The Science Place Project

Welcome to the first issue of ‘The Science Place’ Newsletter. For those not aware, ‘The Science Place’ project is a new $80 million joint JCU and Federally funded teaching and research facility for the JCU Townsville campus. The Science Place will have state-of-the-art laboratories and technology-enabled active learning spaces with the capacity to link through to regional and remote, national and international locations, encouraging student retention and inspiring a positive future in Sciences in Tropical Queensland.

The four level, 10,500m² facility located in the middle of the current Science and Engineering precinct will accommodate projected growth in student and staff numbers in Chemistry, Biology and Biochemistry over the next decade. The facility will include TEAL, open-plan Super-teaching laboratories two levels of Research and laboratory support and workplaces including a new 150 person Collaborative Lecture theatre. NQ CSIRO Education who are also contributing towards the project will gain permanent space to introduce ‘Science’ to school students.

Sustainability and a portion of the Verandah Walk are also key features of the development.
Project Progress

The ‘Education Investment Fund’ (EIF) funding agreement was signed in May 2013 and Hassell (Architects and Principal Consultants) commenced the design in July 2013 after a competitive Tender process. A number of JCU staff have been nominated to join specialist User Groups to “advise and guide” the development of the project with the Design Team.

User Groups include: Research Laboratories; Teaching Laboratories; Learning Spaces; Workspaces; Loading Dock & Dangerous Goods; ICY, BMS & Security; WHS & Environmental Sustainability and Audio Visual

In November 2013 the User Groups and ‘Project Control Group’ endorsed the Return Brief and initial Concept Design. This was also endorsed in December 2013 by JCU’s FIAC and Estate Board Committees’.

Design Sub-Consultant teams have now been appointed to the project and the design is currently progressed to 80% Schematic Design (SD) stage—which is scheduled for delivery at the end of February 2014.

Meet the Team

A great number of project team members will be working together over the coming 3 years to bring you The Science Place. To get the ball rolling here are some key project members - from top left - Geoff Murray (Manager, Capital Projects Estate Office JCU), Jacinta Lymburner (Project Administrator, Estate Office JCU) Savita Francis (Operations Manager School of Marine and Tropical Biology) and Mark Craig (Principal Consultant, Hassell Architects)
Early Works and Demolition

Initial feasibility studies examined a number of alternative solutions to accommodate the new ‘The Science Place’ facility on the Townsville Campus including refurbishing existing buildings, a combination of old and new buildings as well as demand on existing infrastructure, future life-cycle, operational and capital replacement costs. The most effective, strategic and sustainable option was to consolidate all functions into one new building and remove two older low rise buildings facilitating operational and energy consumption efficiencies as well as delivering a quantum leap in the teaching and research environment.

Buildings 21– Molecular Science and 23 - Marine and Tropical Biology both designed in 1960’s have been identified for demolition as part of the project scope; operations in both these buildings will be transferred into The Science Place on its completion in December 2016.

A Siting Option study was undertaken and identified that the preferred location for The Science Place is where Building 23 is currently located. Accordingly this building will be demolished first to make way for the new works. Temporary Accommodation for all staff and Students has been identified and endorsed by the Project Control Group (PCG). Modification works to alter existing space in alternative accommodation is currently being documented. Building 21 is scheduled to be demolished after The Science Place is complete.

Those affected will be contacted separately with detailed relocation advice.
Sustainability

An Environmentally Sustainable Design Working group was formed to work with specialist Sustainability consultants Ecomplish and D² to set sustainability targets and help minimize water consumption, energy use and operational costs. Energy-efficient design methods appropriate to the local tropical environment will target improvements to the building code energy efficiency requirements. The buildings embodied energy will also be reduced through careful selection of materials and re-cycling where possible. Whole of Life cycle costing will also be undertaken to ensure the building provides value for money and will be economical to operate.

The building’s sustainable performance and features will be demonstrated against some of the following criteria:

- **Leadership** - TSP will be an exemplar in authentic sustainability to support JCU in becoming recognized as a leader in sustainability
- **Climate Responsive Design** - Respond to the local micro climate including humidity and solar incidence
- **Connection** - with the natural environment
- **Life Cycle Assessment** - to reduce its embodied energy and relative ecological footprint
- **Economic viability and longevity** - by using diverse and flexible design and lifecycle analysis
- **Green Procurement** - Preference to use local materials and trades, easily maintainable and replaceable equipment with low or no toxicity
- **Sustainable Transport** - Provide end of ride facilities and quality cycle and walking path connections
- **Promote sustainability awareness** - Promote the features of the building to students, researchers and visitors to maximize educational value.
Sustainable Opportunity

A number of exciting and new sustainable initiatives have already been identified and may be incorporated and featured in The Science Place. Accordingly the Project Team invites researchers to submit innovations and ideas, for consideration in The Science Place design. These initiatives could be part of existing research projects, for demonstration in the new building or technologies to make the new building even more sustainable.

A significant number of competing proposals are envisaged. Proponents will need to be in a position to quickly supply sufficient information to enable an evaluation of the initiative, including Requirements, Benefits, Costs, Payback and Risks. Please email: thescienceplace@jcu.edu.au Title: “TSP Design Suggestion” by 17 February 2014 with your suggestions.

Timelines

- **Alternative Accommodation for Building 23** - Complete by July 2014
- **Demolition of Building 23** - Underway by August 2014
- **Construction TSP** - Commence February 2015 - Complete December 2016
- **Staff Training / Relocation into TSP** - January / February 2017

For Further information

On The Science Place please go to our webpage at thescienceplace.jcu.edu or email The Science Place project team at Email thesciencplace@jcu.edu.au

Full concept design and Architectural strategies are available to PCG and User Group members via the web page login area