ZOOLOGY 2005

| 41. | In a medico legal case of accidental interchange between two babies' in a hospital, the baby of the blood group A could not be rightly given to a couple with: | | | | | |
|-----|--|-------------------------|----------------------------|----------------------------------|--|--|
| | | | | | | |
| | (1) Husband of '0' group and wife of 'AB' group (2) Husband of 't' group' and wife of 'B'' group | | | | | |
| | (2) Husband of 't\ group' and wife of 'B" group | | | | | |
| | (3) Husband of 'B' group and wife of 'O' group(4) Husband of 'AB' group and wife of 'A' group | | | | | |
| 10 | | = = | = = | | | |
| 42. | | O 1 | brate intermediate host? | , | | |
| | I. Dugesia | II. Schistosoma | III. Echinococcus | | | |
| | IV.Ancylostoma | V. Wuchereria | | | | |
| | (1) III and IV | (2) II and V | (3) III and V | (4) I and IV | | |
| 43. | Lepidopleurus belo | · · | | | | |
| | (1) Polyplacophora | ` ' | (3) Cephalopoda | (4) Asteroidea | | |
| 44. | <i>Statement (S)</i> : Species are groups of potentially inter-breeding natural populations that are isolated from other such groups. | | | | | |
| | Reason (R): Reproductive isolation brings about distinctive morphological characters. | | | | | |
| | (1) Both statement and reason are true and reason i? a correct explanation to statement | | | | | |
| | (2) Only statement is true and the reason is not true | | | | | |
| | (3) Both statement and reason are not true | | | | | |
| | (4) Both statement and -reason are true, but reason is not the correct explanation to the statement | | | | | |
| 45. | The progenitors that are formed in bone marrow and differentiated else where are: | | | | | |
| | (1) Pre-NK cell | (2) Pre-Erythroblast | | (4) Myeloblast | | |
| 46. | The dorsal divertic | ulum of Urethra in mal | le Rabbit is: | | | |
| | (1) Uterus | (2) Uterus masculinu | s (3) Prepuse | (4) Vas deferens | | |
| 47. | The number of dau | | - | of post conjugation fissions is: | | |
| | (1) 7 | (2) 6 | (3) 4 | (4) 2 | | |
| 48. | ` ' | ` ' | ctive animals, occur in la | ` ' | | |
| | (1) Declining | (2) Fluctuating | (3) Stable | (4) Growing | | |
| 49. | ` ' | have the following feat | ` ' | () | | |
| | (i) Mesodermal in origin | | | | | |
| | (ii) They contain stretch receptors | | | | | |
| | (iii) Rhythmic contractions are seen in them | | | | | |
| | (iv) They do not fatigue during the life of the animal | | | | | |
| | Which of the above are characteristics of sphincters? | | | | | |
| | (1) All the four | the characteristics of | (2) Only (i), (ii) and (| iii) | | |
| | ` ' | d (iv) | (4) Only (i), (iii) and (| | | |
| 50. | (3) Only (i), (ii) and (iv) (4) Only (i), (iii) and (iv) The giant fresh water prawn is: | | | | | |
| 50. | (1) White shrimp | • | (3) Scampy | (4) Sardine | | |
| | (1) white similip | (2) Tiger shrimp | (3) Scampy | (+) Saluille | | |
| | | | | | | |
| | | | | | | |

51. The following are associated with Pheritima match them:

List – I

1. Yellowcells

A. Primardial germ cells

| | 2. Ovalsphinctered | pores | B. Topiptent | | |
|-----|--|--|--|------------------------------------|--|
| | 3. Basal cells | | C. Deamination | | |
| | 4. Parietal layer | | D. The septum between 14/15 | | |
| | (1) 1-C 2-D 3-B 4- | A | (2) 1-C 2-B 3-D 4-A | | |
| | (3) 1-C 2-A 3-B 4- | | (4) 1-D 2-A 3-B 4-C | | |
| 52. | Chicks of the first two weeks in the Brooder hover are usually susceptible to one of the following: | | | | |
| | (1) Marek's disease | | (2) Fowl pox | | |
| | (3) Ranikhet diseas | se | (4) Gumboro disease | | |
| 53. | The number of pair | rs of valves in lateral oe | sophageal hearts of phe | retima is : | |
| | (1) 1 | (2) 2 | (3) 3 | (4) 4 | |
| 54. | Folding and unfolding of actin and myosin leads to' Amoeboid movement. This is hypothesized by | | | | |
| | (1) Allen | | (2) Goldacre and Larsch | | |
| | (3) Berthold | | (4) Jennings | | |
| 55. | Match the following | ıg: | | | |
| | List -I | | List – II | | |
| | A. Echidna | | 1. Ophidia | | |
| | B. Echinus | | 2. Teleostei | | |
| | C. Echeneis | | 3. Platyhelminthes | | |
| | D. Echis | | 4. Echinoidea | | |
| | E. Echinococcus | | 5. Proto theria | | |
| | (1) A-5 B-1 C-2 D-4 E-3 | | (2) A-5 B-1 C-3 D-4 E-2 | | |
| | (3) A-5 B-4 C-2 D-3 E-1 | | (4) A-5 B-4 C-2 D-1 E-3 | | |
| 56. | The brachial plexus are formed by these spinal nerves: | | | | |
| | (1) IV, V, VI cervical | | (2) V, VI, VII, VIII cervical and I thoracic | | |
| | (3) IV to VII Lumbar | | (4) First three sacral | | |
| 57. | Earlobes of arctic f | ox are smaller than that | of tropical fox. This is | : | |
| | (1) Jordon's rule | (2) Bergman's rule | (3) Gloger's rule | (4) Allen's rule | |
| 58. | The following are endothermic vertebrates | | : | | |
| | I. Didelphis | II. Delphinus | III. Tachyglassus | IV. Pteropus | |
| • | • | which pair, the broad tra es is either poorly devel | | ssue connecting internally the two | |
| | 1) I and III | 2) I and II | 3) II and IV | 4) III and V | |
| 59. | Haemozoin is relea | ased into blood during th | ne infection of plasmodi | um vivax every | |
| | (1) 24 Hrs | (2) 48 Hrs | (3) 72 Hrs | (4) 12 Hrs | |
| 60. | Pelagic tunicate which exhibits Neoteny is | | | | |
| | (1) Amblystoma | (2) Salpa | (3) Oikolpleura | (4) Botryllus | |
| 61. | Which of the below | v given has a raft like ke | eel, a preengland and a p | penis? | |
| | (1) Dromnius | (2) Passer | (3) Struthio | (4) Tinamus | |
| 62. | The joint where synovial capsule and synov | | vial fluid are lacking is: | | |
| | (1) Carpals | | (2) Pubic symphysis in Females | | |
| | (3) Rnger and Toes in Males | | (4) Femus and Pelvis in Females | | |
| 63. | Reverse flow of food in the stomach of Rabbit is prevented by this: | | | | |
| | (1) Pyloric sphincter | | (2) Ileo-caecal valve | | |
| | (3) Cardiac sphincter | | (4) Uvula | | |
| 64. | The gland whose secretion facilitates the attachment of two earthworms during Copulation is located in this segment: | | | | |
| | $(1) 14^{th}$ | (2) 18 th | (3) 19 th | (4) 22 nd | |
| | and the second s | | | a a | |

| 65 | Aggartian (A) . The long needs of Gireffe | is due to contrinctel so | laction | | | |
|------------|---|--|--------------------------------------|--|--|--|
| 65. | Assertion (A): The long neck of Giraffe is due to centripetal selection. Reason (R): During directional selection when the mean value of phenotype coincides with new | | | | | |
| | optimum, environmental conditions. Centripetal selection takes over. | | | | | |
| | | | | | | |
| | (1) Both statement and reason are true and reason is a correct explanation to the statement | | | | | |
| | (2) Only statement is true and reason is not true | | | | | |
| | (3) Both statement and reason are not true(4) Both statement and reason are true, but reason is not the correct explanation to the statement | | | | | |
| 66 | | | rect explanation to the statement | | | |
| 66. | The vein that does not directly open into | | (A) D | | | |
| 6 7 | (1) Pre caval (2) Post caval | (3) Pulmonary | (4) Posterior mesenteric | | | |
| 67. | The number of segments on the anal cer | | (A) 10 | | | |
| 60 | (1) 12 (2) 15 | (3) 18 | (4) 10 | | | |
| 68. | The lactic acid generated during muscle | | | | | |
| | (1) Muscle (2) Kidney | (3) Pancreas | (4) Liver | | | |
| 69. | An example of liquid tumor is: | | | | | |
| | (1) Glioblastoma | (2) Adeno carcinom | | | | |
| | (3) Chondrosarcoma | (4) Myelocytic leuk | temia | | | |
| 70. | Acromegaly is due to the hypersecretion | of a hormone from: | | | | |
| | (1) Neurohypophysis | (2) Adenohypophys | sis | | | |
| | (3) Cells of Leydig | (4) Pars intemediali | S | | | |
| 71. I | n the insect which feeds on Nectar the pro | oboscis is formed by | | | | |
| | (1) Hypopharynx (2) Mandibles | (3) Galea | (4) Labium | | | |
| 72. | The hormone that prepares and maintain | ns the uterus during preg | nancy is secreted by: | | | |
| | (1) Corpora cardiaca | (2) Corpus leuteum | | | | |
| | (3) Corpora albicans | (4) Graffian follicle | | | | |
| 73. | Arrange the periods of palaeozoic era in | ascending order in a ge | eological time scale: | | | |
| | (1) Cambrian \rightarrow Ordovician \rightarrow Silurian \rightarrow Devonian \rightarrow Carboniferous \rightarrow Permian | | | | | |
| | (2) Cambrian → Devonian → Ordovician → Silurian → Carboniferous → Permian | | | | | |
| | (3) Cambrian \rightarrow Ordovician \rightarrow Devonia | $an \rightarrow Silurian \rightarrow Carbor$ | niferous → Permian | | | |
| | (4) Silurian \rightarrow Devonian \rightarrow Cambrian $-$ | | | | | |
| 74. | The labrofrontal nerves in Cockroach or | | , | | | |
| | (1) Sub oesophageal ganglia | (2) Supra oesophag | eal ganglia | | | |
| | (3) Antennary nerves | (4) Frontal ganglia | om gungnu | | | |
| 75. | The deficiency of ~his vitamin is known | , , , , | rly pregnancy of rat | | | |
| 75. | (1) Retinol (2) Calciferol | (3) Tocopherol | (4) Napthoquinone | | | |
| 76. | The voluntary response to the distension | • • | (1) Tupinoquinone | | | |
| 70. | (1) Polyurea (2) Micturition | (3) Mellitus | (4) Menstruation | | | |
| 77. | The total number of Progeny obtained the | ` ' | | | | |
| //. | many are recombinants? | irougii diliyorid cross oi | Wender is 1200 in 19 generation. How | | | |
| 78. | Match the following: | | | | | |
| , 0. | List –I | List – II | | | | |
| | A. Milstein | 1. Interferon | | | | |
| | B. Erythropoiethin | 2. r-DNA | | | | |
| | C. Type II Enodonuclease | | | | | |
| | | 3. Hybridoma4. Palindrome | | | | |
| | D. Fusogen | | | | | |
| | E. Lindermann | 5. Poly Ethylene Gl | • | | | |
| | (1) A-3 B-2 C-4 D-5 E-1 | (2) A-3 B-2 C-5 D- | (2) A-3 B-2 C-5 D-4 E-1 | | | |

(3) A-3 B-2 C-4 D-1 E-5

- (4) A-2 B-3 C-4 D-5 E-1
- 79. In a skip generation inheritance of colour blindness, the trait from a colour blind man is passed on to:
 - (1) Daughter
- (2) Son
- (3) Grand daughter
- (4) Grand son
- 80. The coelom of the animals which are commonly known as "tooth shells" orgainates .
 - (1) By enterocoelic method
 - (2) By Schozocoelic method and filled with colemic fluid
 - (3) By splitting of embryonic mesoderm and filled with the blood (4) From the blastocoel

ANSWERS

| (11) | (10) 0 (10) 1 | (1.1) | (15) 0 | |
|--------|------------------|------------|--------|--|
| (41) 3 | (42) 2 (43) 1 | (44) 4 | (45) 3 | |
| (46) 2 | (47) 3 (48) 4 | (49) 2 | (50) 3 | |
| (51) 1 | (52) 2,3,4 (53)3 | (54) 2 | (55) 4 | |
| (56) 2 | (57) 4 (58) 1 | (59) 2 | (60) 3 | |
| (61) 4 | (62) 2 (63) 3 | $(64) \ 3$ | (65) 1 | |
| (66) 4 | (67) 2 (68) 4 | (69) 4 | (70) 2 | |
| (71) 3 | (72) 2 (73) 1 | (74) 2 | (75) 3 | |
| (76) 2 | (77) 3 (78) 1 | (79) 4 | (80) 2 | |