POTENTIAL & CONCEPT EDUCATIONS

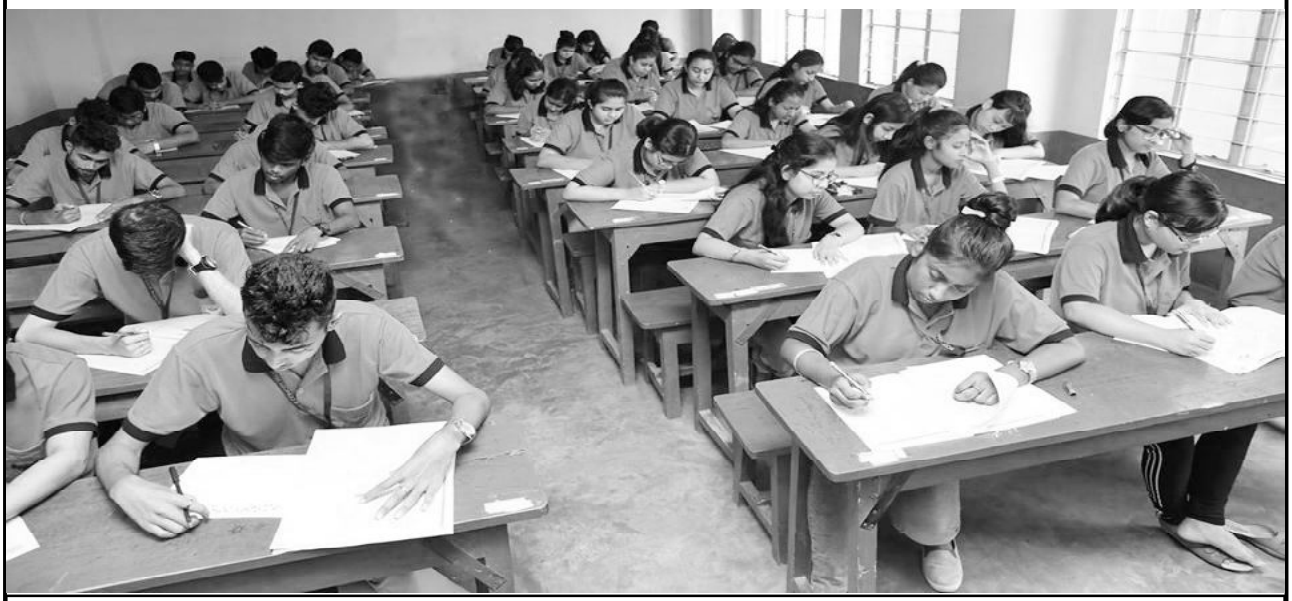
Most Trusted Institute of North-East

Academic Session : 2019 - 20

ANTS FULL TEST (TEST CODE : FT # 10)
(NEET PATTERN)
Target : NEET - 2020

Date : 07th June 2020 | Duration : 3 Hours | Max. Marks : 720

COURSE : Dropper, Target, DLP., ANTS



Please read the last page of this booklet for the instructions.

Potential & Concept Educations.

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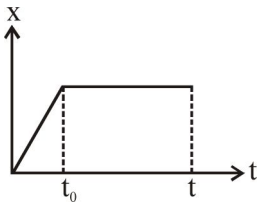
Note : For Answer keys and accurate Solutions please log on to www.potentialconcept.com

1. Figure shows the displacement time graph of a particle moving on the x-axis :-



(A) the particle is continuously going in positive x-direction

(B) the particle is at rest

(C) the velocity increases up to a time t_0 and then becomes constant

(D) the particle moves at a constant velocity up to time t_0 and then stops

2. Let ie, ic and ib represent the emitter current, collector current and the base current respectively in a transistor then :-

(a) i_c is slightly smaller than i_e

(b) i_c is slightly greater than i_e

(c) i_b is much smaller than i_e

(d) i_b is much greater than i_e

(A) a, d (B) b, c

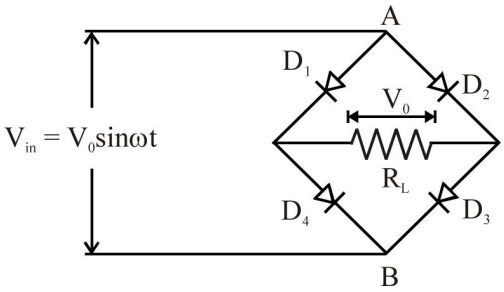
(C) a, c (D) b, d

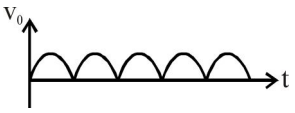
3. A car travels 6km towards north at an angle of 45° to the east and then travels distance of 4km towards north at an angle of 135° to the east. How far is the point from the starting point :-

(A) $\sqrt{50}$ km (B) 10 km

(C) $\sqrt{52}$ km (D) 5 km

4. For a given circuit output voltage across load Resistance will be :-



(A) 

(B) 

(C) Zero

(D) None of these

5. A truck travelling due north at 20m/s turns west and travels at the same speed. The change in velocity will be :-

(A) 40 m/s N-W (B) $20\sqrt{2}$ m/s N-W

(C) 40 m/s S-W (D) $20\sqrt{2}$ m/s S-W

6. In a fresneel Biprism Experiment, the distance between the source and the screen is D and that between source and biprism is a. The wavelength of light used is λ. The fringe width is β and refracting angle of biprism is A. The refractive index of material of biprism is :-

Space for rough work

(A) $1+\frac{D\lambda}{2aA\beta}$ (B) $1-\frac{D\lambda}{2aA\beta}$

(C) $1-\frac{D\lambda}{aA\beta}$ (D) $1+\frac{aA}{D\lambda\beta}$

7. If $\vec{A}=3\hat{i}+\hat{j}+2\hat{k}$ and $\vec{B}=2\hat{i}-2\hat{j}+4\hat{k}$ then find unit vector perpendicular to both $\vec{A}$ and $\vec{B}$:-

(A) $\frac{1}{\sqrt{3}}(\hat{i}-\hat{j}-\hat{k})$ (B) $-\frac{1}{\sqrt{3}}(\hat{i}-\hat{j}-\hat{k})$

(C) Both (A) and (B) (D) None

8. When red light is used instead of blue light in convex lens, its focal length will :-

(A) decrease

(B) remain same

(C) increase

(D) not depend on colour of light

9. If the velocity of a particle is $(10 + 2t^2)$m/s, then the average acceleration of the particle between 2 s and 5 s is :-

(A) 2 m/s^2 (B) 4 m/s^2

(C) 12 m/s^2 (D) 14 m/s^2

10. A convex lens (μ = 1.5) of focal length 10 cm is immersed in water (μ = 1.33). The new focal is :-

(A) 20 cm (B) 40 cm

(C) 48 cm (D) 12 cm

11. If the units of force, energy and velocity in a new system be 10 N, 5 J and 5 m/s respectively, then the unit of distance in this system is :-

(A) 0.25 m (B) 0.5 m

(C) 1 m (D) 2 m

12. An electron moves in a circular orbit with a uniform speed v. It produces a magnetic field B at the centre of the circle. The radius of the circle is proportional to :-

(A) $\frac{B}{v}$ (B) $\frac{v}{B}$

(C) $\sqrt{\frac{v}{B}}$ (D) $\sqrt{\frac{B}{v}}$

13. A open knife edge of mass M is dropped from a height 'h' on a wooden floor. If the blade penetrates a distance 'S' into the wood, average resistance offered by the wood to the blade is

(A) Mg (B) $Mg\left(1+\frac{h}{S}\right)$

(C) $Mg\left(1-\frac{h}{S}\right)$ (D) $Mg\left(1-\frac{h}{S}\right)^2$

14. A charged particle is moving in a uniform magnetic field in a circular path. Radius of circular path is R. When energy of particle is doubled, then new radius will be :-

(A) $R\sqrt{2}$ (B) $R\sqrt{3}$

(C) 2 R (D) 3 R

15. A block takes twice as much time to slide down a 45° rough inclined plane as it takes to slide down a similar smooth plane. The coefficient of friction is :-

(A) $\frac{3}{4}$ (B) $\frac{\sqrt{3}}{2}$

Space for rough work

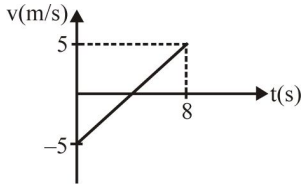
(C) $\frac{1}{4}$ (D) $\frac{1}{3}$

16. An electron (mass 9×10^{-31} kg, charge $= 1.6 \times 10^{-19}$ C) whose kinetic energy is 7.2×10^{-18} joule is moving in a circular orbit in a magnetic field of 9×10^{-5} weber/m^2. The radius of the orbit is :-

(A) 1.25 cm (B) 2.5 cm

(C) 12.5 cm (D) 25.0 cm

17. A particle of mass 1 kg is moving along a straight line. Its velocity-time graph is as shown in fig. Work done by the resultant of all forces acting on the particle from t = 0 to t = 8 s is



(A) 25 J (B) 50 J

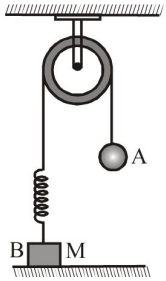
(C) Zero (D) 12.5 J

18. Two equal bar magnets are kept as shown in the figure. The direction of resultant magnetic field, indicated by arrow head at the point P is (approximately) :-

(A) → (B) ↗

(C) ↘ (D) ↑

19. In the adjoining diagram, the ball A is released from rest when the spring is at its natural length (neither stretched nor compressed). For the block B of mass M to leave contact with the ground at some time, the minimum mass of A must be :-



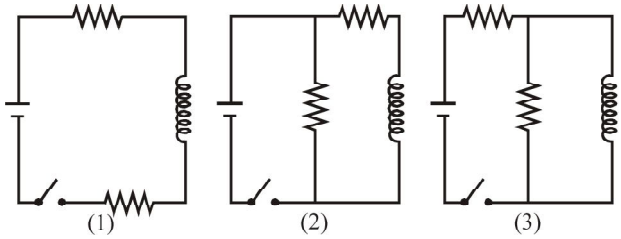
(A) $\frac{M}{2}$

(B) M

(C) 2M

(D) A function of mass M and force constant k of spring

20. The figure shows three circuits with identical batteries, inductors, and resistors. Rank the circuits, in the decreasing order, according to the current through the battery (i) just after the switch is closed and (ii) a long time later



(A) (i) $i_2 > i_3 > i_1$ ($i_1 = 0$) (ii) $i_2 > i_3 > i_1$

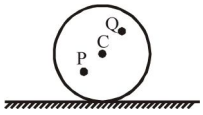
(B) (i) $i_2 < i_3 < i_1$ ($i_1 \neq 0$) (ii) $i_2 > i_3 > i_1$

Space for rough work

(C) (i) $i_2 = i_3 = i_1$ ($i_1 = 0$) (ii) $i_2 < i_3 < i_1$

(D) (i) $i_2 = i_3 > i_1$ ($i_1 \neq 0$) (ii) $i_2 > i_3 > i_1$

21. A disc is rolling (without slipping) on a frictionless surface. C is its center and Q and P are two points equidistant from C. Let V_P, V_Q and V_C be the magnitudes of velocities of points P, Q and C respectively, then :-



(A) $V_Q > V_C > V_P$

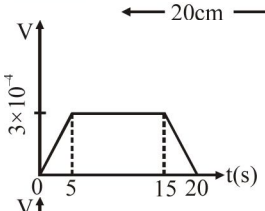
(B) $V_Q < V_C < V_P$

(C) $V_Q = V_P$, $V_C = \frac{1}{2}V_P$

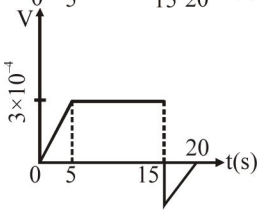
(D) $V_Q < V_C > V_P$

22. A square loop of side 5 cm enters a magnetic field with 1 cm/s. The front edge enters the magnetic field at t = 0 then which graph best depicts emf :-

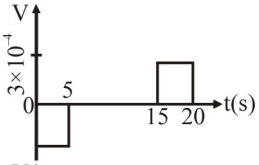
(A)



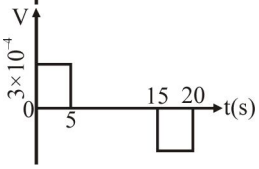
(B)



(C)



(D)

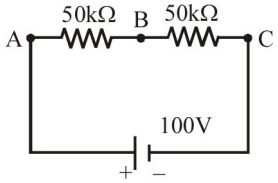


23. A child is standing with folded hands at the center of a platform rotating about its central axis. The kinetic energy of the system is K. The child now stretches his arm so that moment of inertia of the system doubles. The kinetic energy of the system now is :-

(A) 2K (B) $\frac{K}{2}$

(C) $\frac{K}{4}$ (D) 4K

24. In the adjacent shown circuit, a voltmeter of internal resistance R, when connected across B and C reads $\frac{100}{3}$V. Neglecting the internal resistance of the battery, the value of R is :-



(A) 100 kΩ (B) 75 kΩ

(C) 50 Ω (D) 25 kΩ

25. When wavelength of incident photon is decreased then :-

(A) Velocity of emitted photo-electron decrease

Space for rough work

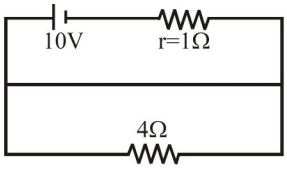
(B) Velocity of emitted photoelectron increases

(C) Velocity of photoelectron do not change

(D) Photo electric current increases

26. Potential difference across the terminals of the battery shown in figure is :-

(r = internal resistance of battery)



(A) 8V (B) 10V

(C) 6V (D) zero

27. When U^{238} changes into $_{82}Pb^{206}$, then the number of α and β-particles emitted are :-

(A) 6 and 6 (B) 8 and 8

(C) 6 and 8 (D) 8 and 6

28. An electric dipole is kept in non-uniform electric field. It experiences :-

(A) A force and a torque

(B) A force but not a torque

(C) A torque but not a force

(D) Neither a force nor a torque

29. Mercury can not be used as a moderator because :-

(A) It is a conductor

(B) It is much heavier than neutron

(C) It is less probable that neutron collides with mercury

(D) It is costly metal

30. The electric potential V is given as a function of distance x (metre) by $V = (5x^2 + 10x - 9)$ volt. Value of electric field at x = 1 m is :-

(A) $20\hat{i}$ V/m (B) $6\hat{j}$ V/m

(C) $-11\hat{i}$ V/m (D) $-20\hat{i}$ V/m

31. Liquid drops of mass m falling slowly one by one from a capillary tube of radius r. The surface tension of the liquid is :-

(A) mg / πr (B) mg / 2πr

(C) 2mg / πr (D) mg / π^2

32. At a certain distance from a point charge the electric field is 500V/m and the potential is 3000V. What is this distance :-

(A) 6m (B) 12m

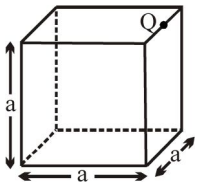
(C) 36m (D) 144m

33. An iron rod of length l and of cross-section area A is heated from 0ºC to 100ºC. If the rod neither expands nor bends, then the developed F is proportional to :-

(A) l (B) l^o

(C) l^{-1} (D) A^{-1}

34. In figure + Q charge is located at one of the edge of the cube, then electric flux through cube to + Q charge is :-



(A) $\frac{+Q}{\epsilon_0}$ (B) $\frac{+Q}{2\epsilon_0}$

Space for rough work

(C) $\frac{+Q}{4\in_0}$ (D) $\frac{+Q}{6\in_0}$

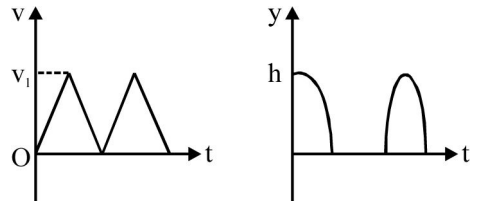
35. The fundamental interval, that is the number of division between Lower fixed point (LFP) & Upper fixed point (UFP) on the two scales X and Y are 50 and 150 respectively. The ice point on both the scales is all 0°. If the temperature on the X–scale is 15°, then what is the temperature on the Y–scale :-

(A) 30° (B) 45°

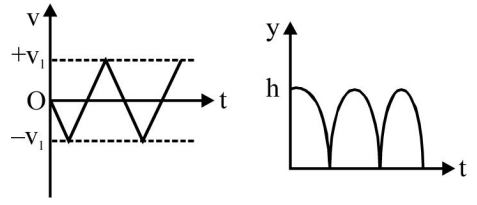
(C) 60° (D) 75°

36. Consider a ruber ball freely falling from a height h = 4.9m onto a horizontal elastic plate. Assume that the duration of collision is negligible and the collision with the plate is totally elastic. Then the velocity as a function of time and height as function of time will be :-

(A)



(B)



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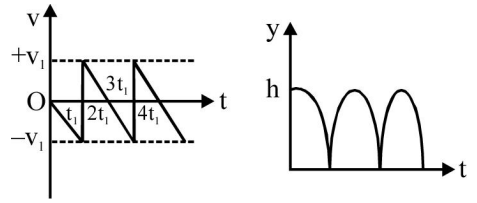

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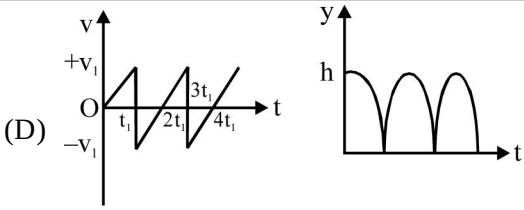
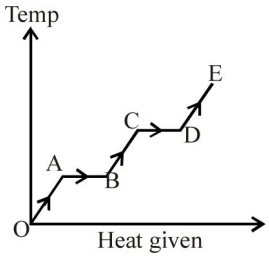


37. A solid material is given heat energy at a constant rate due to which its temperature changes as shown in Fig. The C to D portion of the curve denotes :-



(A) Change from liquid to solid state

(B) Heating of liquid

(C) Change from liquid to vapour state

(D) Heating of vapour

38. If suddenly the gravitational force of attraction between earth and a satellite revolving around it becomes zero then the satellite will :-

(A) continue to move in its orbit with same velocity

(B) move tangentially to the original orbit with the same velocity

(C) become stationary in its orbit

(D) move towards the earth

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39. A refrigerator has a coefficient of performance is 9. If the surrounding temperature is 27°C. The minimum temperature it can cool a body inside is :-

(A) 3°C (B) 0°C

(C) 10°C (D) –3°C

40. A particle of mass 0.3 kg is subjected to a force F = –kx with k = 15 N/m. What will be its initial acceleration, if it is released from a point 20 cm away from the origin :-

(A) 3 m/s^2 (B) 15 m/s^2

(C) 5 m/s^2 (D) 10 m/s^2

41. If a bimetallic strip is heated, it will :-

(A) Bend towards the metal with lower linear thermal expansion coefficient

(B) Bend towards the metal with higher linear thermal expansion coefficient

(C) Not bend at all

(D) None

42. Two particles A and B of equal masses are suspended from two massless springs of spring constants k_1 and k_2, respectively. If the maximum velocities, during oscillations are equal, the ratio of amplitudes of A and B is :-

(A) $\sqrt{k_1/k_2}$ (B) k_1/k_2

(C) $\sqrt{k_2/k_1}$ (D) k_2/k_1

43. Length of a string tied to two rigid supports is 40 cm. Maximum length (wavelength in cm) of a stationary wave produced on it, is :-

(A) 20 (B) 80

(C) 40 (D) 120

44. Three sound waves of equal amplitudes have frequencies $(\nu-1)$, ν, $(\nu+1)$. They superpose to give beats. The number of beats produced per second will be :-

(A) 2 (B) 1

(C) 4 (D) 3

45. A wave travelling along the x-axis is described by the equation $y(x, t) = 0.005 \cos(\alpha x - \beta t)$. If the wavelength and the time period of the wave in 0.08m and 2.0 s respectively then α and β in appropriate units are

(A) $\alpha = 25.00\pi$, $\beta = \pi$

(B) $\alpha = \frac{0.08}{\pi}, \beta = \frac{2.0}{\pi}$

(C) $\alpha = \frac{0.04}{\pi}, \beta = \frac{1.0}{\pi}$

(D) $\alpha = 12.50\pi$, $\beta = \frac{\pi}{2.0}$

Space for rough work

46. The partial pressure of a dry gas is :-

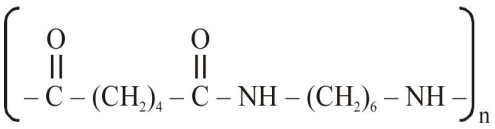
(A) Less than that of wet gas

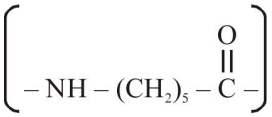
(B) Greater than that of wet gas

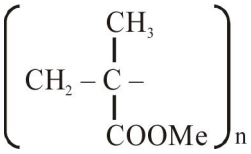
(C) Equal to that of wet gas

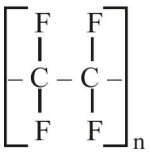
(D) None of these

47. Nylon-66 is :-

(A) 

(B) 

(C) 

(D) 

48. The $[OH^-]$ in 10^{-7} N NaOH solution is :-

(A) 10^{-7}M (B) 2×10^{-7}M

(C) 7 (D) 5×10^{-8}M

49. Penicillin is a :-

(A) Hormone (B) Antibiotic

(C) Antipyretic (D) Vitamin

50. The solubility of $Mg(OH)_2$ in water is $11.6 \times 10^{-3} gL^{-1}$. The Ksp of $Mg(OH)_2$ is:-

(A) 3.2×10^{-11} (B) 8×10^{-12}

(C) 32×10^{-13} (D) 3.2×10^{-12}

51. DNA contains the sugar :-

(A) Deoxyribose (B) Ribose

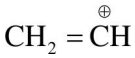
(C) D-Fructose (D) D-Glucose

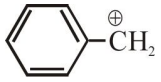
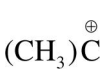
52. In electrolysis of aqueous solution of which of the following salts pH increases ?

(A) $CuSO_4$ (B) Hg_2Cl_2

(C) KCl (D) None of these

53. Most stable carbocation is :-

(A)  (B) 

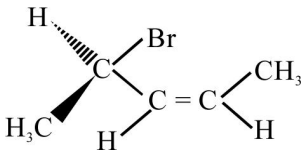
(C)  (D) 

54. The amount of solute (molecular weight = 60) required to dissolve in 180g of water to reduce the vapour pressure to 80% of pure water is :-

(A) 120 g (B) 300 g

(C) 200 g (D) 150 g

55. Assign correct stereochemistry to the following :-



(A) (S)-4-bromo-cis-2-pentene

(B) (R)-4-bromo-cis-2-pentene

(C) (R)-4-bromo-trans-2-pentene

(D) (R)-2-bromo-cis-3-pentene

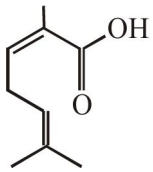
Space for rough work

56. The rate of reaction grows 27 times on increasing the temperature by 30 K, the temperature coefficient of the reaction will be nearly :-

(A) 2 (B) 3

(C) 2.5 (D) 3.5

57. The IUPAC name of the compound :-



is

(A) 2-ethenyl-3-methyl cyclohexa-1, 3-diene

(B) 2, 5-dimethyl hepta-2, 6-dienoic acid

(C) 2, 6-dimethyl hepta-2, 5-dienoic acid

(D) 2, 3-dimethyl epoxyethane

58. Calculate the oxidation potential of the half cell

Pt, Cl_2 (10atm)|HCl (0.02M) if E^0_{OP} is–1.36V :-

(A) –1.49V (B) +1.49V

(C) –2.49V (D) 3.1V

59. Aniline in a set of reactions yielded a product D.

The structure of the product D would be :-

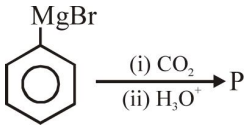
(A) $C_6H_5CH_2NH_2$ (B) $C_6H_5NHCH_2CH_3$

(C) C_6H_5NHOH (D) $C_6H_5CH_2OH$

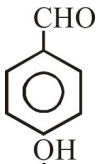
60. How many molecules are in 6g glucose :-

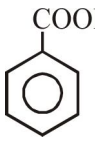
(A) 6×10^{22} (B) 2×10^{23}

(C) 4×10^{22} (D) 2×10^{22}

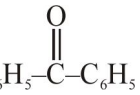
61. 

In the above reaction product 'P' is :-

(A) 

(B) 

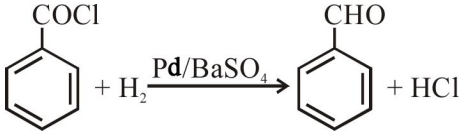
(C) 

(D) 

62. The compound which can act both as oxidising as well as reducing agent is :-

(A) Al_2O_3 (B) CrO_3

(C) H_2SO_4 (D) SO_2

63. 

The above reaction is :-

(A) Clemmensen reduction

(B) Rosenmund reduction

(C) Birch reduction

(D) Wolff-Kishner reduction

64. Adding inert gas to a system at constant volume

$N_2(g) + 3H_2(g) \rightleftharpoons 2NH_3(g)$ at equilibrium what will happen ?

(A) $[NH_3]$ increases

(B) $[N_2]$ and $[H_2]$ increases

Space for rough work

(C) $[N_2]$, $[H_2]$ and $[NH_3]$ becomes equal

(D) None of these

65. What is the product 'X' in the reaction :-

$$CH_3COCl \xrightarrow{CH_3COONa} X\ ?$$

(A) CH_3COOH

(B) $(CH_3CO)_2O$

(C) $CH_3COCH_2COOC_2H_5$

(D) CH_3COCH_2COOH

66. In the reaction $P + Q \rightleftharpoons R + S$ at equilibrium the concentrations of P, Q, R and S are 0.2M, 0.4 M, 0.2M and 0.4 M respectively. If at equilibrium 0.01M each of R and S are removed then K_C of the reaction is :-

(A) 1 (B) 0.5

(C) 1.5 (D) 1.75

67. RCH_2CH_2CN can be easily obtained by which of the following reactions :-

(A) $RCH_2\overset{\overset{O}{\|}}{C}NH_2 + P_2O_5 \longrightarrow$

(B) $RCH = CH_2 + HCN \longrightarrow$

(C) $RCH_2CH_2OH + HCN \longrightarrow$

(D) $RCH_2CH_2Br + KCN \longrightarrow$

68. The wavelength of 3rd line of Balmer seriess for H atom is :-

(A) $\frac{21}{100R}$ (B) $\frac{100}{21R}$

(C) $\frac{21}{100}$ (D) $\frac{100R}{211}$

69. Identify the product Z in series :-

$$CH_3CN \xrightarrow{Na/C_2H_5OH} X \xrightarrow{HNO_2} Y \xrightarrow[KMnO_4]{H^{\oplus}} Z$$

(A) CH_3CHO (B) CH_3CONH_2

(C) CH_3COOH (D) CH_3CH_2NHOH

70. Which of the following is the correct statement out of following :-

(a) For spontaneity $\Delta S_{total} > 0$

(b) Entropy of pure crystalline substance at absolute Kelvin is zero

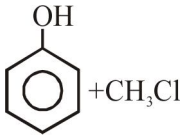
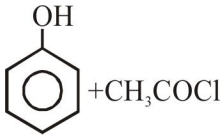
(c) Gibb's free energy for $H_2(g)$ is zero

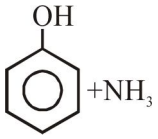
(d) at zero K entropy of CO_2 is not zero

(A) a, b only (B) a, b, c, d only

(C) b and c only (D) a, b, d only

71. In Friedal-Crafts acylation, besides $AlCl_3$, the other reactants are :-

(A)  (B) 

(C)  (D) 

72. The enthalpy of vaporisation of a liquid is 30 kJmol–1 and entropy of vaporisation is 75 $Jmol^{-1}K^{-1}$. The boiling point of the liquid at 1 atm is :-

(A) 250 K (B) 400 K

(C) 450 K (D) 600 K

73. Decreasing order of C–C bond length is :-

(a) C_2H_4 (b) C_2H_2 (c) C_6H_6 (d) C_2H_6

(A) d > c > a > b (B) a > b > d > c

(C) b > a > d > c (D) d > a > c > b

Space for rough work

74. Which of the following is incorrect match regarding defects in crystals ?

(A) NaCl, KCl $\longrightarrow$ Schottky defect

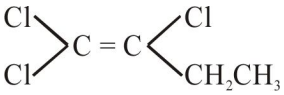
(B) AgI, ZnS $\longrightarrow$ Frenkel defect

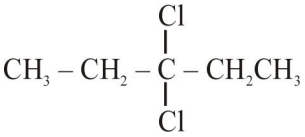
(C) KCl/K(g) $\longrightarrow$ metal excess defect

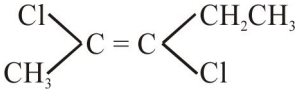
(D) ZnO/Δ $\longrightarrow$ metal deficiency defect

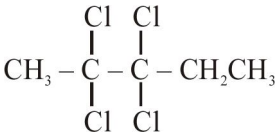
75. What is the major product of the following reaction,

$CH_3C \equiv C - CH_2 - CH_3 \xrightarrow{1\,Mole\,of\,Cl_2}$

(A) 

(B) 

(C) 

(D) 

76. Freaundlich adsorption isotherm equation is :-

(A) $\frac{x}{m} = KP^{\frac{1}{n}}$ $(0 \le \frac{1}{n} \le 1)$

(B) $\log\frac{x}{m} = \frac{1}{n}\log P + \log K$ $(\frac{1}{n} < 1)$

(C) $\frac{x}{m} = K$ (at low pressure)

(D) All of these

77. The species having bond order different from that in CO in :-

(A) NO^- (B) NO^+

(C) CN^- (D) N_2

78. Which of the following molecule does not have any Pπ–Pπ and Pπ–dπ bonding :-

(A) SO_3 (B) SO_2

(C) SO_4^{2-} (D) BO_3^{3-}

79. Which of the following is used as both oxidising and reducing agent ?

(A) H_2O_2 (B) H_2SO_4

(C) HNO_3 (D) None

80. Which of the following is correct with respect to bond length of the species ?

(A) $C_2 > C_2^{2-}$ (B) $B_2^+ > B_2$

(C) $Li_2^+ > Li_2$ (D) All of these

81. Which of the following reactions in the blast furnace is endothermic ?

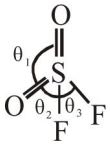
(A) $C + O_2 \rightarrow CO_2$

(B) $CaCO_3 \rightarrow CaO + CO_2$

(C) $Fe_2O_3 + 3CO \rightarrow 2Fe + 3CO_2$

(D) All of these

82. Determine the correct order of bond angle in SO_2F_2 molecule :-



(A) $\theta_1 < \theta_2 < \theta_3$ (B) $\theta_1 = \theta_2 = \theta_3$

(C) $\theta_1 = \theta_2 < \theta_3$ (D) $\theta_1 > \theta_2 > \theta_3$

83. In Hall's process, the ore is mixed with :-

(A) Coke (B) $CaCO_3$

(C) NaOH (D) Na_3AlF_6

Space for rough work

84. If Hund's Rule is violated then the magnetic nature of B_2 and O_2 (According to MOT) respectively :-

(A) Paramagnetic, Diamagnetic

(B) Diamagnetic, Paramagnetic

(C) Both are Diamagnetic

(D) Both are Paramagnetic

85. Which is diamagnetic in nature ?

(A) $[NiCl_4]^{2-}$ (B) $[Ni(CN)_4]^{2-}$

(C) $[CuCl_4]^{2-}$ (D) $[Co(F)_6]^{3-}$

86. Which of the following order is correct for 2^{nd} I.P. :-

(A) P < S > Cl (B) N < O > F

(C) S > Cl > P (D) All are correct

87. Facial and meridional isomerism is associated with which of the following complexes ?

(A) $[M(AA)_2]$ (B) $[Ma_3b_3]$

(C) $[M(AA)_3]$ (D) [Mabcd]

88. $\begin{matrix}COOH\\|\\COOH\end{matrix} \xrightarrow{\text{Conc. } H_2SO_4} X + Y + H_2O$

Which of the following option is correct w.r.t. to above reaction :-

(A) X is a neutral oxide

(B) Y is an acidic oxide

(C) Y react with KOH gives $KHCO_3$

(D) All of these

89. Compound molecular in gas phase but ionic in solid state is :-

(A) PCl_5 (B) CCl_4

(C) PCl_3 (D) $POCl_3$

90. Most probable oxidation state of Pb and Sn will be :-

(A) Pb^{+4}, Sn^{+4} (B) Pb^{+4}, Sn^{+2}

(C) Pb^{+2}, Sn^{+2} (D) Pb^{+2}, Sn^{+4}

Space for rough work

91. What is the correct sequence of taxonomic categories for plant species :-

(A) Species → order → class → family

(B) Family → order → class → division

(C) Kingdom → phylum → order → family

(D) Family → order → division → kingdom

92. Which of the following set animals use water circulation for transportation of different substances in body

(A) Sponges and coelenterates

(B) Sponges and chordates

(C) Cnidarians and Helminthes

(D) All

93. Which of the following is incorrect statement with respect to herbarium :-

(A) It is a store house of collected dry plant specimens

(B) It consists many herbarium sheets arranged in universally accepted system of classification

(C) Herbarium sheets also have a complete photo profile of the collector of that specimen

(D) Herbaria also serve as quick raferral system in taxonomic studies

94. Ribs move outwards during inspiration due to

(A) Contraction of external intercostal muscles

(B) Contraction of internal intercostal muscles

(C) Contraction phrenic muscles

(D) Relaxation of phrenic muscles

95. Two kingdom classification system which was used for a long time was inadequate, so a need was felt for including other characteristics also besides gross morphology. Which of the following characters were the basis of five kingdom system :-

(a) Cell structure

(b) Mode of nutrition

(c) Methods of reproduction

(d) Evolutionary relationships

Options

(A) a & b (B) a, b & c

(C) a, c & d (D) a, b, c & d

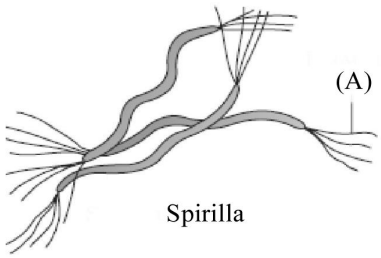
96. Which of the following is not a respiratory pigment :-

(A) Haemozoin (B) Haemoglobin

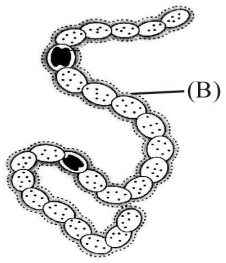
(C) Haemocyanin (D) Chlorocruorin

Space for rough work

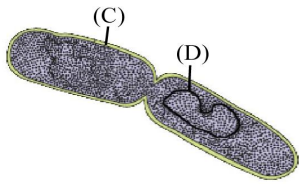
97.



Spirilla



Nostoc



A dividing bacterial cell

Identify A, B, C & D from the given diagram:-

	A	B	C	D
(A)	Pili	Cell wall	Cell wall	Cell membrane
(B)	Flagellum	Mucilagenous sheath	cell membrane	DNA
(C)	Flagellum	Slime layer	DNA	RNA
(D)	Pili	Cell membrane	RNA	Nuclear membrane

98. Biological response modifier are :

(A) Effect of pH on respiratory centre

(B) Effect of CO_2 on respiratory centre

(C) Effect of Vagus nerve on respiratory centre

(D) Effect of temperature on respiratory centre

99. Some characters/structures are given below. How many of them are found in both bryophyta and pteridophyta ?

(a) Archegonium (b) Protonema

(c) Rhizoids (d) Ovule

(e) Vascular tissue (f) Antheridium

(A) Two (B) Three

(C) Four (D) Five

100. Forest area in India is about :-

(A) 9% of geographical area

(B) 21.54% of geographical area

(C) 29% of geographical area

(D) 37% of geographical area

101.

S.N.	Character	Bryophyta	Pterid-ophyta	Gymno-sperms
(I)	Main plant body	Gameto-phyte	Sporo-phyte	(A)
(II)	Vascular tissue	Absent	(B)	Present
(III)	Embryo formation	(C)	Occurs	Occurs
(IV)	(D)	Archego-nium	Archego-nium	Carpel

Identify A, B, C & D in the above table :-

	A	B	C	D
(A)	Sporo-phyte	Absent	does not occur	Female reproduc-tive organ
(B)	Gameto-phyte	Absent	does not occur	female reproduc-tive organ
(C)	Sporo-phyte	present	occurs	female reproduc-tive organ
(D)	sporo-phyte	present	does not occur	male reproductive organ

Space for rough work

102. What is the percentage & phytosynthetically active radiation (PAR) in the incident solar radiation ?

(A) 100% (B) less than 50%

(C) 1–5% (D) 2–10%

103. The unique character of angiosperms and gymnosperm is :-

(A) Formation of ovary and fruit

(B) Formation of vascular tissue

(C) Formation of ovule and seed

(D) Formation of sex organs

104. Mark the important defence mechanism in plants against herbivory :-

(A) Spines (B) Toxic chemical

(C) Both (A) & (B) (D) None of these

105. Which of the following is correct pair :-

(A) Mollusc-Closed circulation

(B) *Obelia*-Metagenesis

(C) *Pleurobrachia*-Bilateral symmetry

(D) *Taenia solium*-Metameric segmentation

106. An orchid plant growing on the branch of mango shows which of the following interactions ?

(A) Parasitism (B) Commensalism

(C) Protocoperation (D) Mutualism

107. Which of the following trait does not relate to Class Amphibia : -

(A) Animals contain cloaca

(B) Tympanum represents ear

(C) Body is distinguished in head, neck trunk & tail

(D) Poikilothermous

108. The role of an organism in the ecological system is known as

(A) Habitat (B) Herbivory

(C) Niche (D) Interaction

109. Select the warm blooded animals group :-

(A) Osteichthyes (B) Reptiles

(C) Mammals (D) Amphibia

110. Physico-chemical (abiotic) components alone do not characterise the habitat of an organism completely, the habitat includes biotic components also which include

(A) Pathogens, parasites, predators and competitors

(B) Producer, Carnivores, Bacteria

(C) Parasite, Fungi

(D) None of these

111. Select the odd one :-

(A) *Pavo* (B) *Columba*

(C) *Struthio* (D) *Chelone*

112. Select the statement which explains best parasitism :-

(A) One organism is benefited

(B) Both the organisms are benefited

(C) One organism is benefited, other is not affected

(D) One organism is benefited, other is affected

Space for rough work

113. Which of the following is incorrect match of W.B.Cs with its functions :-

(**A**)	Neutrophils	Phagocytic cells
(**B**)	Eosinophils	Resist infections and are also associated with allergic reactions
(**C**)	Basophils	Secretes histamine serotonin and Heparin
(**D**)	T-Lymphocytes	Produce antibodies

114. The annual net primary productivity of the whole biosphere is approximately :-

(A) 175 billion tons (B) 170 million tons

(C) 170 billion tons (D) 180 billion tons

115. Read the following (A - D) statements :-

(A) Areolar tissue present beneath the skin

(B) Adipose tissue is a type of dense connective tissue

(C) Tendons attach one bone to another

(D) Ligaments attach skeletal muscles to bones

How many of the above statements are incorrect:-

(A) Four (B) Three

(C) Two (D) One

116. Human liver fluke depends on two intermediate host to complete its life cycle they are :-

(A) Snail and Frog (B) Snake and Fish

(C) Snail and Fish (D) Snake and Frog

117. In cockroach wings are absent in which part of thorax ?

(A) Prothorax (B) Mesothorax

(C) Metathorax (D) None of these

118. India's share in the global species diversity is about :-

(A) 2% (B) 4%

(C) 6% (D) 8.1%

119. Consider the following statements A, B, C and D and select the right option

(A) The cork is impervious to water due to suberin deposition in the cell wall.

(B) Life span of crocodile is 60 years.

(C) *Marchantia* and *Cycas* are monoecious plant.

(D) In *Selaginella rupestris*, megasporangium is surrounded by integument.

The correct statements are -

(A) A and B (B) B and C

(C) C and D (D) A and C

120. According to Robert May global species diversity at about :-

(A) 5 million (B) 7 million

(C) 30 million (D) 50 million

121. Consider the following statements and find out the number of true statements

(A) *Pinus* is evergreen because at the tip of dwarf shoots needle like foliage leaves are present which persist for several years.

Space for rough work

(B) Algal component of lichen can grow independently when separated from fungal component.

(C) Potato spindle tuber disease is caused by viroid.

(D) Inter fascicular cambium is an example of secondary meristem.

(A) two (B) three

(C) four (D) one

122. Regulatory proteins are the accessory proteins that interact with RNA polymerase and affect its role in transcription which of the following statement is correct about the regulatory protein?

(A) They only increase expression

(B) They only decrease expression

(C) They interact with RNA polymerase but do not affect expression

(D) They can act both as activators and as repressors

123. Apomixis is commonly present in the members of family.

(A) Asteraceae

(B) Poaceae

(C) Malvaceae

(D) More then option are correct

124. If Meselson and stahl's experiment is continued for three generations in bacteria, the ratio of $15_N/15_N$: $15_N/14_N$: $14_N/14_N$ would be :-

(A) 0 : 1 : 7 (B) 1 : 4 : 0

(C) 0 : 1 : 3 (D) 0 : 1 : 4

125. Function of micropyle in seeds is :-

(A) to facilitate the entry of pollen tube.

(B) to facilitate the entry of oxygen & water.

(C) to help in seed dispersal

(D) more then one option are correct

126. In some viruses, DNA is synthesized by using RNA as template, such type of process is catalyzed by which enzyme :-

(A) RNA replicase

(B) DNA dependent DNA polymerase

(C) DNA dependent RNA polymerase

(D) RNA dependent DNA polymerase

127. Which of followings is correctly matched ?

(A)	Parietal placentation	1.	Primrose
(B)	Axile placentation	2.	Mustard
(C)	Basal placentation	3.	Sunflower
(D)	Free central placentation	4.	Lemon

128. Substituted methane is another name of :-

(A) Glycerol (B) α-amino acid

(C) Palmitic acid (D) Arachidonic acid

129. Tricarpellary, syncarpous, ovary superior, trilocular with many ovules, axile placentation. Fruit capsule, rarely berry. Above characters belong to :-

(A) *Colchicum autumnale*

(B) *Aloe vera*

Space for rough work

(C) *Gloriosa suparba*

(D) All the above

130. Which of following is not the characteristic feature of genetic code :-

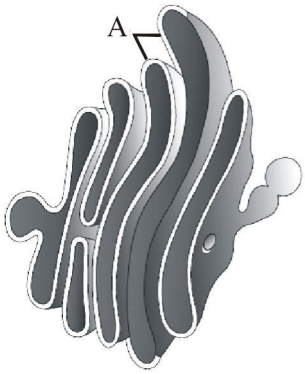
(A) Genetic code is nearly universal

(B) Code is non overlapping

(C) Genetic code is read in discontinouous manner

(D) Genetic code is triplet

131. Identify the correct statement for A in the given diagram



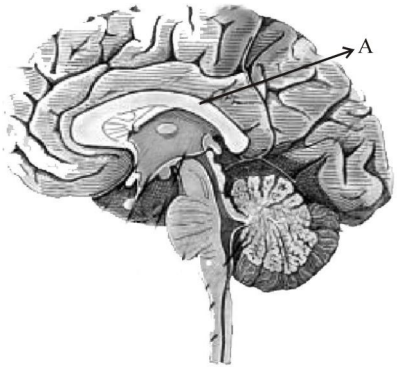
(A) Its number always remain constant in Golgi complex of all organism

(B) The cis and trans faces are entirely different but not interconnected

(C) Diameter is 0.5m to 1.0 m

(D) Concentrically arranged near the nucleus with distinct convex cis or the forming face and concave trans or the maturing face

132. Which of the following statement is true for the structure marked 'A' in the given figure :-



(A) It contains sensory areas, motor areas and association areas

(B) It is referred to as the grey matter due to it's greyish appearance

(C) It is thrown into prominent folds

(D) A nerve bridge – corpus callosum

133. Read the following statements :

(a) Ribosome are larger than that of cytoplasm

(b) Two membrane have their own specific enzymes

(c) Matrix have single stranded, circular, naked DNA molecule

(d) Number is variable depending on the physiological activity of the cell

(e) Inner membrane forms a number of inflodings called cristae towards the matrix

How many of the above are correct for the power house of the cell :

(A) Four (B) Two

Space for rough work

(C) Three (D) Five

134. How many hormones in the given list are not produced by anterior pituitary ?

Prolactin(PRL), growth hormone(GH), Oxytocin, Thyroid stimulating hormone(TSH), vasopressin, somatostatin, Gonadotrophin releasing hormone(GnRH).

(A) 6 (B) 5

(C) 4 (D) 3

135. During which phase chromosomes are fully condensed and meiotic spindles are assembled to prepare the homologous chromosome for separation :

(A) G_2 phase (B) Late metaphase

(C) Diakinesis (D) Anaphase I

136. Read the following statements (A-D)

(A) Dialysing fluid has the same composition as that of plasma except the nitrogenous wastes

(B) Blood drained from a convenient artery is pumped into a dialysing unit after adding anti heparin

(C) The porous cellophane membrane of the tube allows the passage of molecules against the concentration gradient

(D) Kideny transplantation is the ultimate method in the correction of acute renal failures

How many of the above statements are true

(A) 2 (B) 1

(C) 4 (D) 3

137. Find the incorrect match :-

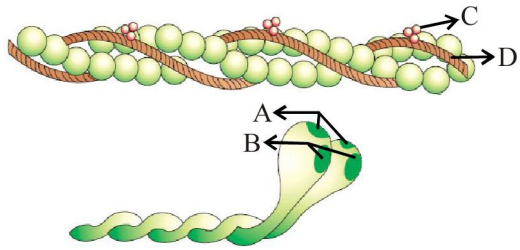
(A) Expansion of leaf - Growth

(B) Swelling of a piece of wood in water - Endosmosis

(C) Seed germination - Development

(D) Shrinkage of protoplasm in hypertonic solution - Plasmolysis

138. Choose correct option for A, B, C, D in the give figure :-



	(A)	(B)	(C)	(D)
(A)	ATP binding site	Actin binding site	Troponin	Tropomyosin
(B)	Actin binding site	ATP binding site	Tropomyosin	Troponin
(C)	Actin binding site	ATP binding site	Troponin	Tropomyosin
(D)	ATP binding site	Actin binding site	Tropomyosin	Troponin

139. End product of respiratory process was an organic compound. Which of the following is applicable for this process ?

(A) TCA cycle and ETS

(B) Glycolysis and oxidation of $NADH + H^+$

(C) Glycolysis and Kreb Cycle

(D) Fermentation and ETS

Space for rough work

140. Which of the following layer of eye contains many blood vessels and looks bluish in colour

(A) Sclera (B) Retina

(C) Choroid (D) none of the above

141. A glucose molecule was being oxidised in respiration pathway. One of the two acetyl CoA formed during this process was used in synthesis of fatty acid. What will be the net gain of ATP from this glucose molecule assuming one Glucose yields maximum 36 ATP molecules ?

(A) 24 ATP (B) 26 ATP

(C) 30 ATP (D) 12 ATP

142. Read the following statements (A-D)

(A) To obtain a standard ECG, a patient is connected to the machine with three electrical leads (One to each wrist and to the left ankle) that continuously monitor the heart activity

(B) By counting in the number of QRS complexes that occur in a given time period, on can determine the heart beat rate of an individual

(C) ECG obtained from different individuals have roughly the same shape for a given lead configuration

(D) The P-wave represents the electrical excitation (or depolarisation) of the atria, which leads to the contraction of both the atria

How many of the above statements are true:-

(A) 3 (B) 4

(C) 1 (D) 2

143. Which is not associated to PS II ?

(A) Splitting of water

(B) Ejection of electrons

(C) Absorption of photons

(D) Reduction of Ferradoxin

144.

(a) White winged moth and dark winged moth in unpolluted area

(b) In polluted area

How many statements are true about above diagram :-

(A) Before industrialisation in England there were more white winged moths.

(B) Figure (a) show the conditions before industrialisation and figure (b) after industrialisation in England

(C) During industrialisation the tree trunks become dark due to industrial smoke and soots

Space for rough work

(D) During industrialisation only dark winged survive

(A) Two (B) Three

(C) Four (D) One

145. Deficiency of Boron in the soil may lead to deficiency of _____ in the plant.

(A) Na^{+} (B) Ca^{2+}

(C) Cu^{+2} (D) Mn^{2+}

146. Coloured rock paintings were first done by :-

(A) Cro-magnon man (B) Java man

(C) Peking man (D) Neander that man

147. Which of the following undergoes reductive amination to form glutamate ?

(A) Oxaloacetate

(B) Pyruvate

(C) α-ketoglutaric Acid

(D) Glutamine

148. Most of the natural mutations are :-

(A) Useful

(B) Harmful

(C) Neutral or harmful

(D) Semilethal

149. Find the correct one :-

(A) Maize – C_4 cycle
– Kranz anatomy

(B) Mango – C_3 cycle
– No photorespiration

(C) Rice – C_4 cycle
– No Kranz anatomy

(D) *Opuntia*– CAM cycle
– Kranz anatomy

150. Darwin's finches provides an excellent evidence in favour of organic evolution. These are related to which of the following :-

(A) Embryological (B) Palaeontological

(C) Anatomical (D) Biogeographical

151. Rooting hormone is :-

(A) Auxin (B) Cytokinin

(C) Gibberellin (D) ABA

152. Read the following four statements (A-D) :-

(a) Eye of the octopus and of mammals are analogous

(b) Proteins and genes performing a given function among diverse organisms give clues to common ancestry

(c) Natural selection tells us that evolution is a directed process in the sense of determination

(d) Evolution is a stochastic process.

How many of the above statements are not incorrect :-

(A) Four (B) One

(C) Two (D) Three

153. Consider the following four statements (a-d) and select the option which includes all the correct ones only :-

(a) Small intestine is principle organ for absorption of nutrients.

(b) Reflex action for vomiting is controlled by medulla.

(c) Irregular bowel movements cause constipation

(d) Submucosa forms gastric gland in the stomach

(A) Statements (b), (c) and (d)

(B) Statements (a), (b) and (c)

(C) Statements (c), (d)

(D) Statements (a), (b), and (d)

154. Match the column I and column II :-

Column-I		Column-II	
(i)	Canine teeth	A	Australia
(ii)	Chimera	B	Atavism
(iii)	Cervical fistula	C	Connecting links
(iv)	Marsupialia	D	Vestigial organs

Choose the correct one :-

(A) i-D, ii-C, iii-B, iv-A

(B) i-D, ii-B, iii-C, iv-A

(C) i-B, ii-C, iii-D, iv-A

(D) i-B, ii-D, iii-C, iv-A

155. How many enzymes in the list given below act on protein and are found in pancreatic Juice ?

Trypsinogen, Pepsin, Sucrase, Aminopeptidase, Lactase, Rennin, Procarboxypeptidase, Nuclease, Chymotrypsinogen

(A) Six (B) Three

(C) Four (D) Five

156. Consider the following four statements (A-D) and select the option which includes all the correct ones only :-

(a) The universe is vast and earth is almost only a speak

(b) Galaxies contain stars and clouds of gas and dust

(c) All the existing life form share similarities and share common ancestors

(d) Different aged rock sediments contain fossils of different life-forms

(A) Statements (a), (b) and (c)

(B) Statements (a), (b) and (d)

(C) Statements (b), (c) and (d)

(D) Statements (a), (b), (c) and (d)

157. Match the terms given in column–I with their physiological processes given in column–II and choose the correct answer :-

Column–I		Column–II	
(A)	Proximal convoluted tubule	(i)	Formation of concenterated urine
(B)	Distal convoluted tubule	(ii)	Filtration of blood
(C)	Henle's loop	(iii)	Reabsorption of 70-80% of electrolytes
(D)	Counter-current mechanism	(iv)	Ionic balance
(E)	Renal corpuscle	(v)	maintenance of concentration gradient in medulla

(A) (A)–iii, (B)–v, (C)–iv, (D)–ii, (E)–i

(B) (A)–iii, (B)–iv, (C)–i, (D)–v, (E)–ii

Space for rough work

(C) (A)–i, (B)–iii, (C)–ii, (D)–v, (E)–iv

(D) (A)–iii, (B)–i, (C)–iv, (D)–v, (E)–ii

158. Which of the following is not true :-

(A) A holendric gene in humans is not expected to be phenotypically expressed in women

(B) Thalassemia is a quantitative inheritance

(C) Sex-linked recessive traits in human beings are always expected to be more frequent in males than in females

(D) In honey bee, worker develop from unfertilized eggs

159. Which one of the following statement is incorrect :-

(A) The medullary zone of kidney is divided into a few conical masses called medullary pyramids projecting into the calyces

(B) Inside the kidney the cortical region extends in between the medullary pyramids as renal pelvis

(C) Glomerulus alongwith Bowman's capsule is called the renal corpuscle

(D) Renal corpuscles, proximal convoluted tubule (PCT) and distal convoluted tubule (DCT) of the nephron are situated in the cortical region of kidney

160. How many dominant characteristics are present in pea plant from given list :-

Round seed, Green seed colour, full pod shape, yellow pod colour, terminal flower position, white flower colour

(A) 2 (B) 1

(C) 3 (D) 4

161. Which part cause movements of limbs & internal organs & thus coordinate locomotion in human :-

(A) Nerve (B) Muscle

(C) Both (A) & (B) (D) None

162. Pick out the correct statements :

(a) Haemophilia is a sex-linked recessive disease.

(b) Down's syndrome is due to aneuploidy.

(c) Phenylketonuria is an autosomal recessive gene disorder.

(d) Sickle cell anaemia is an X-linked recessive gene disorder.

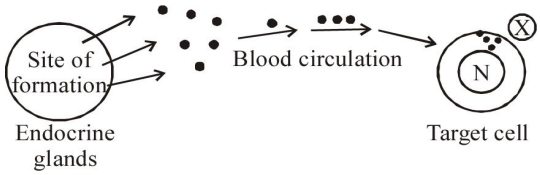
(A) (a) and (d) are correct

(B) (b) and (d) are correct

(C) (a), (c) and (d) are correct

(D) (a), (b) and (c) are correct.

163.



X represent the activity of :-

(a)Water soluble hormone

(b) Fat soluble hormone

(c) Steroid based hormone

(d) Proteins based hormone

(A) a & d (B) a & c

(C) b & c (D) c & d

Space for rough work

164. How are RFLPs detected :-

(A) By amplifying the DNA using PCR

(B) By doing standard mendelian cross

(C) By observing DNA of different lengths on a gel

(D) By observing the chromosome under microscope

165. Which of the following regarding to nerve activity is true

(A) The synaptic cleft does not prevent direct propagation of actions potential from pre synaptic neuron to post synaptic cell

(B) Information occurs the synaptic cleft is transmitted by means of a chemical neurotransmitter from small vescile

(C) Combination of neurotransmitter with receptor site changes membrane potential without changing membrane potentiality

(D) In tetanus the excitatory impulse to muscle are inhibited leads to lock jaw

166. When lactose is present :-

(A) The repressor is able to bind to the operator

(B) The repressor is unable to bind to the operator

(C) Transcription of lac y, lac z and lac A genes occurs

(D) Both (B) and (C) are correct

167. Which one is incorrect statement regarding ear.

(A) Each semicircular canal lies is a different plane at right angles to each other.

(B) The membranes of semicircular canals are suspended in endolymph of bone canals.

(C) Saccule & utricle contains a projecting ridge called macula.

(D) Crista and macula are the specific receptors of the vestibular apparatus responsible for balance and posture.

168. Which of the following crosses and resultant phenotypic ratios are mismatches :-

	Cross	Phenotypic ratio
(A)	Tt × Tt	3 : 1
(B)	tt × Tt	2 : 1
(C)	TtYy × ttyy	1 : 1 : 1 : 1
(D)	TtYy × TtYy	9 : 3 : 3 : 1

169. Tumor cells have been shown to avoid detection and destruction by immune system. Therefore, the patients are given substances called biological response modifiers such as :

(A) Alpha interleukins

(B) Alpha-1-antitrypsin

(C) Alpha galactosidase

(D) Alpha interferon

170. Mendelian principles are :-

(A) Linkage segregation and independent assortment

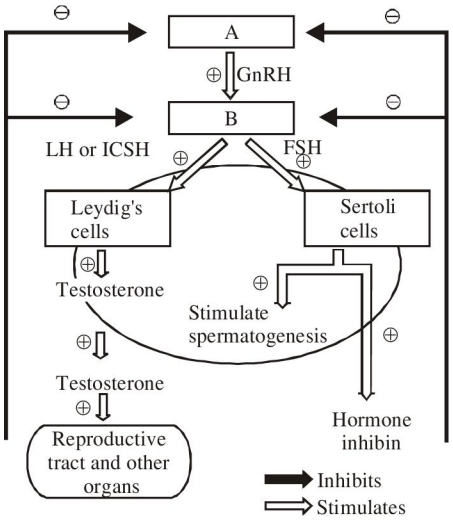
(B) Dominance, segregation and linkage

(C) Dominance, segregation and independent assortment

(D) Dominance, independent assortment, linkage

Space for rough work

171. Which brain part (A) and endocrine (B) gland involve in following machanism of hormones



(A) Thalamus and pineal

(B) Hypothalamus and pineal

(C) Hypotahlamus and anterior pituitary

(D) Hypothalamus and posterior pituitary

172. The chromosomal theory of inheritance was put forward by :

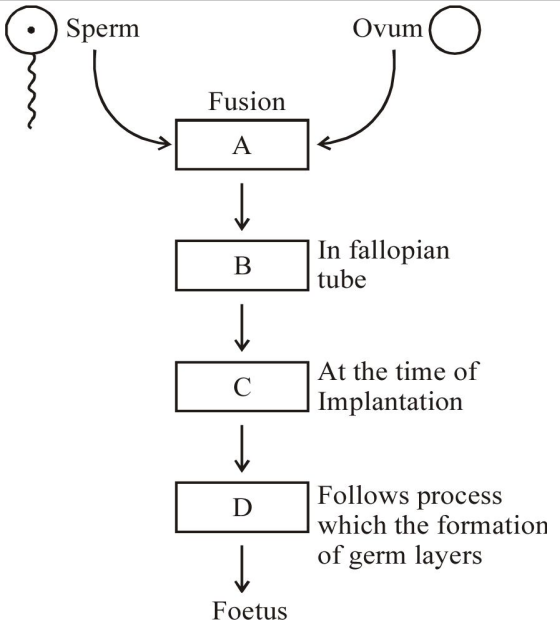
(A) Sutton and Boveri

(B) Bateson and Punnett

(C) Morgan

(D) de Vries

173. Study the cycle shown below and select the option which gives correct words for all four blanks A, B, C, D :-



	(1)	(2)	(3)	(4)
(A)	Foetus	Zygote	Morula	Gastrula
(B)	Zygote	Morula	Blastocyst	Gastrula
(C)	Embryo	Blastocyst	Gastrula	Cleavage
(D)	Zygote	Morula	Gastrula	Cleavage

174. Match the following :-

A.	Secretin	a.	Stomach
B.	Gastrin	b.	Submucosa
C.	Brunner's gland	c.	Pancreas
D.	Renin	d.	Kidney

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

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

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

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

Space for rough work

175. Menstrution is initiated by :-

(A) A sudden release of FSH from the anterior pituitary

(B) A lack of estrogen and progesteron due to degeneration of the corpus luteum

(C) An increased release of estrogen and progesteron from the corpus luteum

(D) A sudden drop in FSH

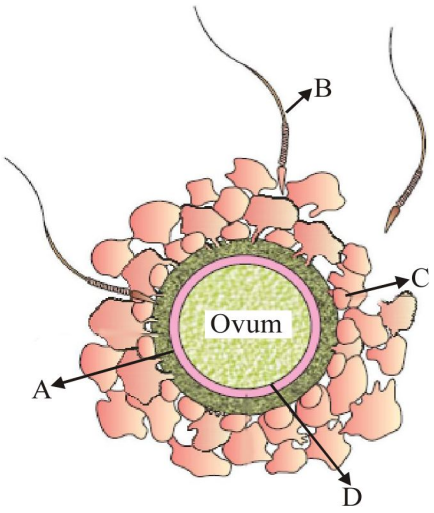
176. Big divide year is concerned with :-

(A) Hepatitis (B) Evolution

(C) Population (D) Lamarckism

177. The below diagram represents the ovum surrounded by few sperms.

Identify A, B, C and D :-



(A)	A	Zona pellucida
	B	Sperm
	C	Cells of the corona radiata
	D	Perivitelline space
(B)	A	Cells of corona radiata
	B	Sperm
	C	Zona pellucida
	D	Perivitelline space
(C)	A	Perivitelline space
	B	Sperm
	C	Zona pellucida
	D	Cells of the corona radiata
(D)	A	Perivitelline space
	B	Sperm
	C	Cells of corona radiata
	D	Zona pellucida

178. During blood cogulation process, fibrins are formed by the conversion of inactive fibrinogens in the plasma by the enzyme :

(A) Plasminogen (B) Thromboplastin

(C) Thrombin (D) Angiotensinogen

179. How many of the following participate in the regulation of GFR ?

Macula densa Aldosterone

Renin Angiotensin-I

Rennin

(A) 1 (B) 2

(C) 4 (D) 3

180. Symptoms of renal injury became easily evident than hepatic injury as :-

(A) hepatic cells have ability to regenerate

(B) renal cells have regeneration power

(C) hepatic cells have high blood supply

(D) renal cells have high blood supply

Space for rough work

Date : 07 - 06 - 2020	**ANTS FULL TEST : FT # 10** **(NEET PATTERN)** **Target : NEET - 2020**	

IMPORTANT INSTRUCTIONS

1. Immediately fill the particulars on this page of the Test Booklet with Blue/Black Point Pen. Use of Pencil is strictly prohibited.
2. When you are directed, fill in the particulars of the Answer Sheet carefully.
3. The test is 3 hours duration.
4. The Test Booklet consists of **180** questions. The maximum marks are **720**.
5. There are three parts in the question paper **Biology** having **90** questions and **Physics** and **Chemistry** having **45** questions each.
6. For each question, you will be awarded ***4*** marks if you darken all the bubble(s) correspondind to the correct answer(s) and **zero** mark if no bubbles are darkened. In all other cases, **1 (one)** marks will be deducted.
7. There is only one correct response for each question. Filling up more than one response in any question will be treated as wrong response and marks for wrong response will be decucted accordingly as per instructions 6 above.

Filling the ORS (Optical Response Sheet) :

Use only Black ball point pen only for filling the ORS. Do not use Gel/Ink pen as it might smudge the ORS.

8. Write your Roll no. in the books given. Also darken the corresponding bubbles with Black ball point pen only. Also fill your roll no in the space provided.
9. **Fill your Paper Code as mentioned on the Test Paper.**
10. If student does not fill his/her roll no. and paper code correctly and properly, then his/her marks will not be displayed and 5 marks will be deducted (paper wise) from the total.
11. Since it is not possible to erase and correct pen filled bubble, you are advised to be extremely careful while darkening the bubble corresponding to your answer.
12. Neither try to erase/rub/scratch the option nor make the Cross(X) mark on the option once filled. Do not scribble, smudge, cut, tear, or wrinkle the ORS. Do not put any stray marks or whitener anywhere on the ORS.
13. If there is any discrepancy between the written data and the bubbled data in your ORS the bubbled data will be taken as final.

Name of the candidate

Roll Number :

I have read all the instructions and shall abide by them

.....

Signature of the Candidate

I have read all the instructions and shall abide by them

.....

Signature of the Candidate