

Subject: Ev.Sc./ 5<sup>TH</sup>

Aspect: Review

**Lesson no.: 10. Pollution**

**Learning Objective:** Students will learn about soil pollution, its cause and effects.

**Skills:** Development of Environmental Sensitivity.

**Presentation:**

***Soil Pollution***

Soil pollution refers to anything that causes contamination of soil and degrades the soil quality. It occurs when the **pollutants** causing the pollution reduce the quality of the soil and also pose a risk to human health and/or the ecosystem.

Soil contamination or soil pollution is mostly caused due to human activities. The soil contamination can occur due to the presence of chemicals such as pesticides, herbicides, petroleum etc in an excess amount. Dumping of **non-biodegradable** waste and industrial wastes like bottles, metal chips, plastic bags also cause soil degradation or soil pollution.

*Non-biodegradable wastes are those who cannot be decomposed or dissolved by natural agents.*



## ***Effects of soil pollution:***

**1. Effect on Health of Humans:** Crops and plants grown on polluted soil absorb much of the pollution and then pass these on to us. This causes many small and terminal illnesses e.g., cancers, nausea, skin irritation etc.

**2. Decreased Soil Fertility:** The toxic chemicals present in the soil can decrease soil fertility and therefore decrease in the soil yield. The contaminated soil is then used to produce fruits and vegetables which lacks quality nutrients and may contain some poisonous substance to cause serious health problems in people consuming them.

**3. Changes in Soil Structure:** The death of many soil organisms (e.g. earthworms) in the soil can lead to alteration in soil structure. Apart from that, it could also force other predators to move to other places in search of food.

## ***Measures to control soil pollution***

- Manures should be used, instead chemical fertilizers, in agriculture fields.
- Use of pesticides should be minimized.
- Recycling of waste should be done before disposal.
- Household and industrial waste should be divided into biodegradable and non biodegradable waste and then disposed off.
- Reforestation and afforestation should be promoted.

## ***Homework:***

Q 1. What is soil pollution and how is it caused?

Q 2. What steps we can take in our homes to minimize soil erosion?