SA NEEDS TO HAVE A BRAINSTORM

by Rasigan Maharaj

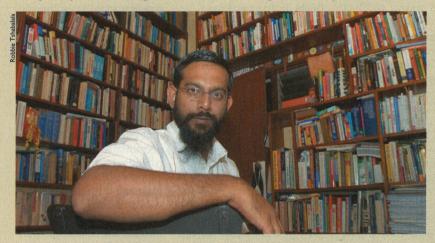
Better information is the key to higher levels of innovation in SA. Statistics, indicators and indices tell us that SA can be categorised as an emerging economy. But closer scrutiny reveals that standard indicators do not truly reflect the changes going on. Why? Because the data used is historical. Little data is available in real-time and virtually nothing exists from measuring potential or futures.

Because of this, rigorous research using different methodologies is required to assess the real innovation situation, to capture fresh hard data and yield qualitative insights.

in the system. Dialogue over evidence-based research is a key element in policy formulation.

The NSI, defined by the white paper on science & technology in 1996, was an innovative policy response to the challenge of research and development posed by the end of apartheid. It was a transitional strategy but we have moved beyond it. Dialogue and continuous brainstorming is required for further elaboration of the NSI.

The national R&D strategy of 2002 maintained consistency with the white paper and ensures that the NSI is recognised as a system of in-



Government needs to invest in capturing data about changes in the material conditions of people and institutions through the National Research Foundation. Researchers must operate using funding that is not linked to particular policy applications. This would help researchers, policy makers and others understand what was needed to bring about systematic improvements to the national system of innovation (NSI).

Clearly, to achieve such changes, there has to be fruitful and honest engagement with South Africans, rich and poor, who all have a stake Rasigan Maharaj Better information will lead to better innovation

teraction among large and small private and public firms, universities and government agencies aiming at the production of science and technology within national borders.

All of this may sound like jargon, but for it to be meaningful and generate real consequences it requires a participative dialogue. This discussion must be widened beyond government offices and agencies, to

include civil society and industry. This is apparent from the experience of other countries whose national systems of innovation are delivering improved well-being and competitiveness.

Government's 2005 Programme of Action (PoA) makes reference to the need to improve SA's system of innovation. There are several action points to achieve this:

☐ A recommitment to investing 1% of GDP in R&D by both public and private sectors by 2008.

☐ This will entail, among other things, strengthening the human resource development programmes of the National Research Foundation, the CSIR and the universities. ☐ It should also establish our region as a hub for astronomy and space

science and technology.

The PoA states that it will increase public-sector R&D investment and expand incentives available for the private sector to do the same.

With the target of 1% of SA GDP invested in R&D set for 2008, material questions for the country must be raised. Based on GDP estimates for 2007 we can calculate that in excess of R18,5bn will be spent on R&D. A key issue for policy research is therefore what such an NSI would look like, how it is qualitatively and quantitatively different from the present form and what would need to be done now to enable the system to function optimally.

SA has a range of domestic contextual variables regarding the future NSI. The transformation of the higher education institutions, the revitalisation of the further education system, the skills training agencies, the ongoing commercialisation of our research councils and restructuring of our industrial geography all require research attention. The efforts at integration on a continental scale, the extension of global value chains of production, finance and trade and the accelerated pace of scientific and technological change are other factors that need constant monitoring and evaluation.

☐ Maharaj is the chief director at the Institute for Economic Research on Innovation, Tshwane University of Technology