KEY RESULTS 2004–05

LINKAGE INFRASTRUCTURE EQUIPMENT AND FACILITIES

New grants commencing in 2005	
Applications (no.)	159
Awards (no.)	78
Success rate	49.1%
Funding (Year 1)	$30 400 105
Funding (Total)	$30 400 105[1]

[1] LIEF funding is normally for one year only. Applications for multiple year funding may be considered in the case of subscriptions to major international facilities.

In the 2005 funding round:

- The success rate fell to 49.1 per cent, down from 51.4 per cent in 2004.
- The average grant size increased to $389 745, up from $375 880 in 2004.
- The ARC provided $30.4 million, 83.1 per cent of the total funds requested on successful grants ($36.6 million).
- Partner organisations made cash contributions totalling $24.9 million.

Of the 78 grants awarded, 73 were in national research priority areas. These grants represented 93.6 per cent of the total number of grants awarded and 91.8 per cent of the total funding allocated.

The new grants will support 160 incidences of international collaboration with researchers in 33 countries. The United States (with 38 incidences) and United Kingdom (with 28 incidences) topped the number of incidences recorded.

Terahertz radiation—or T-rays—are emissions between infrared and microwaves on the electromagnetic spectrum. They enable scientists to non-invasively analyse the composition of materials, as well as imaging them.

With the assistance of funding provided by the ARC, a National T-ray Facility has been set up at The University of Adelaide. The Facility will provide opportunities for researchers across Australia to experiment with T-rays in the detection of various substances, ranging from cancers to explosives, concealed weapons to food contaminants.

Work on T-rays at The University of Adelaide first began in 1997. With the assistance of an ARC Large Research Grant awarded in 2000, researchers developed Australia's first T-ray imaging program. In 2005, the ARC provided $864 000 through its LIEF scheme towards the development of a laser-based T-ray user facility.

Photograph: T-ray system (courtesy of the School of Electrical & Electronic Engineering, The University of Adelaide)