ENVIRONMENTAL STUDIES

LECTURE-27

Various Sources of Solid Waste

Every day, tonnes of solid waste are disposed of at various landfill sites. This waste comes from homes, offices, industries and various other agricultural related activities.

These landfill sites produce foul smell if waste is not stored and treated properly. It can pollute the surrounding air and can seriously affect the health of humans, wildlife and our environment. The following are major sources of solid waste:

1. Residential

Residences and homes where people live are some of the major sources of solid waste. The garbage from these places includes food wastes, plastics, paper, glass, leather, cardboard, metals, yard wastes, ashes and special wastes like bulky household items such as electronics, tires, batteries, old mattresses and used oil.

Most homes have garbage bins where they can throw away their solid wastes in and later, the bin is emptied by a garbage collecting firm or person for treatment.

2. Industrial

Industries are known to be one of the biggest contributors to solid waste. They include light and heavy manufacturing industries, construction sites, fabrication plants, canning plants, power and chemical plants.

These industries produce solid waste in the form of housekeeping wastes, food wastes, packaging wastes, ashes, construction and demolition materials, special wastes, medical wastes as well as other hazardous wastes.

3. Commercial

Commercial facilities and buildings are yet another source of solid waste today. Commercial buildings and facilities, in this case, refer to hotels, markets, restaurants, godowns, stores and office buildings.

Some of the solid wastes generated from these places include plastics, food wastes, metals, paper, glass, wood, cardboard materials, special wastes and other hazardous wastes.

4. Institutional

The institutional centers like schools, colleges, prisons, military barracks and other government centers also produce solid waste. Some of the common solid wastes obtained from these places include glass, rubber waste, plastics, food wastes, wood, paper, metals, cardboard materials, electronics as well as various hazardous wastes.

5. Construction and Demolition Areas

onstruction and demolition sites also contribute to the solid waste problem. Construction sites include new construction sites for buildings and roads, road repair sites, building renovation sites and building demolition sites.

Some of the solid wastes produced in these places include steel materials, concrete, wood, plastics, rubber, copper wires, dirt and glass.

6. Municipal Services

The urban centers also contribute immensely to the solid waste crisis in most countries today. Some of the solid waste brought about by the municipal services include street cleaning, wastes from parks and beaches, wastewater treatment plants, landscaping wastes and wastes from recreational areas, including sludge.

7. Treatment Plants and Sites

Heavy and light manufacturing plants also produce solid waste. They include refineries, power plants, processing plants, mineral extraction plants and chemical plants. Among the wastes produced by these plants, there are industrial process wastes, unwanted specification products, plastics, metal parts, just to mention a few.

8. Agriculture

Crop farms, orchards, dairies, vineyards and feedlots are also sources of solid wastes. Among the wastes they produce are agricultural wastes, spoiled food, pesticide containers and other hazardous materials.

9.Biomedical

This refers to hospitals and biomedical equipment and chemical manufacturing firms. In hospitals, there are different types of solid wastes produced.

Some of these solid wastes include syringes, bandages, used gloves, drugs, paper, plastics, food wastes and chemicals. All these require proper disposal or else they will cause a huge problem for the environment and the people in these facilities.