



PUBLIC SCHOOL DARBHANGA

In last module we have discussed about a balance diet and its importance. We have discussed that how exercise and good sleep are also important to us.

Today we will discuss about many types of diseases and how can we prevent from them

DISEASES

A disease is an abnormal condition in which the body is not able to function properly. Diseases can occur due to many reasons. Diseases can broadly be classified into two categories:

1. Non Communicable diseases
2. Communicable diseases

1. Non Communicable diseases

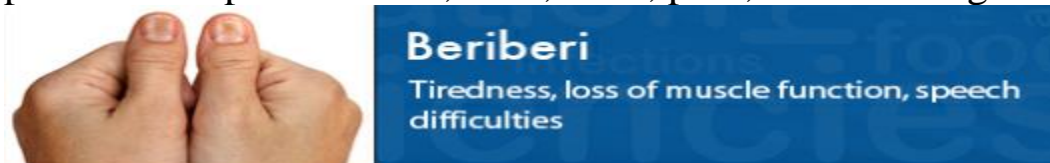
These are diseases that are not passed on from one person to another person. Some non-communicable diseases are:

- A. Night blindness
- B. Beriberi
- C. Scurvy
- D. Rickets
- E. Anaemia

A. Night Blindness: It is caused by the deficiency of Vitamin A. In night blindness the patient cannot see in dim light.



B. Beriberi: it is a disease caused by the deficiency of Vitamin B1. Vitamin B is present in unpolished rice, milk, meat, peas, cereals and green vegetable.



C. Scurvy: it is caused by the deficiency of Vitamin C. Vitamin C is present in citrus fruits, amla, tomato, green vegetable. Bleeding of gums and swelling of joints are the result of it.



D. Rickets: it is caused by the deficiency of Vitamin D. In this bones become soft. Vitamin D, along with phosphorus, makes our bones and teeth hard and strong. Calcium comes from milk and its products.



E. Goitre: it is caused by the deficiency of iodine. A gland of neck region swells in it. It can be prevented by using iodized salt in food.



F. Anaemia: it is caused by the deficiency of iron in food. In it the hemoglobin in the blood becomes low. So, the oxygen carrying capacity of the blood reduces. Iron is present in dates, apple, bananas, guavas, spinach, brinjal, pulses, jaggery, meat and liver.



2. Communicable diseases: These are spread by microbes and germs called bacteria, protozoa and viruses. These germs spread through coughing, spitting or sneezing, germs enter the body of a person through the nose or mouth, or with food and water. They are also enter the body through cuts in the skin.

Bacteria : Some bacteria causes diseases such as typhoid , pneumonia and tuberculosis.

On other hand , some bacteria are useful also. They help to convert milk into curd. Some bacteria present in our stomach help us in digestion.

Viruses : These are found everywhere and are always harmful. They cause diseases like common cold, chickenpox, smallpox ,etc.

Fungi : These can be both useful as well as harmful to us. Some useful fungi we come across in everyday life are mushroom and yeast. Besides many of them are used in medicines. On other hand some harmful fungi can cause diseases like ringworm and eczema.

Protozoa : Protozoa are bigger in size than bacteria. They are harmful as they cause diseases , like dysentery , malaria and sleeping sickness.



Bacterium



Virus



Fungus



Protozoan

Bacteria	Virus	Protozoa	Fungi
Plague	Common cold	Malaria	Ring worm
Tuberculosis	Measles	Dysentery	Athlet's foot
Meningitis	Chicken pox		Food Poisoning
Typhoid	Polio		
Pneumonia	AIDS		
	Influenza		

WAYS OF SPREADING DISEASES:

1. through direct contact
2. Through Infected food and water
3. Through the air we breathe
4. through insects
5. through carries

1. Through direct contact: Many diseases like common cold, chickenpox, measles, ringworm, whooping cough and scarlet fever spread through direct contact, either through clothing or other articles used by the sick person.



2. Through infected food and water: Diseases like typhoid, cholera, diarrhea, polio and jaundice spread eating infected food and drinking polluted water. Flies and cockroaches carry germs from sewers and contaminates our food and water. Handling of food with dirty hands and lack of proper sanitation ate the main cause of pollution of food and water. Milk from diseased cows also be a source of infection.



3. Through the air we breathe: Germs that cause diseases like chickenpox, whooping cough, diphtheria, influenza and scarlet fever are present in the discharge from nose and the mouth of a patient. These diseases can spread through sneezing and coughing. When germs are passed from one person to another through the air.



4. Through insects: Diseases like malaria, yellow fever, plague, dengue and kala-azar are caused by blood sucking insects like mosquitoes, fleas , bugs and sandflies. In 1994, a large number of people in parts of Maharashtra and Gujarat suffered from plague caused by bite of rat-fleas. Similarly, dengue fever is quite widespread.

Dengue is transmitted to a person by bite of an Aedes mosquito that is infected dengue fever.

Malaria is caused by a protozoan which is carried by the female Anopheles mosquito. When the mosquito bites a person suffering from malaria, the protozoa are sucked with the blood. When this mosquito bites a healthy person, the protozoa are injected into the person's blood, causing malaria.

Through carriers

Some diseases are spread by healthy carriers germs. A healthy person may carry germs of typhoid, cholera , dysentery, etc.in his body. Such a person usually does not suffer from diseases. However, people who come into contact with the carrier are in danger of catching the disease. AIDS is an incurable communicable disease that damages the immune system of the person and leads to death. It is spread by the virus called HIV.



Prevention of Communicable Diseases

Germs of certain diseases stay on articles like clothes , comb, towels and toys used by patient. All such articles including linen and clothing, must be disinfected or boiled to kill the germs. The floor and the walls of the room must be sprayed with disinfectant.

All cases of infectious diseases must be reported to the civic authorities so that precautions can be taken to prevent their spread in area. Children suffering from any communicable diseases should stay away from school till they are fully

recovered. Progress in the field of medicine and immunization have helped us to get rid of many diseases.



BOILING



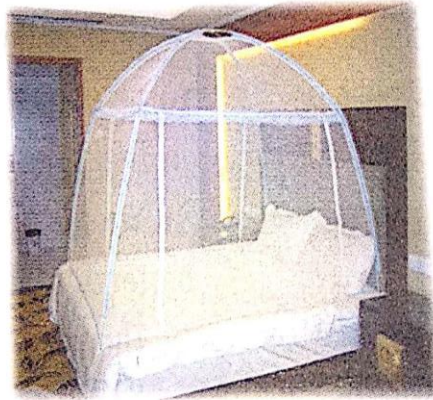
VACCINATION



KEEPING THE TOILET CLEAN



SUNLIGHT AND FRESH AIR



USING A MOSQUITO NET



CLEANING HOUSE

We should make efforts to prevent the breeding of germs (personal and environmental cleanliness prevent the breeding of germs). Destruction of mosquitoes and their ground is the best solution from these dreadful diseases.

Method for prevention

Houses should be airy and open. Fresh air and sunlight are natural disinfectants. Mattresses, linen and clothes should be exposed to sunlight from time to time.

A supply of clean and germ-free water for drinking and cooking is essential for health. Impure water should be boiled for about 10 -15 minutes and then stored in clean and covered containers. Water filters can also be used for purifying water. Chlorination is a way of purifying huge quantities of drinking water.

Germs in milk are killed by pasteurization. The milk is heated at high temperature for at least half an hour and then cooled down quickly. This kills harmful bacteria.

Breeding of flies must be prevented in or near your house as they pollute your food and water and act as carriers of disease. Rooms should have wire screens.

Toilets and bathrooms must be cleaned and disinfected regularly.

To stop the breeding of mosquitoes, water must not be allowed to stagnate. Mosquitoes lay eggs in standing water. To destroy mosquito larvae, the surface water in the tanks and ponds must be sprayed with oil. Use a mosquito net or mosquito repellent at night. Kitchen must be rid of all insects. Floors must be swept every day. Drains must be kept covered.

Vaccination

Vaccination is another way of protecting ourselves by acquiring immunity against certain diseases. There are vaccines available for diseases like diphtheria, cholera, typhoid, tetanus, polio, measles, mumps, meningitis and hepatitis. Pulse Polio is an immunization campaign established by the government of India in 1994 to eradicate polio by vaccinating.

From time to time children under the age of five are given oral polio drops against polio virus. This campaign proved to be successful and the incidents of polio in India has decreased dramatically.

We must get ourselves vaccinated as a protection against these diseases.

There are national program to eradicate communicable diseases. If we take care of ourselves and our surroundings, we can stay healthy.

Remember : Prevention is better than cure.