

## CHAIRPERSON'S MESSAGE

In the past few decades India has taken major strides in science and technology since its independence and is today recognized for its achievements in many fields ranging from space technology, defence technologies, nuclear technology, agriculture, textiles, health-care, and pharmaceuticals to info-tech. However, when one compares India's techno-economic performance with some of the advanced countries or even other fast growing developing countries, one finds that there is much to be desired. However, forces of globalization and technology diffusion demand that governments gradually become facilitators rather than controllers of technology in the future. This has brought in a paradigm shift in the ways of technology development and exchanges, thus calling for a serious review of S&T policies and practices for a role of non-government agencies.

Despite this impressive economic growth, scientific research continues to lag behind the country's possibilities. India spends less than 1% of its GDP on research and development, while China spends 2%, the US 2.8%, Japan 3.4% and Korea 4%. This value must increase if the country is serious about closing the gaps with leading nations. Insufficient scientific research in India's private sector seems to be part of the problem. The large pharmaceutical sector, for example, remains dominated by the fabrication of generic products rather than original formulations.

There are serious challenges that we have to meet through innovative approaches and forward-looking policies. We not only have to achieve the right mix of traditional and modern S&T knowledge for the rural India, but we also have to fine-tune the technology policies and implementation methods to optimize our existing technology strengths as well as create new core strengths in critical and enabling technologies.

In the last few years India made history in space. The success of the indigenous moon mission, Mars mission, creating their own Desi GPS and now mission SHAKTI, ISRO creates history. India has successfully launched 29 satellites in a single mission. It is a sign that India is emerging as a major player in the multi-billion dollar space market.

Innovation & Science in India still has significant potential for further development. Although scientists from the subcontinent excel at international level, the huge potential offered by the country's young population is far from being fully leveraged. Yet, India has a long and proud tradition of scientific excellence. As economic development advances and a broader section of society benefits from high-quality education, science in India will be able to fully capitalize on this unique heritage. For any developing country, the future depends on its ability to innovate new solutions for old problems and for Indian perspective, only innovation can solve India's lots of problems.



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