## Geoinformatics in Water Management— Case Study of Allahabad City

## S. Singh<sup>1</sup> and R.K. Srivastava<sup>2</sup>

Department of Civil Engineering, Motilal Nehru National Institute of Technology Allahabad - 211 004, INDIA E-mail: <sup>1</sup>saumyasingh17@yahoo.co.in; <sup>2</sup>rksciv@yahoo.com

## A.B. Samaddar

Motilal Nehru National Institute of Technology Allahabad - 211 004, INDIA E-mail: absamaddar@yahoo.com

## **ABSTRACT**

Scarcity or misuse of water poses a serious threat to sustainable development. Access to sufficient amounts of clean water is increasingly recognized as the critical resource problem in the 21<sup>st</sup> century. Water consumption is likely to increase substantially in the future on account of rising population, economic growth, and social development. A conceptual framework for sustainable urban water management has been presented in this paper. The strategy includes major aspects of water sector viz. groundwater recharge, water audit, water accountability, transmission losses, institutional analysis and tariff fixation. In the present paper special focus is given to artificial recharge of ground water by using GIS. The whole database is created and stored on GIS platform (ArcInfo). An implementation of this analysis and decision making software is expected to work for sustainable water management.