

# Biology Science Questions for CDS, CGL Tier-1, Railways and SSC 10+2 Exams

# **Biology Quiz 5**

Directions: Study the following questions carefully and answer the questions given below.

# **1.** Malaria is caused by mosquito bites. Which of the following is the causative microorganism of Malaria?

(A) Bacteria (B) Virus (C) Protozoa (D) None of the above

2. Which of the following bacteria is involved in fixation of nitrogen In leguminous plants?

- (A) E. coli (B) Rhizobium (C) Vibrio (D) Lactobacillus
- 3. Yeast is used In the production of
- (A) Sugar (B) AlcoholV (C) Hydrochloric acid (D) Oxygen
- 4. The number of nuclei present in a zygote is?
- (A) One (B) Two (C) Three (D) Four
- 5. Where is thyroid gland located in our body?
- (A) Neck (B) Stomach (C) Head (D) Instestines

6. The energy released during cellular respiration is immediately used to synthesise a molecule called ATP which is used to fuel all other activities in the cell. What is the full form of ATP?

- (A) Adenosine tri phosphate (B) Adenine tri phosphate
- (C) Ammonium tri phosphate (D) Acetic tri phosphate

# 7. The pressure of blood inside the artery during ventricular diastole is called?

(A) Systolic pressure

(B) Diastolic pressure

(C) The meaning of both the terms is same

(D) None of the above

8. The blood pressure is measured with an instrument called?

(A) Stethoscope (B) Suction device (C) Sphygmomanometer (D) Endoscope

9. The transport of soluble products of photosynthesis occurs in which part of the vascular tissue?

(A) Xylem (B) PhloemV (C) Either of the above (D) None of the above

10. Growth hormone regulates growth and development of the body. If there is a deficiency of this hormone in our body, it leads to dwarfism. What is the gland responsible for the secretion of growth hormone?

(A) Thyroid gland (B) Adrenal gland (C) Pineal gland (D) Pituitary gland

#### **Correct Answers:**

1	2	3	4	5	6	7	8	9	10
С	В	В	В	А	А	В	С	В	D

# Explanations:

#### 1.

Many human diseases are caused by microorganisms. Protozoa is the microorganism responsible for Malaria. Some of the other important diseases caused by other microorganisms are –

- 1. Bacteria- tuberculosis, cholera, typhoid
- 2. Virus- measles, chicken pox, polio, Hepatitis B

## 2.

Rhizobium lives in the root nodules of leguminous plants such as beans and peas. Rhizobia are special bacteria that can live in the soil or in nodules formed on the roots of legumes. In root nodules, they form a symbiotic association with the legume, obtaining nutrients from the plant and producing nitrogen in a process called biological nitrogen fixation.

Escherichia coli (abbreviated as E. coli) are bacteria found in the environment, foods, and intestines of people and animals. E. coli are a large and diverse group of bacteria. Although most strains of E. coliare harmless, others can make you sick.

Vibrio is a genus of Gram-negative bacteria, possessing a curved-rod shape, several species of which can cause foodborne infection, usually associated with eating undercooked seafood.

Lactobacillus is a genus of Gram-positive bacteria. They are a major part of the lactic acid bacteria group.

3.

Yeast is used in the production of alcoholic beverages. Through the process of fermentation, yeast converts sugars into carbon dioxide and alcohol. These two byproducts make yeast an extremely useful tool in food production.

# 4.

A zygote is the sperm and the egg after they have combined, therefor a zygote has two nuclei.

## 5.

The thyroid gland, or simply the thyroid, is in the endocrine gland in the neck, consisting of two lobes connected by an isthmus. It is found at the front of the neck, below the adam's apple. The thyroid gland secretes thyroid hormones, which primarily influence the metabolic rate and protein synthesis.

The hormones also have many other effects including those on development.

#### 6.

ATP is produced in the body when glucose breaks down. The full form of ATP is adenosine tri phosphate. ATP releases energy when it is broken down into ADP by hydrolysis during cell metabolism.

## 7.

The first number, called systolic blood pressure, measures the pressure in your blood vessels when your heart beats. The second number, called diastolic blood pressure, measures the pressure in your blood vessels when your heart rests between beats.

If the measurement reads 120 systolic and 80 diastolic, you would say "120 over 80" or write "120/80 mmHg."

#### 8.

Blood pressure is measured with sphygmomanometer in mm hg. Blood pressure measurements are always given in pairs, with the upper (systolic) value first, followed by the lower (diastolic) value.

Stethoscope is used for measuring the heart beat.

suction device may be used to clear the airway of blood, saliva, vomit, or other secretions.

Endoscope - An endoscopy (looking inside) is used in medicine to look inside the body. The endoscopy procedure uses an endoscope to examine the interior of a hollow organ or cavity of the body. Unlike many other medical imaging techniques, endoscopes are inserted directly into the organ.

#### 9.

Plants have two different types of transport tissue. Xylem transports water and solutes from the roots to the leaves, phloem transports food from the leaves to the rest of the plant. Transpiration is the process by which water evaporates from the leaves, which results in more water being drawn up from the roots.

#### 10.

Pituitary gland is located at the base of the brain. It is also known as the master gland of the body. Growth hormones are released by pituitary gland. It is also called hypophysis.

The adrenal glands (also known as suprarenal glands) are endocrine glands that produce a variety of hormones including adrenaline and the steroids aldosterone and cortisol. They are found above the kidneys. Each gland has an outer cortex which produces steroid hormones and an inner medulla.

The pineal gland (also called the "third eye") is a small endocrine gland. It produces melatonin, a hormone that affects the modulation of wake/sleep patterns and photoperiodic (seasonal) functions.

Thyroid gland is a large ductless gland in the neck which secretes hormones regulating growth and development through the rate of metabolism.



