The University's new medical and surgical training facility is the best and most sophisticated medical skills laboratory in the world.

Dr Ron Swann, Executive Officer of ctec, the Centre for Medical and Surgical Skills, is not being partisan or parochial when he pronounces this: it just happens to be so.

And early proof of the new centre's stature was confirmed when the Queen agreed to officially open the facility during her visit to WA early this month.

Originally known as the Collaborative Training and Education Centre (hence ctec), it was the vision of mining entrepreneur, philanthropist and resident of Perth, Danny Hill.

He had set up a similar skills training facility in London in 1995 after a protracted illness in 1990, during which time he met English neurosurgeon Alan Crockard and together they developed Mr Hill's ideas.

In 1996, Danny Hill returned to live in Perth and the following year approached UWA with the idea of setting up another centre to service the southern hemisphere.

With the direct support of the Royal College of Surgeons in England, multi-million dollar funding arranged by Mr Hill,
But what change are we actually talking about in higher education? And what precise changes will bring benefit — rather than damage — to our own University of Western Australia?

At a broad level, Australian universities have undergone a positively revolutionary era of change already over the last decade — notably since the Dawkins White Paper and the Higher Education Act of 1989.

With amalgamations, and college ‘redesigns’, we have jumped from 19 to 38 universities. Overall enrolments have at least doubled (some 230,000 funded ‘places’ to over 600,000). More than half the students are mature age. Lifelong learning is now a feature of the ‘system’. A major research culture has evolved. Postgraduate enrolments have boomed. New disciplines, notably in IT and biomedical areas, have blossomed. Major alliances with industry have evolved, and reliance on Commonwealth funding has declined. An extraordinary international outreach has led to education being Australia’s fourth largest export. Industrial relations and management systems have meant more effective and more competitive institutions. And so on . . .

So, why the continuing and urgent calls for more and more change?

Some of those calls are ill based and draw from misconceptions of what is and has been happening in the world of higher education. Much of the public and private sector, from which vocal critics of the universities emerge, has itself undertaken less change and is still less responsive to globalising trends. It is notable how much of business and public policy has yet to catch up with the ‘new economy’ of the world in which universities are already active participants through new knowledge generation.

But we still come back to the harsh reality that these are hard times for universities. Above all, we all have major resource problems as Commonwealth funding has simply not kept pace with changing demands in our operating costs. For the high quality, research intensive universities — such as UWA — there is a widening ‘gap’ between costs and needs, between universities and resources. “Bridging the gap” is absolutely vital.

W hat to do? Some universities have hitched their hopes to a single strategy — a huge increase in overseas students, developing a massive private agency, building global campuses, sharply narrowing their generic educational programs in favour of vocational training, becoming “virtual providers” of distance education . . .

At UWA we have decided to work from our strengths — the high quality of our educational and research capacity. And then, to be bold in strategically growing these key areas of academic excellence and function.

That is the basis of our detailed operational plan: Achieving International Excellence. It has carefully set out an ambitious but, I believe, achievable set of goals, which defines our sense of necessary change and development.

Because it is an approach which tries for an intelligent and well-based plan of evolutionary transformation at UWA, which rejects the cult of the single options approach, it does not mean we can avoid any sense of discomforting change. All change involves discomfort, even if it also means the positive notion of opportunity and challenge. As another of those popular idioms goes — we cannot always live in our comfort zones, no matter how comfortable in the world of Crawley!

As I work with you in many areas and levels of our University, I do sense unease over change, even if I also meet positive calls for change to meet the future challenges. Above all, many of you worry as to how you can do new things when you are already so hard pressed.

W e cannot just add and add to our duties. But we can learn “to work smarter” (as they say): do we need all the proliferation of all the units we teach (almost as many as universities double our size)? All the Committees? All the inter-group rivalries over space and resources?

W e can, and must, focus our endeavours to provide time to take up the key new directions in knowledge, teaching technologies, and resource raising. W e have a carefully designed agenda for such developments, and each of us has a responsibility and opportunity to contribute to the current process of change.

W e wish to change so as to ensure the viability of the things about which we care most: our sense of values, autonomy, quality and commitment to teaching, research and role in the wider world community.

“Boldness be my friend” was the motto of a famous parachute regiment. But they also packed their parachutes most carefully! W e need to change as fast as the world itself, but to do so through a comprehensive agenda of our own making.

Deryck M. Schreuder
Vice-Chancellor and President
vc@acs.uwa.edu.au
The last hot day of summer gave a very Australian flavour to the Royal visit.

University staff in academic gowns were ushering invited guests to their seats more than an hour before the Queen was due to arrive, but shelter from the sun, rather than the best vantage point, was what the early birds sought.

Chairs closest to the spot where the Royal Rolls would stop, offering perhaps the best view of Her Majesty, were rejected in favour of more comfortable seats under the huge sail providing shade over the forecourt of the new building.

Hats made a comeback, as they always do for Royal tours, but there wasn't a glove in sight until the Queen stepped out of the Vice Regal Rolls Royce sporting a light green patterned dress, green hat and white gloves.

Staff and students from the School of Music entertained the invited guests while they waited and students with big Prosh banners welcoming "King Richard III" (could this be a reference to the Premier, Richard Court?) amused several hundred onlookers safely behind police-patrolled barriers.

A modest white car with a police escort April-fooled the crowd, some of whom waved and cheered, only to find a less famous man emerging from it and striding away.

Students gave Her Majesty an "Aussie Aussie Aussie, Oy Oy Oy!" chant when her car drove past the Guild. The Aboriginal flag, which had been flying at the Centre for Aboriginal Programmes, just the day before, was missing on Saturday morning.

The Queen's walk down the red carpet which transformed the carpark, her meeting of the Chancellor, the Vice-Chancellor, the Minister for Health, ctec benefactor Danny Hill, and others went smoothly and some of the shortest speeches ever heard on campus followed.

After she had drawn the curtain to reveal the commemorative plaque, Her Majesty went inside the building for a tour, but did not visit the Hill International Medical and Surgical Workshop. Apparently she, like other members of the Royal family, favours homeopathy over orthodox medicine and doesn't enjoy anything the least bit gory or suggestive of invasive procedures.

Her Majesty did however put her hand on "the best video game in the world" in ctec's virtual reality room. The computerised teaching system, which is being evolved in collaboration with the CSIRO, gives realistic "pressure feedback" to trainee surgeons.

"Oh I can feel it," she said, delighting the scientists who are developing the world-leading system.

Outside, the guests were practising the Aussie wave, fanning themselves with their programs, while the music staff and students played on bravely.

MC Peter Leunig, Office of Development manager, commented, as they began to play Vivaldi's Autumn, from his Four Seasons suite, that perhaps they should be playing Summer.

Policewomen chose a dozen small children from the public crowd to meet the Queen and present her with flowers. They waited, some not so patiently, on the hot bitumen, with one little barefooted girl sensibly hopping on the lighter-coloured footpath.

As the Queen emerged from the building to polite cheers (and some muffled shouts from underneath the Prosh banners) and accepted the children's flowers, a Royal-following photographer said: "You know, it's not bad. You can get closer to the Queen than you can to Madonna!"
and the partnership of UWA, the Royal Australasian College of Surgeons, the Health Department of WA and the Centre for Anaesthetic Skills and Medical Simulation (CASMS), ctec was a collaboration of unprecedented proportions in Australia.

Early planning by the then Head of Anatomy and Human Biology, Associate Professor Neville Bruce, and the then Honorary Director (now Medical Director) of ctec, Dr Richard Vaughan, was encouraged by Mr Hill, Professor Alan Robson, Martin Griffith (now Chairman of the Board) and Dr Brent Donovan (Director of CASMS).

Three years of planning have resulted in a unique $17.5 million training facility for both undergraduate and postgraduate surgeons, anaesthetists, medical doctors, nurses and dentists.

The Hill International Medical and Surgical Workshop has ten fully operational operating rooms in one big laboratory complete with simulated torsos, limbs and joints on which surgeons can practise their skills without putting patients at risk.

Incredible as it may seem to those outside the medical and surgical profession, surgical training until the advent of skills training facilities like ctec consisted of “watch one (operation or procedure), assist with one, do one”.

German philanthropist Sybil Storz, who owns one of the world’s biggest endoscopic companies, has donated two million dollars worth of equipment to the Hill Workshop.

Workshop technical manager Peter McIntosh, who has worked with both the Storz company and the Royal College of Surgeons in London, said that Mrs Storz was, like Danny Hill, dedicated to the training of surgeons.

It is expected that more than 2000 surgeons will attend surgical skills courses at the Hill Workshop over the next year.

Dr Swann said that the centre’s telemedicine facility had already run surgical courses linking operations at QEI and St John of God Hospital with medical schools in Ballarat, Hong Kong, Singapore and London.

―The idea of telemedicine is that surgeons can watch an operation taking place and follow the exact procedures at the same time, on a cadaver,‖ explained Dr Swann.

Master classes will be run from the Hill Workshop, with international video and computer links, by, among others, Alan Crockard, the neurosurgeon who first listened to the ailing Danny Hill’s vision for training surgeons.

Upstairs from the Hill Workshop is the Centre for Anaesthesia Skills and Medical Simulation (CASMS), previously located at RPH.

Operating rooms, emergency wards and intensive care units are all video-
linked and connected to a courtyard where medical emergencies can be simulated. A car was recently lifted by crane into the first floor courtyard for simulation of road accident emergencies.

A Simulated Anaesthesia Mannequin (SAM) in the operating room can be manipulated by computers in an adjoining room to simulate reactions to surgical and anaesthetic procedures.

"But you can only go so far with plastic," said Dr Swann, "and that's where the virtual reality room comes in. We are developing with the CSIRO a fantastic new groundbreaking system of teaching, which uses virtual reality and 'pressure feedback.'

"Three-dimensional images are combined with a sense of touch. Surgeons sit at the Haptic workbench wearing 3D glasses. They take hold of an instrument at the end of a robotic arm and miniature motors control the way the arm responds to movement of the tool.

"This creates resistance, giving the user the sensation that s/he is really touching, slicing, injecting, depending on the procedure being followed," Dr Swann said.

The virtual reality technology is being developed by CSIRO and hi-tech Swedish company ReachIn Technologies.

So far, ctec has only a hand simulator, but elbows and necks will follow, and a simulator for practising gall bladder removal using keyhole surgery will be available within 18 months.

"We can't get the surgeons off it," laughed Ron Swann. "It's the best video game in the world!"

Completing ctec is a laboratory devoted to spinal cord regeneration and UWA's highly acclaimed neuroscience group is bringing world expert Dr Giles Plant back from the Miami Project to run the laboratory, which is not yet ready for operation.

Honouring leaders in their fields

The University's consulting architect, Gus Ferguson, was among four recipients of honorary doctorates at the recent graduation ceremonies.

Mr Ferguson delivered the occasional address at the Engineering and Mathematical Sciences graduation and was made an Honorary Doctor of Architecture.

Honorary Research Fellow Professor George Seddon, from the Department of English, was awarded an honorary Doctor of Letters at the Economics and Commerce, and Law graduation ceremony.

An honorary Doctorate of Science was conferred on the speaker at the Science ceremony, Professor Athelstan Beckwith.

Rabbi Dr Shalom Coleman addressed the final ceremony and was awarded the honorary degree of Doctor of Laws.

Do you enjoy swimming? Want to improve your fitness and style? Then join the UWA Swimming Club

We train Tuesday and Thursday mornings (7.15 to 8.30am) at the Human Movement Pool, right here on campus. All abilities are catered for.

Cost*: $70/year, or $45/semester ($60/year if you bring this ad.) Includes pool entry and coaching fees.

For more information contact Sarita Bennett (9380 7353)

*Prerequisite: Sports Card.
Women dominate oil and gas field – at least in Winthrop Hall!

Just three graduates received their Master of Oil and Gas Engineering this graduation season — and all of them were women.

Philippa Viney, Rachel Lunt and Renita Rehbock all agree that it is very rare for women to choose their field of speciality.

And there are still very few women enrolled in the Oil and Gas Engineering master’s degree course (fewer than 20 per cent), despite the positive example of Professor Beverley Ronalds, Director of UWA’s Centre for Oil and Gas Engineering.

So for women to dominate the stage is something for the centre to be proud of.

Ms Viney is an even rarer species of oil and gas engineer: she is a drilling engineer and spends a lot of time offshore, which is why it took her five years of part-time study to complete her master’s degree.

She is the only professional woman working offshore for Woodside Energy.

But across town at JP Kenny, which employs Rachel Lunt, there are three female engineers and the company has a progressive outlook on employment.

“It’s wonderful having three women graduates together from the master’s course,” Professor Ronalds said, but added that it would be even better when it became so commonplace that it wouldn’t seem a remarkable accomplishment.

But remarkable accomplishments were certainly celebrated during the autumn graduation season as more than 2000 students graduated with both undergraduate and postgraduate degrees.

Ransom name recorded again

More than 60 years after her own graduation, Dorothy Ransom was back in Winthrop Hall to witness yet another graduation ceremony for her son David.

Mrs Ransom, a former long-serving UWA Senator and outspoken supporter of the University, was awarded her Bachelor of Science in 1938. Forty years later, she saw David graduate with an MBBS and now, a further 22 years on, Dr Ransom has achieved the prestigious degree, Doctor of Medicine.

A medical oncologist, Dr Ransom began his research ten years ago into tumour suppressor genes, while he was working at the Mayo Clinic in the US. He now divides his time between RPH and St John’s oncology department.

Few medical practitioners pursue a Doctorate in Medicine. The only other graduate this year is Associate Professor Ming-Hao Zheng, Director of Research at QEII in Orthopaedic Surgery.
**Children send their mother back to school**

The family who studies together ... fights over the family computer!

“But luckily, I’m an early morning person and my children are all night owls,” said Lois Hall, who graduated in the same week as one of her sons.

“The only problem was when Mum would get up early to work and I’d still be at the computer, having been there all night,” said her son Kane Arundale, who received his Bachelor of Science, with a double major in pharmacology and physiology.

His mother graduated with first class honours in Anthropology after a double major in politics and anthropology.

Her eldest daughter, Melanie, has two degrees from UWA, a BA in politics and a Bachelor of Psychology. She now works at the University, in the Admissions Centre.

Another sibling is studying information technology and marketing at Curtin University.

“We had to keep out of each other’s way while we were all studying,” Mrs Hall said. “I decided to go back to school and then on to University because I felt my kids were leaving me behind. We’d got to the stage where they all knew more than me, but I don’t regret for a minute having spent all those years at home not working or studying, but being the best mother I knew how.

“And I would do it again. Full-time mothering is highly underrated.”

Mrs Hall is now planning to go one step further than her children and is considering starting a PhD in August.

Brendon Ward had always loved the ocean but a career in marine science was far from his mind when he left school at the age of 15.

Now, after travelling Australia and the world with his wife Jane, working in various jobs and going back to school to complete his TEE, Mr Ward has graduated with a Bachelor of Science in Marine Science.

He is UWA’s first Marine Science graduate. A few others who started the course at the same time, three years ago, have gone on to do honours, but, despite being offered honours by three faculties, Mr Ward decided to graduate and join the work force.

He is now part of the Department of Environmental Protection’s catchment management group — and is loving it.

“Of the three streams in marine science, marine biology is probably the most popular and coastal management makes you most employable. But I chose coastal and marine geoscience, which is a mix of geology and oceanography,” Mr Ward said.

“The geology side fascinated me and I felt that this stream gave me the necessary depth of understanding while I can always pick up the management side of the industry while I’m working in it.”

He paid tribute to Mrs Ward, who has put her PhD in clinical psychology on hold while her husband completed his degree.

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**First marine scientist for UWA**

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**Monday 17 April**

**SCIENCE FILM SHOW**
"Influenza". Influenza comes in many disguises because its virus mutates constantly as the disease circles the globe. This documentary traces efforts around the world to contain outbreaks and warns that, unlike the common cold, influenza can be deadly. 1.05pm, Geography Lecture Theatre 1.

**BOTANY SEMINAR**
"The unique oceanic environment off Western Australia", Associate Professor Charitha Pattiaratchi, Centre for Water Research. 4pm, Seminar Room (Room 2.14, Second Floor), Department of Botany.

**LIMINA LAUNCH**
Limina is a refereed journal of historical and cultural studies published by an editorial collective based in the Department of History. Volume Six will be launched by Diana W arnock, MLA. The inaugural Ian Brash Prize will be awarded and copies of the journal will be on sale for $12. Drinks and nibbles will be served. 5.30pm, University House.

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**Tuesday 18 April**

**LAWRENCE WILSON ART GALLERY**
"Fame and fashion: Holly W ood on Glossy", Holly W ood, radio personality and social columnist for The Sunday Times will talk about fame, fortune and fashion in Glossy, an exhibition of celebrity photographs from magazines being shown at the gallery. 1pm, Lawrence Wilson Art Gallery.

**SOIL SCIENCE AND PLANT NUTRITION SEMINAR**
"The significance of soil microporosity", Professor Jim Quirk. 4pm, Agriculture Lecture Theatre.

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**Wednesday 19 April**

**ENVIRONMENTAL DYNAMICS (ED) SEMINAR**
"Renewables in Australia: a growth market domestically and internationally", Gordon Thompson, Managing Director, International Centre for Application of Solar Energy. 4pm, Blakers Lecture Theatre.

**RICHARD WAGNER SOCIETY OF WA (INC.)**
A Patrice Chereau production of Rhinegold. Members: no charge; Visitors: $10/$8. 7.30pm, Room G5, School of Music.

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**Thursday 20 April**

**FREE LUNCHTIME CONCERT**
Roger Smalley and Anna Sleptsova present a dynamic program of music inspired by Mozart, by Busoni and Reger. 1.10pm, O ctagon Theatre.

**ZOLOGY SEMINAR**
"Go and no-go signalling during optic nerve regeneration", Associate Professor Sarah Dunlop. 4pm, Jennifer Arnold Lecture Theatre.

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**Thursday 27 April**

**WESTERN AUSTRALIAN CENTRE FOR MICROSCOPY/MICROSCOPY AND MICROANALYSIS SEMINAR**
"The reasons for using High Resolution SEM at low beam voltage", Professor James Pawley, Zoology, University of Wisconsin. (This seminar is of special interest to those using or considering using the field emission SEM in the centre.) 1pm, Geography Lecture Theatre 11, Geography Building.

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**Friday 28 April**

**CONFOCAL MICROSCOPY WORKSHOP**
Professor James Pawley, from Zoology at the University of Wisconsin will be conducting a confocal microscopy workshop in conjunction with confocal users in W estern Australia. All are welcome to attend the confocal workshop but should pre-register with John Murphy on extension 2766 or email jmurphy@cyllene.uwa.edu.au. 9am to 5.30pm, Geography Lecture Theatre 11, Geography Building.

**ZOLOGY SEMINAR**
"Incorporating predation risk into the ideal free distribution", Professor Larry Dill and Simon Fraser, Canada. The ideal free distribution is a theoretical model predicting frequency-dependent habitat choice by foraging animals. Early versions did not consider the possibility that predation risk could also vary among habitats; when this factor is included, predicted habitat choice decisions depend on whether the predator distribution is fixed, or responds to that of the prey. Testing and application of the model will be illustrated in several systems, including tiger sharks vs. bottlenose dolphins at Monkey Mia. 1pm, Jennifer Arnold Lecture Theatre.

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**KEYED UP!**
Solo Piano Recital Series presents Frank W ibaut, Director of the National Academy of Music. Works by Beethoven, Bartok and Brahms. Tickets: $22.50 and $17.50, available on 9386 4767. 8pm, O ctagon Theatre.

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**SPE update launched online**

The 2000 update of the Scholarships, Prizes and Endowments (SPE) volume has been launched online and can be accessed at the following web site:
http://www.publishing.uwa.edu.au/spe/

The online copy, in PDF, allows hard copies to be easily printed out if required. An alphabetical index at the back of the book provides direct ‘clickable’ links to individual scholarships, prizes and endowments.

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**Not so hirsute pursuit**

There’s a lot less hair on campus now. Executive Dean of the Faculty of Science, Greg Waddell and Associate Dean (Student Services) Greg Acciaioli (Anatomy and Cell Biology) led an intrepid band of students to raise money for men’s health. The event will go on for a few more years and all the events/exhibitions are open to all and made possible by generous donors.

Media enquiries to Peter Kirk, Public Relations Officer. Unless a restricted area is indicated all the events/exhibitions are open to all and made possible by generous donors.
ADVANCE NOTICE

Monday 1 May

SCIENCE FILM SHOW
"Can the Olympics be drug free?" In this timely program, the issue of drugs in sport will be explored. 1.05pm, Geography Lecture Theatre 1.

HISTORY SEMINAR
"Beaches of the mind: writing rather than 'doing' history", Professor Greg Dening, A.N.U. 4.30pm, Postgraduate Lounge, Hackett Hall.

CHAMBER MUSIC CONCERT
The Blackwood River Chamber Festival in association with the School of Music presents guest artists from this year's festival. Performers include Jane Edwards, Michael Leighton Jones, Anna Sleptsova, Barbara Jane Gilby and the Tank Stream String Quartet. Tickets are $22.50 and $17.50. Enquiries to 9761 2772 or fax 9761 4151. 8pm, Callaway Music Auditorium.

Tuesday 2 May

INFORMATION MANAGEMENT AND MARKETING SEMINAR
"Internet issues today", Kimberly Heitman, Electronic Frontiers Australia and Julia Bishop. 6.30pm, Economics Conference Room.

Wednesday 10 May

PERTH MEDIEVAL AND RENAISSANCE GROUP QUIZ NIGHT
University House at 7.30pm, $6 per person, tables of six at $30. Bookings to Dr Emma Hawkes, History, or call Charles Acland at Kingswood College on 9423 9428.

BERLIN WALL A COMPETITION WINNER

Late last year Dr Alexandra Ludewig of German Studies in the Department of European Languages and Studies organised a poster competition for Year 7 to 11 students of German in Western Australia.

The topic was simply “Made in Germany”.

The response from school students was overwhelming and, as a result, German Studies decided to award a $20 book voucher to the best three entries from each year.

More than 200 people attended the vernissage, enjoyed drinks and nibbles and witnessed the judges at work.

The judging panel comprised politicians, diplomats and business people, Julie Bishop (Curtin MP), Bill Hassell (Honorary Consul of the Federal Republic of Germany), Werner Brandt (Vice-Consul of the FRG), Andreas Walewski (President of the West Australian German Business Association) and Dr Annette Harres (lecturer at UWA and Committee member of the Goethe Society) were on the panel.

The overall winners were five students from Kelmscott Senior High, who had entered with a huge piece of the Berlin Wall giving way in the middle and thus opening up new possibilities for German industry and technology especially in Eastern Europe.

Students from Kelmscott Senior High proudly show off their winning entry.
The enthusiasm for UWA’s Albany Centre in the rural city is tangible.

The local council, industries and individuals have provided or have on offer library space, scholarships, funding and support of every kind.

Albany is so keen on its new links with the University that its people are almost falling over themselves to help out.

“It’s humbling,” says Albany Centre director Dr Billie Giles-Corti.

“When we started, just over a year ago, I felt uncomfortable asking people for help. Then I realised that everybody is so excited about being involved.”

The dynamic Albany Centre has 15 first-year units on offer this semester to its 41 undergraduate students. The units are from the Faculties of Arts, Economics and Commerce, Science and Engineering and Mathematical Sciences.

Of the 53 students (compared with 33 last year), 23 are HECS undergraduate students (seven last year), six of them full-time and the remainder studying between one and three units.

There are 14 continuing education students, two of whom are studying full-time, 16 Master of Education students and one Master of Arts student.

Undergraduates include four school leavers.

“The challenge is to attract full-time students and school leavers,” Dr Giles-Corti said.

“We are developing a five-year plan and we hope to have 200 students (not all of them full-time) enrolled at the end of that period.”

The challenges of running a rural University centre have changed over the past 12 months. First, problems with technology and delivery of lectures was the biggest headache, coupled with marketing the centre and attracting students.

Although it’s still not 100 per cent smooth, the technology for delivering education is state-of-the-art and is keeping the staff at the Faculty of Arts Multimedia Centre and DUIT on their toes.

Dr Giles-Corti explained the latest innovation: “Thanks to the hard work and tenacity of Terry Coe from the Audio Visual Unit and Mike Neville and Mike Fardon from the Multimedia Centre, the upgrade of the lecture theatres on Nedlands campus is now complete.

“This upgrade enables most of the lectures required for the Albany educational program to be centrally digitised and placed on the web.

“Lecturers can easily deliver computer-aided lectures and have access to a ‘visualiser’. The visualiser will be used for subjects in which lecturers traditionally write on the blackboard or on an overhead.

“The hand-written text will be projected overhead for Perth students while, for students in Albany, the handwriting will be videotaped (five frames per second), digitised and placed on the web.

“This is ground-breaking use of technology and I sincerely thank Mike Fardon (Multimedia Centre) and Dr Doug Pitney (Mathematics and Statistics), both of whom were trialing the technology during the summer break.”

During the first five years of the Albany Centre, the aim is to provide the widest possible range of first-year subjects, followed by second-year subjects and to attract school leavers to enrol for their first year or two “at home”.

“The locals are very keen on postgraduate research studies being done here because they’re desperate for region-based research,” Dr Giles-Corti said.

But that is not the priority for 2000.

For now, the centre is extremely fortunate that Alan Dodds made the move from Perth (Multimedia Centre) to Albany with his family before the centre opened and is the cornerstone of the technological development.

Deputy Vice-Chancellor Professor Alan Robson, who visited Albany recently for a planning meeting and presentation of scholarships, said nothing could replace the campus experience for university students.

He is keen for Albany students to start their tertiary education at home, then move up to Perth for the final year or two of a degree.

Later, there is the possibility that this might even be reversed, with Perth students beginning a course in, say forest science, then completing it in Albany with the relevant field work done virtually on site.
Julia Hunt, winner of a City of Albany scholarship, is one of four school leavers to start her tertiary education without leaving home.

"Most of my other friends have gone up to Perth to university but I’m really happy to be able to stay at home with my family. I understand that about half the students from the country who go up to Perth to university drop out before the end of the first year — it’s just too much to cope with, without family support," she said.

Julia and fellow Albany Senior High School student Andrew McMillan are enjoying what almost amounts to private tutoring. Julia has enrolled in the first year of a science degree, studying psychology, human biology, anthropology and geography.

Laboratory sessions are held at AgricultureWA or the new and well-equipped Great Southern Grammar School.

Another student, Ellie O’Shea, who is studying second-year English and first-year information technology and psychology, said that the small groups of students created a nurturing atmosphere.

Ellie is a nurse who is studying to become a psychologist. "It’s great to be able to stay at home with my family and friends, at least for a year or two," she said.

Deputy Vice-Chancellor Professor Alan Robson recently presented eight Albany students with scholarships for study at the centre.

Albany’s mayor Allison Goode is keen to “keep the kids at home” by encouraging them to do their first year of university in Albany.

But, as a mature-age university student herself, she agrees that nothing compares with the experience of campus life.

“I would dearly love to see the UWA Albany Centre offering full degree courses in time. But unless the centre becomes a full campus, I would encourage students to go up to Perth after their first year," said Ms Goode, a member of the UWA Albany Centre’s steering committee.

Albany City Council has been most supportive of the centre, which is currently housed in the original Governor’s summer residence, at the back of a park, right next door to the council offices and library.

The next big step is for the municipal library and the University library to join forces.

The University library has despatched 299 kg of books to the City of Albany library and these are being integrated into the collection. The city has provided 25 square metres of space to house these books and provide space for students.

With a one-off capital works injection of $770,000 from DETYA, the city may extend its library to cater for the University. No firm decision has been made yet.

Andrew Hammond, Albany City’s CEO, said there was a groundswell of support in Albany for the city to become a “campus town”.

“It fits in well with our strategy of access for all to all services,” Mr Hammond said. But the City of Albany is aware that the University has no plans at this stage to establish a full campus.

Julia Hunt, Louise Williams and Deborah Bell all won City of Albany scholarships, worth $1000 each (for HECS students). UWA presented five scholarships: a Millennial Award to the highest ranking students enrolling at UWA Albany Centre in 2000 (Louise Williams) and four scholarships for continuing education students enrolling through UWA Extension’s Access program: Shenoa Elvin-Johnson, Susan Hart, Barry Critchison and Dennis Coombe.

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Albany students Julia Hunt (left) Christine McClure and Ellie O’Shea (front) appreciate what they identify as the nurturing quality of the Albany Centre.
Steve Birkbeck calls himself the “human face” of the Albany University Foundation.

“I’ll be up front. I have three primary school-aged girls and I would love to see them able to start university educations without leaving home,” said the founder and CEO of Mt Romance, a manufacturer of sandalwood oil products.

Although a prominent businessman in the Albany region, Mr Birkbeck had always shied away from joining local committees.

“I felt they always divided the community. But when I was approached to be part of the University Foundation, I knew that the establishment of the University here was a core issue that would unite the community, not divide them,” he said.

Mt Romance has a $2.5 million annual turnover with a staff of 35 and a huge growth potential. Its business partners include UniSuper, BHP and Macquarie Bank. The possibility of local industry-driven and funded research happening at the UWA Albany Centre has excited not just Mr Birkbeck but many people involved with primary and secondary industry in the Great Southern region.

“At first I was pushing hard for postgraduate research, until Billie (Giles-Corti) brought me back down to earth and helped me realise that undergraduate courses were the first priority for the centre, then we will focus on research,” Mr Birkbeck said.

“I still see local postgraduate research as providing the ultimate benefit to the community, but I have taken the opposite direction to start with: I’ve gone back down the track to primary school!”

“Mt Romance, through the Foundation, is offering science prizes to Year 7 and Year 10 students at local Albany schools. For top students in Year 12, we are offering scholarships to study at the UWA Albany Centre, with some special incentives for Aboriginal students.

“The Foundation hopes to help supply the bridge between school and university. We are also looking at offering scholarships for UWA Albany students who do well in their first year here, to help them make the move to Perth to complete their courses. The retention rate in second year will be the test,” he said.

The community gets its pay-back when the University introduces its postgraduate program, with community- and industry-driven research.”

That program is scheduled to start at the Albany Centre within 12 months. It is clear to Dr Giles-Corti and to everybody involved with the University that the Great Southern region offers many research opportunities.

“Postgraduate research will definitely be regionally based and supported and will probably start in the area of natural resource management,” Dr Giles-Corti said.

Natural resource management (NRM) is a major focus for industry and development in the Albany region and an NRM Centre for Excellence is planned by the Southern Province Regional Development Organisation in collaboration with UWA and other local NRM agencies.

At present, the Albany University Foundation raises corporate sponsorship and lobbies politicians for their support in developing the centre. The next step will possibly be the appointment, by the Foundation, of an executive officer specifically to raise funds for the Foundation’s activities including funding for postgraduate research and scholarships.
Albany delivery benefits Perth students

Beverley McNamara, a lecturer in anthropology, is as much a pioneer of the Albany Centre as Billie Giles-Corti.

Her Anthropology 101 and 102 lectures were among the first to be recorded for Albany students last year and the units have a strong enrolment again this year.

Dr McNamara said that servicing the Albany Centre meant that great steps forward in flexible delivery were happening on the Perth campus.

“We have made wonderful changes to the available technology in lecture theatres to enable flexible delivery. I lecture in the big Social Sciences lecture theatre and it has just been fitted out with a touch screen,” she said.

When your lecture is being recorded for remote students, it’s no good using an overhead projector or a blackboard to illustrate your points. Dr McNamara and others delivering to Albany have rethought their lecturing methods, now making use of PowerPoint and other computer-based visual aids and ensuring they make vocal references during lectures to slide changes.

“The lectures are taped, then digitised and put on the Internet, so the Albany students can access them either from home or at the centre whenever it suits them. They can listen to me speaking and look at the same visual material that the students in Perth are looking at as I speak.

“Of the great advantages of the system is that Perth students can also access the lectures, although I don’t advise this as their primary contact. But it’s very good if a student misses a lecture through sickness or working or simply wants to hear it again.”

Albany’s anthropology students have five video-conferencing sessions each semester with Dr McNamara and their other lecturers. Dr McNamara also visits Albany once each semester.

“I love being part of the development of the Albany Centre and part of what I enjoy is the emerging process. I work closely with Mike Fardon in the Multimedia Centre and he is always experimenting with new ways of doing things.”

Even universities have friends

After living in Albany for 42 years, raising seven children and serving (currently) on 24 boards and commissions, you might think that Albany’s former mayor, Annette Knight (pictured left), had run out of energy.

But you’d be wrong. She is the untiring Chair of the Friends of UWA, the hands-on supporters who have done so much to get the UWA Albany Centre up and running and keep it ticking.

“Education is something that hadn’t really been taken care of in this region,” Mrs Knight said. “I had been involved for 14 or 15 years in trying to get a university to come down here. To have the UWA Albany Centre here was beyond our wildest dreams.”

Mrs Knight and her 30 Friends have set up a lecture series on natural resource management (a subject dear to the hearts of most Albany people); established Friends groups in local schools; assisted UWA Press with a recent book sale in Albany; refurbished the old District Education Office garage, turning it into a student common room; helped with social events; and are planning a major annual lecture by a high profile speaker in Albany.

In short, they are ready to sell raffle tickets, pull weeds, hand out fliers and be generally positive and supportive of the centre.

They are right behind the centre’s push to attract school leavers.

“Young people here have a very exciting opportunity to be part of a new university, to help to design it and have input into how it could become a unique arm of UWA,” Mrs Knight said.
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2001 RAINE PRIMING GRANTS

Applications are invited for Raine Priming Grants in accordance with the Guidelines governing the awards, and include provision for New Project Grants as defined in the Guidelines. The Grants* shall provide funding for research into any area of medical science that investigates the nature, origin and cause of human disease, and the prevention, cure, alleviation and combating of such disease.

Grants shall be offered for a two-year period, subject to annual review.

Grants may be used to provide funding, or part funding, of salaries for researchers and/or technical staff, computing, and consumables.

Major items of equipment will not be financed.

The research shall be carried out at, or in association with, The University of Western Australia.

Guidelines and Application Forms are available from:
Raine Medical Research Foundation
Suite 24, 95 Monash Avenue, Nedlands, WA 6009
Hollywood Specialist Centre
Telephone: 9386 9880
Fax: 9386 9522; email: raine@raine.uwa.edu.au
Web site: www.raine.uwa.edu.au

Application forms must be received at the above office no later than Monday 1 May 2000 at 5pm

* Raine Priming Grants are intended for: (a) less experienced researchers, (b) researchers wishing to move in a different scientific direction, and (c) new academic research staff to The University of Western Australia.
AUSTRALIAN RESEARCH COUNCIL


Dr Anya M. Waite, Environmental Engineering and Dr P. Boyd (external): “Controls and impacts of organic particle aggregation in aquatic systems” — $60,000 (2000); $30,000 (2001/2).

Prof. David Russel Badcock and Prof. J. Ross, Psychology: “Detecting, interpreting and completing complex pattern and motion” — $45,500 (2000); $52,000 (2001); $46,000 (2002).


Dr Lincoln Heinze Schmitt, Anatomy and Human Biology and Dr R. A. How (external): “Impact of geographic, environmental and historical parameters on vertebrate diversity and evolution at the Oriental-Australian interface” — $42,000 (2000/1); $30,500 (2000).


Prof. Yanni Attikouzel, Electrical and Electronic Engineering: “Intelligent search, detection and classification of lesions on mammograms” — $56,000 (2000); $58,000 (2001); $60,000 (2002).

Prof. Lorenzo Faroene and Dr John Marcel Dell, Electrical and Electronic Engineering, and Prof. S. Sivananthan, Physics: “Investigations of mercury cadmium telluride heterojunction interfaces for semiconductor device applications” — $83,000 (2000); $80,000 (2000/1).

Prof. Paul William Miller, Economics: “Neighbourhood effects and the immigrant adjustment process” — $57,500 (2000); $59,500 (2001); $54,000 (2002).

Dr Michael Edmund Tobar, Physics: “A mechanism to describe the sensitivity of mammalian cells to changes in oxygen concentration” — $5790 (2000).

AUSTRALIAN RESEARCH COUNCIL — SMALL GRANTS


Dr Andre Nicholas Luiten and Dr Frank Joachim Van Kann, Physiology: “The dependence of motion perception on the spatial properties of the moving object” — $30,500 (2000); $30,000 (2001); $31,000 (2002).


Dr John Marcel Dell, Electrical and Electronic Engineering: “Investigation of defects in AlGaN/GaN structures by electron spin resonance spectroscopy” — $13,800 (2000).


Dr Susan Marianne Spargaren, Electrical and Electronic Engineering: “Investigation of defects in AlGaN/GaN structures by electron spin resonance spectroscopy” — $13,800 (2000).


Dr Susan Marianne Spargaren, Electrical and Electronic Engineering: “Investigation of defects in AlGaN/GaN structures by electron spin resonance spectroscopy” — $13,800 (2000).
The first series of major activities by the Institute of Advanced Studies took place in March and provided an auspicious start to a busy inaugural year of programs and one-off events.

Science at the New Millennium, one of the two programs funded by the Institute in mid 1999, started with three discrete components: the Octagon lecture series over three nights; the fourth International Centre for Relativistic Astrophysics (ICRA) workshop; and the visit by an impressive gathering of eminent scientists for the opening of the Australian International Gravitational Observatory at Gingin (see the last issue of UWA News for the full story).

The Public Lecture series, well attended by both UWA staff and students and the larger interested public, was a return to the passionate interest in physics that was shown at the Octagon in 1988 when David Blair organised five lectures by scientists including Paul Davies. Back then, there were not enough seats to hold the crowds of interested people. This time, almost 1000 people attended over the three nights. This series welcomed back Remo Ruffini, a regular visitor to UWA over 20 years, as well as Barry Barish from the LIGO Laboratory at Caltech, one of the most distinguished experimental physicists in the USA, and Adalberto Giazotto from the University of Pisa. This was just the sort of international series that we are striving for with the Institute.

The ICRA workshop, held for two days on campus, attracted a hugely impressive list of visitors from Europe, the USA, and Australia. Some of the participants travelled across many borders to arrive in Perth: including Professor Jim Wison from the Lawrence Livermore National Laboratory in California, and Gurzadyan Vahe of the Yerevan Physics Institute and Dr Richard Isaacson, a Programme Director from the American National Science Foundation. As well, a host of local government dignitaries from Italy attended to celebrate Australia's entry into the ICRA Network. This was a brilliant opportunity for students to work with high-level scientists in an intimate workshop setting.

The ICRA web site (http://www.icra.it/Welcome.htm) has further details of this workshop and features the dazzling image of artist Julie Weekes used on the IAS poster. Her painting captured the attention of all of the visiting scientists. Professor Barish made an allusion to it in his lecture, and each of the visitors travelled to her Fremantle studio to see more of her work. Look out for the second series poster featuring another of her works, this time on Stars and Cells, from the middle of the year.

The next round of visitors to Science at the New Millennium is scheduled to arrive in October. Joseph Vacanti from the Harvard Medical School is visiting as a Raine Distinguished Professor and will present a Public Lecture in early October at the Octagon Theatre. Professor Vacanti is at the forefront of innovation in the area of Tissue Engineering internationally. Vacanti is currently hosting a residency for Oran Catts and Ionat Zurr, two artists from Symbiotica, UWA’s Anatomy and Human Biology Collaborative studio.

Later in the month two distinguished physicists will visit — Thibault Damour from France’s Institut des Hautes Etudes Scientifiques and his close colleague, Nobel Laureate Joseph H. Taylor of Princeton who continues to explore problems in astrophysics and gravitational physics by means of radio-wavelength studies of pulsars. Professor Taylor is also formerly a faculty member of Princeton’s famous Institute for Advanced Study. These two Public Lectures are being planned for late October.

And by the way, for those of you who attended the Octagon lectures and were impressed with the young boy who asked the astute and most impressive questions — he has been contacted to explore the possibility of an ongoing relationship with science and UWA!