

RESEARCH DIRECTIONS

Changing land uses in the environs of India's cities

Associate Professor Basant Maheshwari from the School of Natural Sciences is leading a research team that will build a partnership between Australia and India for a major future international study integrating science, policy planning, management and community aspirations for a secure long-term water future. This project is being supported by the Australia India Institute.

'The landscapes of most Indian cities are going through enormous changes,' says Associate Professor Maheshwari. 'Populations are growing at an alarming rate and fertile agricultural lands at the periphery of the cities are being urbanised without consideration of the supply of future water and food. These zones of transition are causing significant impact on food production with increasing rainwater runoff from hard surfaces, more wastewater from urban areas, reduced water for agriculture and the environment and increased risks of pollution. The scarcity of water for amenities also affects recreational activities. All these changes have serious implications for people's lifestyle and the overall wellbeing of urban communities into the future.'

The team will identify land use changes and develop an overview of the national picture. They will conduct a detailed case study on one site to understand the drivers, conflicts, pressures and implications of past land use changes and future scenarios, including climate change. The project will include facilitating local and national workshops to understand and generate awareness about these issues and the challenges for future water and food security in India.



This program will develop long-term partnerships for research that will assist policy makers to achieve balanced and sustainable urban growth while securing water supplies for cities and retaining healthy, agriculturally productive and viable peri-urban zones in India and Australia.

Project Title: Changing Land Uses in Environs of Indian Cities – Understanding the Implications for Future Water and Food Security

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Contact Details: b.maheshwari@uws.edu.au

http://www.uws.edu.au/natural_sciences

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Australian Research Team: A/Prof B. Simmons, Dr H. Grewal (UWS); Dr B. Davidson, Dr B. Nawarathna, Dr B. George (UMelbourne); Prof P. Martin, Dr J. Williams (UNE); Mr. S. Akbar (I&I NSW)

Indian Research Team: Dr R. Purohit, Dr P.K. Singh, Dr D. Machiwal (University of Agriculture & Technology); Dr P. Amerasinghe, Dr M. Samad, Dr P. Pavelic, Dr P. Drechsel (Int. Water Management Institute); Dr Hakimuddin, Dr V.K. Saini, Mr. A.S. Jodha (NGO)