

Human Induced Land Use/ Land Cover Changes in Northern Part of Gurgaon District, Haryana, India: Natural Resources Census Concept

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ABSTRACT There is tremendous pressure on the natural resources due to increasing population. To meet the demands of large population means the need for more food production, more requirement of energy, more water requirement, better civic amenities for a reasonable quality of urban life, more infrastructure development to sustain increasing pressure and increased per-capita expenditure for maintaining quality of life. Land resources being finite imply more judicious use of land resources to meet the ever-increasing demands. The unsustainable and unplanned exploitation of land resources is the major reason for degradation of our environment. The main issue is to bring a balance between economic development and conservation of resources, which is possible by proper inventory, and management of these resources on periodic basis. Recent technologies of Remote Sensing (RS) and Geographic Information System (GIS) have made it feasible and cost effective. Present study deals with RS and GIS based monitoring of land use/ land cover changes in northern part of Gurgaon District, Haryana. Total area under study is about 697 sq. km. IRS 1B LISS II satellite data paper prints of August 1996 and February 1997 and IRS-IC/ID LISS-III digital data of August/ September 2001, February 2002 and June 2002 were used. This data was analyzed in GIS environment. It is found that there is maximum increase in the area under settlements, which has increased almost four times over this period. The double crop area showed a decline however there as an increase in the area under closed forest. The wasteland has also decreased drastically due to its conversion to Settlements and other categories. The causes of these changes have also been analyzed.