

ENGINEERING

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news bulletin



THE **Warren** CENTRE
FOR ADVANCED ENGINEERING

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THE 2001 INNOVATION LECTURE



The key role of innovation in positioning an award winning company as a global player is the theme of the 2001 Warren Centre Innovation Lecture by Peter Fogarty, Chief Executive Officer Of ERG Group. The lecture and cocktail reception will be on 5 April at The Regent Hotel Sydney at 6pm.

Peter will give insight into ERG's rise to global status through innovative mergers, acquisitions, strategic sales and alliances. The company is one of Australia's largest ICT businesses, specialising in automated fare collection equipment, software for the transit industry and smart card systems and services. Company turnover has increased from A\$600,000 per annum in 1986 to A\$416 million per annum in 2000.

"I am delighted to have been invited to give the 2001 Warren Centre Innovation Lecture. Innovation and the commercialisation of R&D are fundamental to Australia's future. The increasing awareness and use of information technology requires Australian companies to support innovation and organisations such as the Warren Centre," he said.

the warren centre

The Warren Centre plans to produce a retrospective of the major projects it has undertaken since its founding almost 20 years ago.

Of particular interest are examples of the application of the technologies and recommendations from past projects that are being applied in commercial enterprises and in government.

We are appealing for people who have been involved in any of The Warren Centre major

FROM LOCAL TO GLOBAL

Peter, who joined ERG Limited as Executive Chairman in 1985, has a background in taxation and commercial law. In 1987 he assumed responsibility for the overall management and strategy of the ERG Group which ranks in the Australian Stock Exchange Top 50 Index.

As ERG's Chief Executive Officer, Peter has been directly involved in the establishment of strategic alliances with leading ICT companies, including Banksys, Nokia Telecommunications, Motorola, Philips, Telstra, ANZ, Unisys Corporation, Visa, Deutsche Telekom, and the UK Post Office. Under his direction ERG has achieved a compound sales growth rate of over 40 per cent for the last 10 years.

He is a director of a number of companies in which ERG is a shareholder, is a member of the Advisory Board of The Graduate School of Management, The University of Western Australia, and was previously a member of the Federal Government's Information Industries Taskforce.

During 2000, ERG Group won many prestigious awards, including the Business Asia Award for the best use of Australian technology, excellence awards for the commercialisation of technology and the development of electronic commerce and Internet technology and the best Australia hi-tech achievement in Europe.

The Industry Research & Development Board, AusIndustry, PricewaterhouseCoopers, Baldwin Shelston Waters and Macquarie Bank are sponsors of this prestigious event.

For further information or to register, **contact Fiona Hearne tel (02) 9351 7205, fax (02) 9351 2012, email fionah@eng.usyd.edu.au**

DIARY DATES

7 March 2001:

Professor Carmen Hass-Klau, leading thinker from Europe with expertise in traffic calming and urban public transport alternatives will present a public lecture as part of The Warren Centre's transport project, "Sustainable Transport in Sustainable Cities".
Lecture Theatre 1, Peter Nichol Russell Theatre, Maze Crescent, Darlington Campus, Sydney University. 6pm

15 March 2001:

Mr Wendell Cox, International Public Policy Consultant, will present a public lecture as part of The Warren Centre's transport project, "Sustainability & Sydney. Separating Reality from Wishful Thinking".

Lecture Theatre 1, Peter Nichol Russell Theatre, Maze Crescent, Darlington Campus, Sydney University. 6pm

5 April 2001:

The 2001 Innovation Lecture by Peter Fogarty, Chief Executive Officer, ERG Group. ERG Group is a world leader in the ICT industry, specialising in automated fare collection equipment, software for the transit industry and smart card systems and services.
The Regent Hotel, Sydney.
Lecture and cocktail reception 6pm.

For information on these events and to register
Contact: Fiona Hearne
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PROJECTS IN PRACTICE

projects or activities to contact us with information about these applications so we can include them in that publication.

If you have examples, please contact John Brooks by phone on (02) 9518 8730, fax (02) 9518 8314 email jnbrooks@hutch.com.au. or through The Warren Centre.

people behind successful technology innovation

A ROCKY RISE: FROM CONCEPT TO REALITY



Take the will to prove a technology concept, the tenacity to overcome funding barriers and draw heavily on innovation. Dr Clive Summerfield was determined to propel his company, Syrinx, from a zero funded start-up position 11 years ago to a viable, dynamic and highly valued technology business.

Today Syrinx employs 85 professional staff and is growing rapidly as it deploys speech recognition into a wide range of services. The company is one of only half a dozen speech recognition vendors worldwide and has developed several advanced technologies, including the world's first commercial continuous speech recognition system, deployed by the WA TAB, the call centres for AT&T in the USA, and the Commonwealth Bank's stockbroking operation.

But reaching this pinnacle of success wasn't easy.

"After returning from the UK with a PhD and finding no R&D projects that appealed, I wanted to prove that you could start a successful high technology business in Australia," Clive said.

"Soon after I started it became crystal clear why it is so hard – the culture was wrong. Risk aversion, a thin R&D base, little or no suitable funding, the wrong tax system, no local technology stock market, strong international competition, and the view that if it is invented in Australia it must definitely be second rate!

"There was also the lack of acceptance of speech recognition as a real technology. I believe that speech recognition is a core technology that fundamentally changes the way information systems are used and perceived.

"I also believe that as one of the leading users of information technology, Australia should

take an active part in the development of the technology. Getting sufficient cash in the early stages was very challenging, especially in Australia and especially during the recession in the early 1990s. By mid 1995 when we were, again, on the verge of running out of funding, our efforts to secure finance paid off and the Australian Technology Group invested \$1.5 million. But there was a condition. I had to install a new CEO.

"Unfortunately, just as competition was emerging in the USA we made a poor decision. This meant Syrinx was in a competitive position without an appropriate management team and, what's more, was rapidly running out of the cash needed to set one up.

"A rough ride was ahead with further management problems with our US partner and reseller getting into financial difficulty, resulting in a protracted legal battle. Then we entered commercially dangerous waters by signing a business agreement on the basis that our R&D would be completed in time to deliver a voice activated stock quoting and trading system. The next six months were a period of high anxiety as our first few cuts of the technology did not perform as well as expected.

"So we took a gamble and implemented a radically different data capture approach and it worked!

"Syrinx now has new management, a high powered Board, and market proven world competitive technology. It is on the brink of enormous growth and expansion.

"Today the challenge is to translate great technology into great business and grow Syrinx from an Australian into an international technology business."

Support for fledgling

BIOMATERIALS INDUSTRY

The spark was ignited by Professor Klaus Schindhelm of the Graduate School of Biomedical Engineering at the University of NSW when he spoke to the Major Projects Committee in early 2000. The next step was a small meeting of interested people, followed on 27 November 2000 by a roundtable discussion with 22 industry experts with State and Federal Government representatives in attendance. Their aim was to identify the impediments and solutions to creating a strong local biomaterials industry.

Roundtable consensus was that Australia has the potential to be a leader in biomaterials — defined as any substance replacing or interfacing with human tissue — due to a wealth of intellectual capital in medical research allied with a healthy product development culture. There are, however, barriers to overcome before that potential can be realised.

One is the nature of the local industry which lacks a formal network to connect the constituent parts. Communication is poor between companies generating biomaterials, those building medical devices, and those importing and distributing biomaterials. The result is an industry unable to answer such key questions as:

- Where are biomaterial devices used?
- Who are the customers?
- What are the trends and needs in the marketplace?
- What are Australia's strengths in development?
- Who are the leading clinicians giving impetus to the industry?

At the roundtable, ideas mooted to improve links between the different industry sectors included development of an Australian website on biomaterials and medical devices and possible additions to existing local or USA sites. Either web option would demand a global focus in design of the database to increase its utility. Some participants saw merit in establishing a new industry association with a vertical grouping, as opposed to the more usual horizontal grouping, as a means of improving communication.

The final theme to emerge from the roundtable was marketing — how best to gain international exposure for Australian biomaterials and medical devices. Several interesting proposals were put forward, including creation of an Australian biomaterials brand.

So where to from here? Three groups established at the conclusion of the roundtable are now progressing ideas from the forum and will report back to Project Champion Dr Derrick Beech. Anyone interested in being part of the project can contact Derrick Beech on 02 6299 7570 or beben@interact.net.au

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