
(d) Carl Linnaeus

Answer: (b)

115. Who wrote the book named 'Historia Plantarum' ?

(a) Carl Linnaeus
(b) Linnaeus
(c) Aristotle
(d) Theophrastus

Answer: (d)

116. The pollination takes place between flowers borne on two different plants of the same species is known as -

(a) Geitonogamy
(b) Xenogamy
(c) Hybridism
(d) Homogamy

Answer: (b)

117. Cleistogamy is not found in which of the following flower ?

(a) Commelina benghalensis

(b) Drosera

(c) Ixora

(d) Oxalis

Answer: (c)

118. Which part of plant helps in synthesisation of plant growth and regulates reserve food material?

(a) Stem

(b) Leaves

(c) Roots

(d) Flower

Answer: (c)

119. Which of the following statement is incorrect about Photosynthesis process ?

(a) Energy stored in sugar molecules

(b) Carbon dioxide and water used

(c) Carbon dioxide and water released

(d) Produces oxygen

Answer: (c)

120. Who among the following was able to produce th allus culture from the cut piece of stem of Nicotiana tabacum ?

(a) C. O. Miller

(b) Folke Karl Skoog

(c) F. C. Steward

(d) S. M. Caplin

Answer: (b)

Discipline2

121. Which statement is incorrect about Callus Culture ?

(a) Callus tissue is good source of genetic or karyotype variability.

(b) The whole plant can be regenerated in large number from callus tissue.

(c) Biochemical assays cannot be perform ed from callus culture.

(d) Callus culture is very useful to obtain commercially important secondary metabolites.

Answer: (c)

122. Which of the following is not a part of mass spectrometry ?

(a) Ionizer

(b) deceleration

(c) Deflector

(d) Detector

Answer: (b)

123. _____is the protection of emasculated flower from contamination by undesirable pollen grains.

(a) Emasculation
(b) Intervarietal Hybridization
(c) Bagging
(d) Intra-varietal Hybridization

Answer: (c)

124. The study of structure and function of entire genome of an organism is referred as -

(a) Gene finding
(b) Genomics
(c) Proteomics
(d) Sequencing

Answer: (b)

125. Who is known as the 'Father of Biostatistics' ?

(a) Francis Galton
(b) Walter Weldon
(c) William James
(d) Ben Hesper

Answer: (a)

126. Which one of the following is not an example of erential statistics ?

(a) Index numbers
(b) Statistical quality control
(c) vital statistics
(d) Correlation

Answer: (d)

127. Which microbe is not used for the industrial production of organic acids ?

(a) Vibrio cholerae
(b) Aspergillus Niger
(c) Acetobacter acute
(d) Lactobacillus

Answer: (a)

128. Name the medium used for casein hydrolysis.

(a) Peptone water
(b) Skim milk agar
(c) Nutrient agar
(d) Egg saline medium

Answer: (b)

129. Which among the following is not an objective of natural resource management ?

(a) To provide resources for future generations.

(b) To maintain ecological diversity.

(c) Increase agricultural practices.

(d) To maintain employment facilities for people.

Answer: (d)

130. Which one of the following is a document for recording the list of the endangered and rare species of animals, plants, fungi as well as some local species also ?

(a) Blue Data Book

(b) Red Data Book

(c) Black Data Book

(d) Green Data Book

Answer: (b)

131. According to which scientist- "Plant breeding is the art and the science of improving the heredity of crop plants for the benefit of human kind" ?

(a) Frankel

(b) N.W. Simmonds

(c) J.M. Poehlman

(d) Riley

Answer: (c)

132. Which one of the following is not an advantage of Biofertilizers ?

(a) Biofertilizers act as supplements to chemical fertilisers.

(b) They control and inhibit pathogenic soil bacteria.

(c) Crop yield demit by 10–20 percent by their use.

(d) Eco-friendly in nature and pollution free.

Answer: (c)

133. Which biofertilizer is capable of solubilising or mobilising the fixed insoluble phosphates of the soil ?

(a) Biological nitrogen fixing biofertilizers

(b) Phosphate solubilising biofertilizers

(c) Sulphate biofertilizer

(d) Sulphate fixing biofertilizer

Answer: (b)

134. The term 'ethno botany' was coined by -

(a) Moldenke

(b) Hartweh

(c) J.W. Harshberger

(d) Schultes

Answer: (c)

135. Who defined 'ethno botany' as the study of the relationships between the people of a primitive society and plants ?

(a) Alcom
(b) Schultes
(c) Hartweh
(d) Moldenke

Answer: (b)

136. Orange-red edible dye is extracted from -

(a) alstroemeria
(b) phalaenopsis
(c) dianthus
(d) Bixa orellana

Answer: (d)

137. Which one of the following is not a characteristic of Intellectual Property Rights Laws ?

(a) Intangible Property
(b) Creation of Statute
(c) Tangible Property
(d) Bundle of Legal Rights

Answer: (c)

138. Which plants are considered as a rich resources of ingredients which can be used in drug development either pharmacopoeial, non- pharmacopoeial or synthetic drugs ?

(a) Spruce
(b) Fern
(c) Herbaceous Plants
(d) Medicinal Plants

Answer: (d)

139. Which type of vitamin is not present in Mushrooms?

(a) Vitamin A
(b) Vitamin B
(c) Vitamin C
(d) Vitamin D

Answer: (a)

140. _____ is a technique used to disinfect seed beds.

(a) Stratification
(b) Scarification
(c) Salinization
(d) Solarisation

Answer: (d)

Discipline3

141. _____ is a garden adornment.

(a) Bird bath
(b) Pergola
(c) Flower bed
(d) Carpet bed

Answer: (a)

142. Which field of biogeography focused on the protection and restoration of species based upon the known historical and current ecological information?

(a) Ecological biogeography
(b) Historical biogeography
(c) Conservation biogeography
(d) Paleobiogeography

Answer: (c)

143. Which biodiversity refers to the variations in the plant and animal species living together and connected by food chains and food webs ?

(a) Biological biodiversity
(b) Ecological biodiversity
(c) Species biodiversity
(d) Genetic biodiversity

Answer: (b)

144. All plants produced via tissue culture fr[illegible]ame parent plant are not identical to each other because of the phenomenon of _____.

(a) cybridisation
(b) colonal propogation
(c) somoclonal variation
(d) somatisation

Answer: (c)

145. _____can be defined as the marriage of environmental issues with the advances in biotechnology.

(a) Bioremediation
(b) Environmental biotechnology
(c) Environmental biology
(d) Environmental science

Answer: (b)

146. Microbes can convert toxic chemicals to harmless chemicals by the process of _____ .

(a) Biomagnification
(b) Microbial decomposition
(c) Oxidative reduction
(d) Bioremediation

Answer: (d)

147. _____ is responsible for extrastelar secondary growth of dicot stems.

(a) Parenchyma
(b) Intercalary meristem
(c) Apical meristem
(d) Phellogen

Answer: (d)

148. _____discovered the phenomenon of double fertilization in certain plants.

(a) J. G. Kolreuter
(b) Nawaschin
(c) Hofmeister
(d) Theophrastus

Answer: (b)

149. _____is the study of a population or comm' .y in relation to their environment.

(a) Autecology
(b) Synecology
(c) Palaeoecology
(d) Cytoecology

Answer: (b)

150. _____is the process of absorption of water by colloidal substances.

(a) Gravitational potential
(b) Matric potential
(c) Diffusion
(d) Imbibition

Answer: (d)

151. Which instrument is used for measuring the transpiration rate ?

(a) Calorimeter
(b) Potometer
(c) Hydrometer
(d) Hygrometer

Answer: (b)

152. Which of the following is an example of negative phototaxis ?

(a) Cockroaches

(b) Maggots

(c) Wood lice

(d) Cockroaches, Maggots & Wood lice, all are correct

Answer: (d)

153. _____is a response that involves changes in the speed of movement of the whole body in response to stimuli like humidity, preserve and diffused light.

(a) Klinokinesis

(b) Reflexes

(c) Orthokinesis

(d) Instinct

Answer: (c)

154. _____is the region of the brain responsible for maintenance of homeostasis and regulation of the endocrine system.

(a) Hippocampus

(b) Hypothalamus

(c) Thalamus

(d) Cerebral Hemisphere

Answer: (b)

155. The cranial cavity is divided into compartments by _____.

(a) Pia mater

(b) Meningeal sinuses

(c) Arachnoid mater

(d) Meningeal septa

Answer: (d)

156. One can discover and define binding sites for transcription factors using the method of _____.

(a) Microarray

(b) DNAse I footprinting

(c) Western blotting

(d) Northern blotting

Answer: (b)

157. Chorionic gonadotrophin produced by biotechnology can be used to:

(a) Halt the progress of rickets.

(b) Treat infertility in women.

(c) Dissolve blood clots in stroke patients.

(d) Enhance immunity in infants.

Answer: (b)

158. _____is the practise of eating insects like tarantulas and centipedes.

(a) Melittology
(b) Myrmecology
(c) Entomology
(d) Entomophagy

Answer: (d)

159. Insects have a _____heart and the circulatory system is _____.

(a) Dorsal, closed
(b) Ventral, closed
(c) Dorsal, open
(d) Ventral, open

Answer: (c)

160. _____transports the urine from the bladder to outside the body in men.

(a) Ejaculatory duct
(b) Ureter
(c) Urethral meatus
(d) Epididymis

Answer: (c)

Discipline4

161. _____is not a part of human female externa enitalia.

(a) Mons pubis
(b) Labia minora
(c) Antrum
(d) Hymen

Answer: (c)

162. A facility dedicated to the storage of cells and tissues of endangered organisms is called a _____.

(a) Gene library
(b) Gene bank
(c) Genomic DNA libraries
(d) Gene pool

Answer: (b)

163. _____ is the process in which macromolecules are released out of cells.

(a) Mesocytosis
(b) Phagocytosis
(c) Exocytosis
(d) Endocytosis

Answer: (c)

164. The biological resource "Flybase" is a_____ .

(a) biodiversity database

(b) model organism database

(c) biomolecular database

(d) literature database

Answer: (b)

165. If an organism simply cannot live without a host organism, it is termed a/an _____ parasite.

(a) Faculative

(b) Obligatory

(c) Occasional

(d) Anberrant

Answer: (b)

166. _____is used to detect and identify intestinal protozoans in stool samples.

(a) Wheatley Trichrome staining

(b) Endoscopy

(c) Hematocrit method

(d) Knott's test

Answer: (a)

167. Virus-infected cells secrete proteins called -

(a) Antibodies

(b) Interferons

(c) Interleukins

(d) Complement proteins

Answer: (b)

168. Viral proteins produced inside infected cells in a human body are presented as _____ .

(a) Autoantigens

(b) Native Antigens

(c) Exogenous antigens

(d) Endogenous antigens

Answer: (d)

169. _____is secreted to maintain a balance of glucose and/or salt in the blood.

(a) Gastrin

(b) Somatostatin

(c) Vasoactive intestinal peptide

(d) Glucagon

Answer: (b)

170. Which hormone stimulates the adrenal glands to produce hormones?

(a) Anti-Müllerian Hormone

(b) Dehydroepiandrosterone

(c) Adrenocorticotropin hormone

(d) Luteinizing hormone

Answer: (c)

171. Which of the following fish is not larvivorous fish ?

(a) Trichogaster

(b) Gambusia

(c) Haplochitus

(d) Pterophyllum

Answer: (d)

172. Abdominal dropsy of Carps is caused by_____.

(a) Aeromonas hydrophila

(b) Edwardsiella ictaluri

(c) Trypanosoma

(d) Myxobolus

Answer: (a)

173. Which of the following is not an assumption of C n's kappa coefficient ?

(a) the units are independent

(b) the categories on the nominal scale are not tually exclusive

(c) the categories on the nominal scale endent

(d) the readers/raters are independent

Answer: (b)

174. _____is used to compare whether differences in three or more samples are statistically significant.

(a) Paired t-tests

(b) Z-tests

(c) ANOVA test

(d) Unpaired t-tests

Answer: (c)

175. What is a controlled experiment?

(a) An experiment where the scientist controls how many readings will be taken.

(b) An experiment where at least two types of variables are measured.

(c) An experiment where there are at least two groups which differ in the condition being tested.

(d) An experiment where the lower and upper limits for a factor are decided before the experiment is started.

Answer: (c)

176. _____ technique is generally followed when the population is finite.

(a) Purposive Sampling
(b) Area Sampling
(c) Systematic Sampling
(d) Neither Purposive Sampling, neither Area Sampling nor Systematic Sampling

Answer: (c)

177. _____is infertile female developed from fertilized eggs.

(a) Queen bee
(b) Worker bee
(c) Drone
(d) Female bee

Answer: (b)

178. Honeybees mix beeswax and resins to produce _____.

(a) Royal Jelly
(b) Honey
(c) Propolis
(d) Venom

Answer: (c)

179. Pebrine disease of silkworms is caused by a ___ ___ .

(a) Bacteria
(b) Protozoa
(c) Fungus
(d) Virus

Answer: (b)

180. Muga silk is produced by the larva of _____.

(a) Anthereapaphia
(b) Attacus Ricinii
(c) Antheraea assamensis
(d) Attacus alts

Answer: (c)

Discipline5

181. Which among the following is a physiological character of Gold fish (a common aquarium fish)?

(a) Thermotolerance
(b) Lack of teeth
(c) Tolerance to acids.
(d) Absence of stomach.

Answer: (d)

182. In aquaculture, nitrogenous fertilizer is supplied by:

(a) Fish culture

(b) Organic compost

(c) Ammonium nitrate

(d) Potassium nitrate

Answer: (a)

183. A small amount of the amniotic fluid can be collected using _____ .

(a) Ultrasonography

(b) Amniocentesis

(c) Fetoscopy

(d) Chorion villous biopsy

Answer: (b)

184. A genetic counsellor does NOT _____ .

(a) Provide information about the nature of inheritance of a particular trait

(b) Suggest options to clients based on their family history or personal genotypes

(c) Conduct tests for presence of a particular allele in one or both individuals in a couple

(d) Calculate and explain the probability of a child being affected by a inherited medical condition.

Answer: (c)

185. _____is a management tool designed to provide information on environmental performance to the right people at the right time.

(a) Environmental assessment

(b) Environmental auditing

(c) Environmental accounting

(d) Environmental management

Answer: (b)

186. WBC can move out of capillaries into tissues via the process of _____.

(a) Pinocytosis

(b) Chemotaxis

(c) Opsonization

(d) Diapedesis

Answer: (d)

187. _____ has a continuous connection with nuclear membrane.

(a) Golgi apparatus

(b) Lysosome

(c) Rough endoplasmic reticulum

(d) Cytoskeleton

Answer: (c)

188. _____ is a sense organ of Aurelia.

(a) Tester
(b) Tentaculocytes
(c) Nematocyst
(d) Tentilla

Answer: (b)

189. _____ is a disorder of the gastrointestinal system.

(a) Pneumonia
(b) Dysentery
(c) Tuberculosis
(d) Influenza

Answer: (b)

190. Epidemic dropsy is caused by _____.

(a) Excess consumption of cholesterol and saturated fats.
(b) Exposure to ionizing radiation.
(c) Consumption of adulterated edible oil.
(d) Deficiency of fluoride in the diet.

Answer: (c)

191. In fleas, hypo-pharynx, mandible and maxillae ar odified to form -

(a) Piercinig organs
(b) Tubular proboscis
(c) Chewing apparatus
(d) Grinding plates

Answer: (a)

192. _____ is used as an insecticide.

(a) Warfarin
(b) Pythrethrum
(c) Arsenic
(d) Organophosphate

Answer: (d)

193. _____ cell line was used for the production of polio vaccine.

(a) Dog kidney
(b) Primate kidney
(c) Mouse fibroblast
(d) Human Stem Cell

Answer: (b)

194. _____cell lines appear to be immortal.

(a) Primary

(b) Continuous

(c) Adherent

(d) Suspension

Answer: (b)

195. Certain insoluble carbohydrates should be present in our diet to:

(a) maintain balance in the clotting system

(b) promote adequate synthesis of glycoprotein enzymes

(c) reduce glycemic index of proteins

(d) add bulk to and soften stool.

Answer: (d)

196. The macro nutrients are carbohydrates, fats and -

(a) proteins

(b) vitamins

(c) minerals

(d) sugars

Answer: (a)

197. _____include floating plants, rooted plant gae, and invertebrates inhabiting standing freshwater bodies.

(a) Lotic Ecosystems

(b) Lentic Ecosystems

(c) Coastal Ecosystem

(d) Freshwater Ecosystem

Answer: (b)

198. The continental slope levels off between 4,000 and 6,000 m below sea level. This zone is called the _____.

(a) Hadopelagic Zone

(b) Bathypelagic Zone

(c) Abyssopelagic Zone

(d) Epipelagic Zone

Answer: (c)

199. The_____sits at the transition zone between the brain and the spinal cord.

(a) Cerebellum

(b) Pons

(c) Midbrain

(d) Medulla oblongata

Answer: (d)

200. The Alzheimer disease in humans is linked with the deficiency of _____ .

(a) dopamine

(b) glutamic acid

(c) Gamma Amino Butyric Acid

(d) acetylcholine

Answer: (d)

Answer key

Answer key from the Delhi Subordinate Services Selection Board's official answer key for this sitting. "—" means the key gave none.

General Ability

1	**(d)**	2	**(b)**	3	**(b)**	4	**(d)**	5	**(c)**	6	**(a)**
7	**(b)**	9	**(b)**	10	**(d)**	11	**(b)**	12	**(c)**	13	**(a)**
15	**(b)**	16	**(a)**								

General Awareness

21	**(b)**	22	**(a)**	23	**(d)**	24	**(b)**	25	**(d)**	26	**(b)**
27	**(c)**	28	**(d)**	29	**(a)**	30	**(b)**	31	**(a)**	32	**(c)**
33	**(a)**	34	**(d)**	35	**(b)**	36	**(a)**	37	**(c)**	38	**(d)**
39	**(b)**	40	**(c)**								

Arithmetic Ability

42	**(c)**	43	**(c)**	44	**(b)**	45	**(c)**	47	**(b)**	49	**(c)**
50	**(b)**	51	**(c)**	52	**(d)**	53	**(c)**	54	**(c)**	55	**(d)**
56	**(a)**	57	**(b)**								

General English

61	**(c)**	62	**(a)**	63	**(a)**	64	**(d)**	65	**(b)**	66	**(a)**
67	**(a)**	68	**(b)**	69	**(a)**	70	**(b)**	71	**(a)**	72	**(b)**
73	**(b)**	74	**(a)**	75	**(a)**	76	**(b)**	78	**(c)**	79	**(b)**

Discipline1

101	**(b)**	102	**(c)**	103	**(a)**	104	[illegible]	05	**(c)**	106	**(d)**
107	**(b)**	108	**(d)**	109	**(b)**	110	**(a)**	111	**(b)**	112	**(c)**
113	**(a)**	114	**(b)**	115	**(d)**	116	**(b)**	117	**(c)**	118	**(c)**
119	**(c)**	120	**(b)**								

Discipline2

121	**(c)**	122	**(b)**	123	**(c)**	124	**(b)**	125	**(a)**	126	**(d)**
127	**(a)**	128	**(b)**	129	**(d)**	130	**(b)**	131	**(c)**	132	**(c)**
133	**(b)**	134	**(c)**	135	**(b)**	136	**(d)**	137	**(c)**	138	**(d)**
139	**(a)**	140	**(d)**								

Discipline3

141	**(a)**	142	**(c)**	143	**(b)**	144	**(c)**	145	**(b)**	146	**(d)**
147	**(d)**	148	**(b)**	149	**(b)**	150	**(d)**	151	**(b)**	152	**(d)**
153	**(c)**	154	**(b)**	155	**(d)**	156	**(b)**	157	**(b)**	158	**(d)**
159	**(c)**	160	**(c)**								

Discipline4

161	**(c)**	162	**(b)**	163	**(c)**	164	**(b)**	165	**(b)**	166	**(a)**
167	**(b)**	168	**(d)**	169	**(b)**	170	**(c)**	171	**(d)**	172	**(a)**
173	**(b)**	174	**(c)**	175	**(c)**	176	**(c)**	177	**(b)**	178	**(c)**
179	**(b)**	180	**(c)**								

Discipline5

181	**(d)**	182	**(a)**	183	**(b)**	184	**(c)**	185	**(b)**	186	**(d)**	187	**(c)**	188	**(b)**
189	**(b)**	190	**(c)**	191	**(a)**	192	**(d)**	193	**(b)**	194	**(b)**	195	**(d)**	196	**(a)**
197	**(b)**	198	**(c)**	199	**(d)**	200	**(d)**								