

**Theme :Water Scarcity and Urban and Rural tensions  
over sharing Water Resources**

**Dams and Growing Urbanization vis-à-vis conflicts /tentions due to  
Corresponding shortage of Water Resource in Rural Command area.  
Historical Case studies of some Cities / Major Dams in India.**

**Author: Er.Suresh Shirke.**

Ex. Secretary to Govt. Irrigation Dept.and Director General, WALMI. Aurangabad.  
Chairman, Ind. Water.Res.Soc.(Pune Chapter)  
Founder Member Dams and Development Council of INDIA.

[shirke@eth.net](mailto:shirke@eth.net),[Web:shirkeconsultants.com](http://Web:shirkeconsultants.com) Tel: 91-20-24226107,FAX:91-20-24227200,Cell:9822024203

*The data available for last two three centuries concerning some cities in India indicates that Urbanization is taking place very rapidly affecting the Rural command area. The general trend of Urbanization, concentration of population in big cities has been decided by the Historical social and economic conditions for the last few Centuries.. This case studies in my paper make this point clear. The study concerning few representative cities in INDIA has been given for example Pune City, situated in Maharashtra State, the study of about four hundred indicates that the concept of Dams and Development was known in India centuries back. Referring to construction of Katraj Dam (Year1700,one Mcum) for population of about ten thousand. During British Regime, Khadakwasla Masonry dam was built in 1870 ,( 86 Mcum) The population was half Million in 1960. In 1991 it was about two Million. It is projected as 6.5 M in the Year 2025. The Industrial growth is also progressing with this or even at more rates!The total of three Storages is about 1000Mcum.*

*This has facilitated not only the drinking water requirement of about twenty Towns besides Pune city with canals running more than 200 Kms. but also provided the irrigation facility besides catering for the Industrial Areas where even some International industries are flourishing. Was there any effective solution to meet such large requirement of Water Resource for big Cities without compromising the rural requirements at large? The answer is found to be store/ divert the surplus available water in the Country first!. The means and ways, the nature and type of Dams may vary. **This has explained keeping in view the Economic, Environmental and Social aspects . Similar information for Cities like Mumbai,Bangalore. Nagpur etc will be made available to the extent possible.***

**Conclusions:** *In the Monsoonic climate,with dwindling river flows,after the Rainy Season;in Developing Country like India; Irrigation in Rural area ,Drinking water supply, Urbanization,Industrialization, depend closely on the assured supply of Water through Storages, Inter Basin /Intra Basin Transfer and so on..The River Basin Organisations are one of the possible solutions.. It is for certain, without any ambiguity, that the Industrialization in the drought prone area was totally dependent on assured supply of water through Large Storages.*

*.The following points are found to be very significant in sorting out the conflict,*

- 1] Construction of all the types of dams for cities, wherever they are technically Feasible and where there are no cheaper alternatives available.*
- 2] Effective , Efficient and JUDICIOUS use of available water.*
- 3] Treatment and Recycling of Water used.*