

Call for Proposals for Department of Science & Technology under the
TECHNOLOGY SYSTEM PROGRAMME
ON
WASTE MANAGEMENT

The Programme Advisory Committee (PAC) on Technology Systems Programme of DST identifies *inter-alia* areas needing technology interventions and proactively invites project proposals in the selected areas. One of the areas so selected is Waste Management.

Wastes are materials that are no longer required by people. Waste is an unavoidable natural by-product of any natural process on Earth but Nature reuses all of its by-products. Human interventions have, however, disturbed this balance, by producing toxic and non-degradable wastes. Even normal wastes are a problem because they are too much. In addition, the industrial development and the consumption life style are resulting in a huge amount of residuals and generation of waste which is increasing at a rapid rate. These have adverse impacts on environment. Toxic wastes, if disposed inappropriately and/or dumped illegally, there would be serious risk to health of people and to the ecosystem.

Among different waste fractions, plastic waste deserves special attention on account of its heat energy content and its treatment is relevant to energy and emission. A significant part and class of plastic waste can be recycled. Options for collection, segregation and treatment of plastic waste need to be examined with reference to India-specific conditions of the use of plastics, plastic waste generation, and current disposal practices.

Waste has a great diversity. Waste management in its entirety represents a big agenda for the country involving the Governments, every segment of the society and every individual. **Keeping technological intervention in view, PAC of the Technology System Programme** has identified the following three areas, to begin with, to invite project proposals, the first two being in toxic category: i) Electronic Waste, ii) Hospital Waste, iii) Plastic Waste.

Sound technological solutions, economically viable and environmentally justifiable are the need of the hour. It is important to take stock of technological developments, assess, analyse and look for material recycling systems with low environment loading and improve upon them or find better alternatives. The constituents of waste which cannot be recycled need to be safely disposed off. Disposal may include destruction (combustion, incineration) to generate energy and safe deposition.

Project proposals in the prescribed format may be sent to **Shri Sanjay Bajpai, Member Secretary, Programme Advisory Committee (PAC) on Technology Systems, Department of Science & Technology, Technology Bhavan, New Mehrauli Road, New Delhi 110 016 (E-mail: sbajpai@alpha.nic.in)**. The Proforma for submission of project proposals is available on <http://www.dst.gov.in> and can also be obtained by writing to the above address.