

Diseases and First Aid

Class-VIII

Multiple choice questions:-

1. Put a tick mark (✓) against the correct alternative in the following statements:

a) A mosquito is a vector for

i) Typhoid

ii) Cholera

iii) Malaria

iv) Jaundice

b) Dengue is caused by a

i) Protozoan

ii) Virus

iii) Worm

iv) Fungus

c) The idea of vaccination was conceived by

i) Charles Darwin

ii) Alexander Flemming

iii) Isaac Newton

iv) Edward Jenner

d) Which one of the following is a communicable disease?

i) Measles

ii) Cancer

iii) Heart attack

iv) Allergy

d) Which one of the following is not a psychotropic drug?

i) Morphine

ii) Cocaine

iii) Heroine

iv) Penicillin

Short answer Questions:-

1. a) What is a non-communicable disease?

Ans- The disease which is not caused by any germ and so, cannot spread from an infected person to a healthy person (i.e. they are non transmissible) is called non-communicable disease.

b) What are communicable diseases?

Ans- The diseases which are caused by the germs and are spread from an infected person to a healthy one are called communicable diseases.

c) How can we control spreading of diseases by mosquitoes and houseflies?

Ans- We can control spreading of diseases by mosquitoes and houseflies by maintaining a healthy environment and taking few preventive measures.

1) Garbage should be kept in covered bins so that flies do not breed on them.

- 2) Water should not be allowed to stagnate outside our house and in our neighbourhood.
 - 3) All the drains should also be covered. This will prevent breeding of mosquitoes.
 - 4) Avoiding getting bitten by mosquitoes and using mosquito repellants.
 - 5) Food should be kept covered so that flies do not sit on them and thereby cause contamination.
- d) Public hygiene is equally important as personal hygiene. Give reasons.

Ans- Public hygiene is very important because if public hygiene is not maintained then there is a chance of chronic diseases to spread as an epidemic. This will affect a large number of people on a very large scale and will not be curable. Maintenance of public hygiene is also important to prevent these diseases as well as for a healthy growing population.

2. Name the following :-

- a) A viral disease caused due to sexual contact with an infected person - AIDS (Acquired Immuno Deficiency Syndrome)
- b) A disease caused due to Plasmodium - Malaria
- c) A disease caused by the bite of female Anopheles mosquito - Malaria
- d) Two viral diseases caused by mosquito bites.
- Dengue, Chikungunya.
- e) Any droplet borne disease - Tuberculosis

3. Define :-

Disease - A departure from normal health through structural or functional disorders of the body is called disease.

Immunization - An artificial way of introducing any kind of dead or weakened germs into the body of a living being for developing resistance (immunity) against the disease is called immunization.

Pathogen - The disease causing germs such as viruses, bacteria, fungi, worms, protozoa are called pathogens.

AIDS - A viral disease that weakens the immunity or self-defence mechanism of the human body, caused by HIV (Human Immunodeficiency Virus) is called AIDS. Its full form is Acquired Immuno deficiency Syndrome.

Vaccination - The practice of artificially introducing germs or germ substances into the body for developing resistance to particular diseases. is called vaccination.

Vector - The organisms which carry germs from a source of infection but themselves do not get the infection are called vectors. e.g - house flies, mosquitoes.

Long answer questions :-

Q-1 What is vaccination? Mention the four ways in which vaccines are prepared, giving the name of one disease for which each type of vaccine is used.

Ans - Vaccination is the practice of artificially introducing germs or germ substances into the body for developing resistance to particular diseases.

Four ways in which vaccines are prepared are -

1) By Using Killed germs -

e.g - TAB vaccine for typhoid, Salk's vaccine for poliomyelitis and the vaccine for rabies (dog bite)

2) By Using living weakened germs - The living germs are treated in such a way that they become very weak and as such, they cannot cause the disease.

They can induce antibody formation in the body.

e.g - the vaccine for measles, and the freeze dried

BCCr vaccine for tuberculosis.

3) By using ^{fully} virulent living germs - e.g - the vaccine for smallpox. In this vaccination, a person is inoculated with cowpox virus which is very similar to smallpox virus.

4) By using toxoids - They are vaccines used for diphtheria and tetanus. The toxoids are extracts of toxins secreted by bacteria and these poisons are made harmless by the addition of formalin, to retain the capacity to produce antibodies (antitoxins).

Q-2 Burns can be superficial burns, deep burns or chemical burns. What emergency care would you suggest in each case.

Ans- Superficial burns - In case of superficial burns, pour cold water over the burnt area. Then dry that portion and cover with sterile dressing.

Deep burns - In the case of deep burns, never use water and cover the injured part with dressing.

Chemical burns - In the case of chemical burns (due to acid and other chemicals) wash with running water for 10 mins and cover with dressing.

Q-3 Describe four ways in which communicable diseases are transmitted through various indirect methods.

Ans- Four ways in which communicable diseases are transmitted through various indirect methods are -

i) Touching and sharing items used by the infected person - The use of same towel, handkerchief or same bed, or sharing the same utensils which were handled by the patient may spread the disease to a healthy person.

2) Contaminated food and water or drink -

Many intestinal diseases are spread by the intake of vegetables and fruits that are not washed properly or are washed with contaminated water. The germs on infected vegetables and fruits on reaching our alimentary canal, multiply and cause the disease.

3) Vectors - Vectors are those organisms which carry germs from a source of infection but themselves do not get the ~~infected~~ infection.

e.g - Mosquitoes while feeding on the blood of a malaria patient, gain the germs in their bodies and get them transferred in the blood stream of a healthy person whom they bite next.

4) Droplet infection - Many viral and bacterial diseases of the respiratory tract are transmitted through droplets. e.g - the germs of tuberculosis pass into the air during sneezing or coughing of the patient. These fine droplets remain suspended in the air for quite sometime. The healthy person gets the infection by inhaling the same air containing these suspended droplets. Tuberculosis, common cold, measles, diphtheria etc spread in this way.

4 Crossword puzzle

Across (1-6)

1. The kind of pathogen which causes diseases like common cold and mumps → Virus
2. These may readily grow in your hair, if you do not wash it regularly → Lice
3. This is the vaccine for preventing tuberculosis.
→ BCG
4. The disease pertussis is known as whooping Cough.
5. One of the most common insects that visit our exposed foods and contaminate them → Flies
6. A disease that weakens body's defence system against infections → AIDS

Down (7-11)

7. Germ or germ substances introduced into the body to prevent occurrence of an infectious disease
→ Vaccine
8. A disease in which the eyes, the skin and the urine turn yellow → Jaundice
9. An organ usually affected by tuberculosis → Lung
10. A disease caused by the bite of an infected dog and which affects the central nervous system.
→ Rabies.
11. Cover this part of your body by a handkerchief while sneezing to prevent droplet infection to others
→ Mouth.