

ENVIRONMENTAL DEGRADATION AND SUSTAINABLE DEVELOPMENT

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Man has become a victim of his environment. He is not in control of his mind but a victim of the environment & the total stress in polluting our environment in a very subtle way through our negative emotions. But it takes quite some time to clear the environment of this. It is inevitable sometimes you feel stressed, sometimes you feel negative, sometimes you feel doubt, sometimes you get into all sorts of moods -is inevitable. It happens. Nobody wants it. But when it happens how do we handle them? We hear a lot about other things in life but we spend very little time to hear about ourselves: how to handle our mind? How to be in the present moment? How to live we have not learnt. This is the most unfortunate thing. Then what is the solution? This is where we miss a very fundamental principle that governs our environment, our mind our emotions & our life in general. Our body has the capacity to sustain much longer the vibrations of bliss & peace than it does negative emotions because positively is in the centre of the atom & electrons are only the periphery, same is with our mind; the centre core of our existence is bliss, positively & joy but it is surrounded by a cloud of negative ions. Through the help of the breath we can easily get over our negative emotions in a short period of time. Through meditation & certain breathing techniques we can clear this negative cloud.

According to Mahatma Gandhi "There is enough in the world for everybody's needs but not for everybody's greed". The opinion holds good even today as our fast growing civilization uses more of modern technology for day-to-day life e.g., Air cooler, Refrigerator, Washing Machine, Car/Two Wheelers etc. are commonly used by even middle class people which results in environmental pollution (causing noise, air pollution, water pollution etc.). The whole world is classified into North & South Blocks that means the U.S.A. & Asian nations are polluting the atmosphere more than the south blocks.

CLIMATE CHANGES IN INDIA:

The melting of Antarctic & glaciers will have a disastrous impact on India. Already, the global sea level has risen by 10-25 centimeters. A one meter rise, according to an Asian Development Bank study, may displace around 7.1 million people in India. The entire population of Lakshadweep could be at risk. A UN study estimates that one meter sea level rise will inundate an area of 170,000 hectares, primarily agricultural land in Orissa, West Bengal. & Goa stands to lose 4.32 percent of its total area due to sea level rise.

The impact of climate change on the economy of a City will be staggering. A city like Mumbai could lose around US \$48 billion & those like Bhopal would lose around US \$75 million, according to the Centre for science & environment, New Delhi. The overall impact is alarming. In the 21st century, the annual average temperature over India increased by about 0.57 degree c. In future, rainfall in winters may decline by 5-25 percent leading to droughts in dry summer months. More dry spells may result in a decline of 12.3 percent in agricultural production.

Review of Literature:

1) A study by Stewart Hudson who has presented his paper at the World Bank Conference reveals that pollution intensity per capita appears to fall as income rises but evidence of the relationship presented at World Bank Conference was based on industrial toxic emissions data, which reflects changes in economic structure (compositions! effects) & not the toxic intensity of manufacturing output. Toxic emissions continue to rise worldwide.

2) A study by Marian Radetzki discusses the links between growth & the environment in general terms. The author argues that increasing levels of economic Activity are linked to improved environmental conditions. Explaining this relationship, he identifies as key factors the high income elasticity of demand for environmental quality, compositional shifts towards cleaner environmental activities at higher income levels & the extension of property rights combined with development of policies to deal with common global externalities in industrial countries.

3) Explains that the intensity of pollution is beginning to level off in industrial countries & is increasing in developing countries. They relate data on toxic emissions from the United States to cross-country manufacturing & find that the intensity of emissions grew rapidly in developing countries during the 1970s & 1980s. So, dirty industries have certainly moved into developing countries, but it for 8 moot question that whether they migrate from industrial countries

4) Patrick Low & Alexander Yeats use trade flow data as a proxy for shifts in the Pattern of international industrial location for examine how much dirty industries have migrated to developing countries over the past two decades. They identified 43 dirty industries based on the assumption that the higher the expenditure on pollution abatement & control, the dirtier an industry. Trade data show that the share of dirty industry trade in total trade declined between 1965 & 1990, largely as a result of trends in industrial countries. Over the same period, the share of the output of dirty industries in the exports of many developing **countries increased.**

5) Low & Yeats supplemented that analysis with an examination of the revealed comparative advantage (RCA) Of 109 **countries** if the dirty industries. The RCA index measures whether the share of a product in a country's manufactured export is proportionately larger than the share of that product in the world trade in manufactures. If it is, the country is said to have a revealed comparative advantage in that product. Applying this index to dirty industries showed a disproportionately large increase in the number of developing countries with RCA's in most of the unbundling technology, such as the expense of shifting from "Eleanor" production processes to older, "dirtier" ones.

Objectives of the study

The present study has the following objectives

1. To know the environmental situation during the past 40 decades both at micro & level
2. How poverty has a linkage with environment is purposively studied by choosing a Drought-prone district, Bijapur in Karnataka,
3. To study the effects of pollution on different sections of the community.

4. To suggest remedies.

Methodology:

The present study is based on data both primary & secondary sources. Bijapur district in Karnataka state is purposively selected for the study. Poverty is estimated across different castes, size of land holding & occupation wise poverty estimated taking consumer expenditure as the criteria for estimating poverty. Whether cutting of trees led to the drought, or drought itself causes the farmer to cut the trees for survival is a serious issue as Bijapur district has got hardly 2% of its area under forest.

Population Growth & Environment (World & India)

Year	Population of World (Billions)
1955	2.8
1990	3.3
2000	6.0
2025 (projected)	9.1

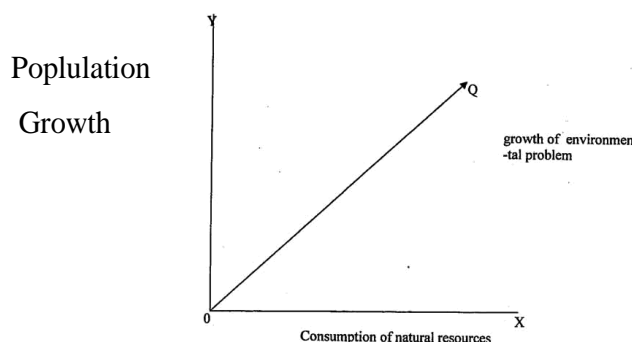
Population Growth India

Year	Population
1951	36.1
1961	43.9
1971	54.8
1981	68.3
1991	84.6
2001	102.7
2011	117.7
2021 (projected)	134.5
2031 (projected)	147.6
2041 (projected)	157.8

Source: Population Foundation of India (PFI) by Naterajan & Jayachandran-2001.

Population growth & consumption of natural resources:

The increased population also increases requirement for natural resources, due to environmental exploitation in the economic inequality & environmental abuse. Hence there is no doubt that **the explosion** must end. If we fail to control our population growth, nature will end it by her own way by killing a large portion of humanity. Therefore "we want green but not green revolution & industrial revolution."



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Snsustainable Development and Environmental Degradation.

Sustainable Development concept was popular since 1980's. The term sustainable development was first used in gin the world conservation strategy. However, this formulation emphasized sustainability in ecological terms, & was far fees ecnomic development i.e. 1) maintenance of ecnological balance 2) The sustainsble use of resource & 3) The maintenance of genetic diversité. The définition later turned of ecosystems ruiher than human need & aspiration. imperatives of 1e pmservation of the. According to Karshenas (1994) "Sustainable development may be defined in ternis of the pattern of strinctural change in naturel & Max wade capital stock, which ensures feasibility ofat **least** a msmininiurn **soci.** !? **desired** rate où growth ici the long-run."

Environmental Degradation

“Environmental problems are really social problems. They begin with people as cause and end with people as victims”. Edmund Hillan. Environmental pollution may be defined as the unfavourable alteration of our surrounding wholly or largely as a byproduct pattern, radiation levels, chemical and Physical constitution and abundance of organisms .there are several kinds of pollution like solide waste , radio - active , waste from nuclear plants, heat from thermal p1ants,gaseous pollution like carbon monoxide, So₂, No₂, CFC, (water,air, soil)etc.

Soil Degradation:

The demand for farmland and increased demand for Forest products to the Developing country have caused deforestation to the extent of 11 million hectares Atlas of Inida. The following kinds of soil degradations have been Quantified i.e.

Wind erosion	19.7 million hectares
Stalinization	04.1 „
Water logging	03.1 „
Water erosion	69.6 „
Soil fertility decline	15.7 „

The above data indicates the heavy degradation of soil due to high growth of population, high demand of forest goods, food and indusnial raw materials. In India total area of land is 32,87,266 Eq. k.m. and only ó2% of land is cultivable. India since 1947, 53000 s.q. k.m. of prime forests area larger than Punjab has been lost. The land is device in cropping, forest, grazing land and urban land. Thus the limits of potentially amble land. and the limits of increasing productivity. The loss of agricultural land due to urbanization and industrialization. Over grazing by cattle, irrigation schemes in area without drainage, modern methods of agriculture etc. These factors strips the land of its fertility and expose it to the risk of erosion of soil. Deforestation and soil erosion which in turn lead to floods, silting of rivers. Soil fertility and earth recuperative power are also damaged in the long run by the over use of chemical fertilizers and pesticides. Agricultura has become a

commercial activity. Therefore we use more fertilizers and pesticides to grow more food and raw materials for the industrial purpose and can more profit. In 1951, we used 2.2 million Tonne fertilizers and pesticides but, today it is much more increased to 13.6 million tones and we produce food 58.8 m.t.s to 210 m.t.s today.

DEFORESTATION:

India has a total geographical area of 32,88,000 sq.k.m. Out of this 7,47,800 sq.k.m. (22.74%) was occupied by forest. At the time of independence according to NASS 34,020 sq. k.m. forest was between 1951 -1972 in India. (71.5%) was deforested because of agricultural activities. Deforestation leads to soil erosion, loss of good grain, occurrence of drought threat eco — system. Due to soil erosion 6,000 M.T. soil run away from Ganga river per year, In India since 1947, 53,000 sq.k.m. Of prime forest larger than Punjab, has been lost. According to the working group of energy, in India 133 M.T. wood consumed as source of energy, out of this 110 M.T.wood consumed to house purpose i.e. cooking food & fire. The S.C, S.T,N.T. people gathered around 25 to 30 as a price for development. Deforestation has aroused because of Deforestation is leading to arise in four principal cause over grazing by cattle, fire & clearance of land for cultivation, excessive cutting of tree for timber, rail & road track, industrialization, urbanization etc. today vast area of forest is lost temperature.

Water is not Unlimited

1. Water covers nearly three-fourths of the earth's surface.
2. Most of the earth's surface water permanently frozen or salty.
3. Over 90% of the world's supply of fresh water is located in Antarctica. The earth's total allotment of water has a volume of about 344 million cubic miles. of this 315 million cubic miles (93%) is seawater!
4. Nine million cubic miles (2.5%) is in aquifers deep below the earth's surface.
5. Seven million **cubic miles (2%) is frozen in polar ice caps.**
6. 53,000 cubic miles of water pass through the planet's lakes & streams.
7. 4,000 cubic miles of water is atmospheric moisture.
8. 3,400 cubic miles of water are locked within the bodies of living things.
9. If all the world's water were fit into a gallon jug, the fresh water available for us to Use Would equal only about one tablespoon.
10. It doesn't take much salt to make water If one-thousandth (or more) of the weight "salty.
11. The overall amount of water on our planet has remained the same for two billion years.
12. The United States consumes water at twice the rate of other industrialized nations.

13.1.2 Billions - people worldwide do not have access to clean water.

14. EaGh day almost 10,000 children under the age of 5 in Third World countries die as a result of illnesses contracted by use of impure water.

15. Most of the World's people must walk at least 3 hours to fetch water.

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