

Exercise

- Which one of the following is not a site of action in human body for the malarial parasite plasmodium?
[NDA-II 2015]
(a) Liver (b) Kidney
(c) Red blood cell (d) Brain
- In blood, platelets are required for : [NDA-II 2015]
(a) transporting oxygen
(b) transporting carbon dioxide
(c) initiating blood clotting
(d) initiating degradation of urea
- Which one of the following vitamins is synthesized in our?
[NDA-II 2015]
(a) Vitamin A (b) Vitamin B
(c) Vitamin C (d) Vitamin D
- Living things are grouped into subgroups like plant kingdom/animal kingdom. Which one of the following is not correct for animal kingdom? [NDA-II 2015]
(a) Cannot make their own food
(b) Body contains cellulose
(c) Do not have chlorophyll
(d) Migrate from one place to another
- Muscle fatigue is due to the accumulation of:
[NDA-II 2015]
(a) Cholesterol (b) Lactic acid
(c) Lipoic acid (d) Triglycerides
- Carbon and energy requirements of autotrophic organisms are fulfilled by: [NDA-II 2015]
(a) Photosynthesis (b) Gluconeogenesis
(c) Glycogenesis (d) External sources
- Which one of the following is not an example of eukaryotic organism? [NDA-II 2015]
(a) Yeast (b) Bacteria
(c) Plant (d) Human being
- Who among the following discovered the antibiotic producing fungus from Penicillium genus?
[NDA-II 2015]
(a) Louis Pasteur (b) Sir Alexander Fleming
(c) Stanley Prusiner (d) Robert Hooke
- Perspiration cools the body because not correct for animal kingdom? [NDA-I 2015]
(a) presence of water on the skin is cooling
(b) evaporation requires heat
(c) water has a high specific heat
(d) water is a poor conductor of heat
- 'Lub-dup' sound is produced due to action of
[NDA-I 2015]
(a) Large intestine (b) Lungs
(c) Heart (d) Oesophagus
- Which one of the following is not a part of nerves ?
[NDA-I 2015]
(a) Axons (b) Connective tissues
(c) Schwann cells (d) Smooth muscles
- Which endocrine gland requires iodine to synthesize a particular hormone whose deficiency may cause goitre disease?
[NDA-I 2015]
(a) Hypothalamus (b) Pancreas
(c) Thymus (d) Thyroid gland
- Precursor of which one of the following vitamins comes from β -carotene? [NDA-I 2015]
(a) Vitamin A (b) Vitamin C
(c) Vitamin D (d) Vitamin K
- When heat rays are reflected from Earth, gases like dioxide, Nitrous oxide do not allow them to escape back to the space causing our planet to heat up. These gases are known as
[NDA-I 2015]
(a) Noble gas (b) Green-house gas
(c) Hot gas (d) Blue gas

Biology

15. Which of the following are the characteristics of organic farming? [NDA-I 2015]
1. Use of chemical fertilizers to improve soil fertility.
 2. Frequent decomposing and fallowing.
 3. Use of herbs to control pests.
 4. Higher productivity per hectare.
- Select the correct answer using the code given below:
- (a) 1 and 4 only (b) 1, 3 and 4
(c) 2 and 3 only (d) 2, 3 and 4
16. The seeds of flowering plants are made up of [NDA-I 2015]
- (a) Ovary and ovary wall
(b) Embryo, food reserves and coat
(c) Cotyledons
(d) Zygotes
17. Gametophytes of sexually reproducing flowering plants are [NDA-I 2015]
- (a) Haploid (b) Diploid
(c) Tetraploid (d) Polyploid
18. In plants, which one of the following gases is released during Photosynthesis? [NDA-I 2015]
- (a) Carbon dioxide (b) Oxygen
(c) Hydrogen (d) Methane
19. Which one of the following is the smallest unit showing the properties of life such as capacity for metabolism, response to the environment, growth and reproduction? [NDA-I 2015]
- (a) Gene (b) Chromosome
(c) Nucleus (d) Cell
20. All life forms contain molecules of life these are [NDA-I 2015]
- (a) Carbohydrates (b) Proteins
(c) Nucleic acids (d) All of these
21. Energy is required for maintenance of life. It is obtained by a process called [NDA-I 2015]
- (a) Metabolism (b) Phagocytosis
(c) Photorespiration (d) Decomposition
22. **Statement I:** Growth of plants is smooth with a complete fertilizer [NDA-I 2015]
Statement II: A complete fertilizer always contains N, P, K.
- (a) Both the statements are individually true and Statement II is the correct explanation of Statement I.
(b) Both the statements are individually true but Statement II is not the correct explanation of Statement I.
(c) Statement I is true but Statement II is false.
(d) Statement I is true but Statement II is true.
23. Consider the following statement : [NDA-II 2014]
1. Carbohydrates are the only source of energy to humans.
2. Fats give maximum energy on oxidation as compared to other foods.
- Which of the statements given above is/are correct ?
- (a) 1 only
(b) 2 only
(c) Both 1 and 2
(d) Neither 1 nor 2
24. Leprosy is caused by [NDA-II 2014]
- (a) Virus (b) bacteria
(c) protozoa (d) retrovirus
25. Which one of the following animals is cold blooded ? [NDA-II 2014]
- (a) Dolphin (b) Shark
(c) Whale (d) Porpoise
26. What one of the following is not a part of female reproductive system? [NDA-II 2014]
- (a) Fallopian tube (b) Cervix
(c) Urethra (d) Vagina
27. Which one of the following is not a function of liver? [NDA-II 2014]
- (a) Conversion of glucose into glycogen
(b) Production of urea
(c) Destruction of dead and worn-out red blood cells
(d) Absorption of food and excess water from the undigested food
28. Growth and repair of damaged tissue involve [NDA-II 2014]
- (a) mitotic cell division only
(b) both mitotic and meiotic cells divisions
(c) meiotic cell division only
(d) amitotic cell division only
29. Which of the following groups of plants can be used as indicators of SO₂ pollution of air ? [NDA-II 2014]
- (a) Ferns (b) Mentha
(c) Lichens (d) Hornworts
30. Which one among the following is a plant hormone ? [NDA-II 2014]
- (a) Insulin (b) Thyroxin
(c) Gibberellin (d) Estrogen
31. **Statement I :** Amoeba is a unicellular organism and the single cell performs all functions of a living organism.
Statement II : Cell is the fundamental unit of living organism. [NDA-II 2014]
- (a) Both the statements are individually true and Statement II is the correct explanation of Statement I.
(b) Both the statements are individually true but Statement II is not the correct explanation of Statement I.
(c) Statement I is true but Statement II is false.
(d) Statement I is true but Statement II is true.

32. The site of cellular respiration in animal cell is
[NDA-I 2014]
(a) ribosome (b) mitochondria
(c) endoplasmic reticulum (d) lysosome
33. Which one among the following groups is the most abundant in terms of number of species identified?
[NDA-I 2014]
(a) Fungi (b) Green plants
(c) Bacteria (d) Insects
34. Dropsy is a disease caused due to adulteration in
[NDA-I 2014]
(a) ghee (b) arhar dal
(c) mustard oil (d) turmeric powder
35. After diagnosis of disease in a person, the doctor advises the patient iron and folic acid tablets. The person is suffering from
[NDA-I 2014]
(a) osteoporosis
(b) anaemia
(c) goitre
(d) protein-energy malnutrition
36. What is 'breakbone fever' most commonly known as
[NDA-I 2014]
(a) Typhoid (b) Rhinitis
(c) Yellow fever (d) Dengue
37. In honey, which one among the following sugars predominates?
[NDA-I 2014]
(a) Sucrose (b) Fructose
(c) Galactose (d) Maltose
38. Within an animal cell, the most abundant inorganic constituent of protoplasm is
[NDA-I 2014]
(a) sodium and potassium salt
(b) water
(c) iron
(d) phosphate
39. Which of the following statements about vitamins are correct?
[NDA-I 2014]
1. Vitamin C is essential to make connective tissue in body.
2. Vitamin D is needed for synthesis of eye pigment.
3. Vitamin B12 helps in maturation of RBC.
4. Vitamin C is required to make use of calcium absorbed from the intestine.
Select the correct answer using the code given below.
(a) 1 and 2 (b) 1 and 3
(c) 2 and 4 (d) 1 and 4
40. Leaves of which of the following plants are not used for the rearing of silkworms?
[NDA-I 2014]
(a) Mulberry (b) Castor
(c) Oak (d) Teak
41. Bats can know about their prey at a distance even in the night by emitting
[NDA-II 2013]
(a) infra-red lights.
(b) ultraviolet lights.
(c) chemicals from their body.
(d) ultrasonic sounds.
42. Which one among the following animals is a mammal?
[NDA-II 2013]
(a) Great Indian Bustard
(b) Gharial
(c) Platypus
(d) Hornbill
43. Which one among the following diseases is not caused by polluted water?
[NDA-II 2013]
(a) Dysentery (c) Typhoid
(b) Jaundice (d) Tuberculosis
44. Solutions of three enzymes were prepared namely lipase, trypsin and amylase, in order to remove stains from a piece of cloth. Out of these three enzyme solutions, only lipase could completely remove the stain. This indicates that the stain was due to:
[NDA-II 2013]
(a) Oil
(b) Protein
(c) Mixture of protein and oil
(d) Starch containing plant pigment
45. Muscles of which one among the following body parts contract slowly but can remain contracted for a longer time?
[NDA-II 2013]
(a) Face (b) Arms
(c) Intestine (d) Legs
46. Which one among the following animals gives birth to the biggest baby?
[NDA-II 2013]
(a) Elephant (b) Rhinoceros
(c) Blue whale (d) Hippopotamus
47. Which one among the following substances is never excreted out through urine under normal circumstances in any healthy individual?
[NDA-II 2013]
(a) Urea (b) Sodium
(c) Amino acid (d) Potassium
48. Which one among the following organs in humans is not involved in elicitation of immune response?
[NDA-II 2013]
(a) Thymus (b) Brain
(c) Spleen (d) Lymph Nodes
49. Which one among the following animals does not undergo periodic moulting of their external body covering?
[NDA-II 2013]
(a) Cockroach (b) Cobra
(c) Earthworm (d) Dragonfly
50. Presbyopia is a visual defect caused by [NDA-II 2013]
(a) Elongation of the eye ball.
(b) Shortened curvature of the eye lens.
(c) Weakening of the ciliary muscles.
(d) Gradually increasing flexibility of the eye lens.

Biology

51. From which part of turmeric, is the turmeric powder obtained? [NDA-II 2013]
 (a) Dried rhizome (b) Dried root
 (c) Dried fruit (d) Seed
52. Consider the following statements regarding osmosis in animal cells: [NDA-I 2013]
 1. If the water potential of the solution surrounding the cell is too high, the cell shrinks.
 2. If the water potential of the solution surrounding the cell is too low, the cell swells and bursts.
 3. It is important to maintain a constant water potential inside the animal body.
 4. In animal cells, water potential far exceeds the solute potential.
 Which of the statements given above is/are correct?
 (a) 1 and 2 (b) 3 only
 (c) 1, 3 and 4 (d) 2 and 3
53. Consider the following diseases [NDA-I 2013]
 1. Cholera
 2. Tuberculosis
 3. Filariasis
 4. Typhoid
 Which of the above diseases are caused by bacteria?
 (a) 1 and 3 only (b) 2 and 4 only
 (c) 1, 3 and 4 (d) 1, 2 and 4
54. The sex of a newborn baby is determined by the chromosome inherited from [NDA-I 2013]
 (a) the mother (b) the father
 (c) mother's mother (d) father's father
55. The Nobel Prize in Medicine for the year 2012 has been awarded to John B. Gurdon and Shinya Yamanaka for the discovery that [NDA-I 2013]
 (a) mature specialized cells can be reprogrammed to become immature cells
 (b) stem cells can be programmed to develop individual body organs
 (c) dendritic cells have a critical role in the development of adaptive immunity
 (d) thymus cells have a critical role in the development of innate immunity
56. Which one among the following statements about a healthy diet is correct? [NDA-I 2013]
 (a) Regular eating of high-energy snacks between meals is healthy since it provides energy and vitamins in plenty.
 (b) Fruits and vegetables make a good choice because their energy content is high.
 (c) A balanced diet must contain plenty of fat and protein with little carbohydrates and fibre.
 (d) An optimal quantity of fat, protein, carbohydrate with adequate amount of water and fibre makes a healthy diet.
57. The complete digestion of carbohydrates, proteins and fats occurs in [NDA-I 2013]
 (a) stomach
 (b) liver
 (c) small intestine
 (d) large intestine
58. Which one among the following hormones stimulates the plant cells to grow in a manner such that the plant appears to be bent towards light? [NDA-I 2013]
 (a) Cytokinin (b) Auxin
 (c) Gibberellin (d) Abscisic acid
59. The main thinking part of the brain is [NDA-I 2013]
 (a) midbrain (b) hypothalamus
 (c) forebrain (d) hindbrain
60. **Statement-I:** Autotroph plants contain the pigment chlorophyll for meeting their requirement of carbon and energy.
Statement-II: Photosynthesis is the process of converting water into food using sunlight and oxygen. [NDA-I 2013]
Code:
 (a) Both the statements are individually true and statement II is the correct explanation of statement I.
 (b) Both the statements are individually true but statement II is not the correct explanation of statement I
 (c) Statement I is true but statement II is false
 (d) Statement I is false but statement II is true
61. Consider the following statements in relation to plant tissue chlorenchyma: [NDA-I 2013]
 1. It is formed by the palisade and spongy mesophyll.
 2. It is a form of parenchyma which contains chloroplasts.
 3. It serves to transport organic solutes made by photosynthesis.
 4. It is a thin transparent layer which has chiefly a protective function.
 (a) 1 and 2 only (b) 1, 2 and 4
 (c) 2 and 3 (d) 1 only
62. Which of the following statements about sexual reproduction in flowering plants are correct? [NDA-I 2013]
 1. Stamen is present in the centre of a flower.
 2. Stamen produces pollen grains in the ovary.
 3. The swollen bottom part of carpel is the ovary.
 4. The fusion of germ cells gives rise to zygote.
 Select the correct answer using the code given below.
 (a) 2, 3 and 4 only
 (b) 2 and 4 only
 (c) 1 and 3 only
 (d) 1, 2, 3 and 4 only

