Patent awards for CSIR women inventors

Three women researchers from the CSIR who are pioneers in science, engineering and technology research and development have recently received recognition for their inventions.

Patricia-Ann Truter, Thabisa Mbungwana and Merryl Ford are among a group of 13 inventors from the CSIR who received the 2003/2004 awards under the Innovation Fund's new Patent Incentive Fund instrument, for patents granted to the CSIR during 2003. The Incentive Fund aims to increase the number of inventions by researchers at publicly funded research institutions, to encourage the researchers to file patent applications with the South African Patent Office, and to prosecute these to grant.

The three women were nominated for the awards for research, development and innovation in various fields that support national development goals with an aim to better the lives of people.

- Patricia-AnnTruter has been recognised for her invention in the **production of microcapsule beads**. The microcapsule is suspended in acid aqueous drinks to boost active and functional ingredients intake by the gastro-intestinal tract of consumers. She was recognised along with her male team members Thilo Lothar van der Merwe and Francois Sean Moolman.
- Thabisa Mbungwana worked with her male colleagues Kenny Charles, Jackie Crafford, Gerhard Smith and Bryan Taylor to patent the **home water treatment plan**t (popularly called **Amadrum**), whose focus is mainly rural homes, where potable water is not available. The treatment plant can treat 50 litres of dirty water in about 45 minutes and uses the conventional water treatment processes - flocculation, coagulation, sedimentation, filtration and disinfection.
- Merryl Ford's **video-on-demand system** can be used for any multimedia content such as video, music, games, educational content and software. The system is based on user preference and rating model and can predict which other multimedia content users are likely to want. The content, once downloaded into a system, is stored on the user's device and is available for access when the user wants to use it. The download and store algorithm eliminates the need for large bandwidth and therefore makes it easy to deliver bandwidth-intensive multimedia files over satellite. A potential use would be to cost-effectively provide educational material to schools. Ford worked with colleague Kobus Roux on the project that was developed in 1999.

The Patent Incentive Fund has a five-year goal to recognise inventors and will go a long way in encouraging innovation among science researchers.

The 2004/2005 awards, under the Patent Incentive Fund, are currently underway and will be completed later in the year. The official launch by the Innovation Fund of the Patent Incentive Fund will take place in October 2005, during which recipients of the awards will be recognised.

The Innovation Fund, an initiative of the Department of Science and Technology, is managed by the National Research Foundation.