College of Sciences and Technology
Summary report on the TIF grants from 2001 to 2003

Preamble:
The College of Sciences and Technology has received 41 TIF grants in the three years from 2001 to 2003 inclusive. These grants totalled $1,304,739. Nineteen out of the 41 were classified as small TIFs (46%), each receiving $5,000 from TIF with the expectation, at least in Science, that there would be matching funds. The total for the small TIFs is $95,000.

The projects fall into several categories:

<table>
<thead>
<tr>
<th>Category</th>
<th>Number of grants as % of total</th>
<th>Funding as % of total available</th>
</tr>
</thead>
<tbody>
<tr>
<td>Curriculum Development</td>
<td>32%</td>
<td>46%</td>
</tr>
<tr>
<td>Staff Training</td>
<td>17%</td>
<td>18%</td>
</tr>
<tr>
<td>First Year Projects</td>
<td>15%</td>
<td>18%</td>
</tr>
<tr>
<td>Web-based materials/courses</td>
<td>10%</td>
<td>2%</td>
</tr>
<tr>
<td>Communications projects</td>
<td>10%</td>
<td>5%</td>
</tr>
<tr>
<td>Benchmarking projects</td>
<td>7%</td>
<td>5%</td>
</tr>
<tr>
<td>Assessment projects</td>
<td>7%</td>
<td>3%</td>
</tr>
<tr>
<td>Skills projects</td>
<td>2%</td>
<td>3%</td>
</tr>
</tbody>
</table>
Analysis of reports:
An (ongoing) analysis of the 2001-2003 TIF grants is identifying some interesting trends. To date (July 2004) 17 (41%) have been completed, with a completion rate of 40% for the “small” projects and 33% for the “large” projects. It has, however, been difficult getting hold of reports from the projects even though it was a condition of the funding to provide a final report to the PVC’s office.

Without more information it is difficult to make many comments on the outcomes of the TIF with respect to the College. An overview of what is available would seem to indicate:

- there have been several projects associated with the first year experience and these appear to have made a significant difference to our entering students. In most cases the projects have been evaluated, reviewed, modified and are now in place as core business of the department, school or faculty. This is an important measure for the College.
- many of the small projects in Science have considerable outputs in the form of presentations and publications. This is partly due to the culture in place in Science which encourages teaching developments to be disseminated widely. Veterinary Science has also made a significant effort to disseminate their projects. These are important outcomes for the College.
- of the large projects funded (>\$35K), it would appear that those with a clear indication of project management are better reported and disseminated.

An issue of great interest is that of improving the teaching culture within the College. Of the seven funded projects, only two have been reported. The first is from Mathematics and
Statistics and the project funds ($5K) helped to develop an information booklet for all casual tutors. A larger project ($35K) to develop a staff training program for all casuals/new teaching staff in the Faculty of Science is in its second full year, the program consists of a workshop before the semester starts (held twice a year) and an ongoing program of moderated and directed reflection on teaching. This has been reviewed and will be available next year to casual/new teaching staff in Agriculture and Engineering. There have been three projects funded in Architecture (one each year), and these have concentrated on running workshops for casual staff before teaching commences. The outcomes for the workshops is a greatly improved ‘good teaching’ rank in the SCEQs.

Reflections and Recommendations:
From viewing the reports and talking to some of the project leaders it would appear that the most successful of the projects are those that were either very small in terms of aims and finance (the $5,000-funded projects) or those that had a significant project management structure embedded in them from the beginning. The College should consider that:

- All projects should have an evaluation strategy within the project proposal.
- Future projects funded with more than $10,000 should have as part of the project proposal a specific project management structure.
- The College should develop a structure/process in which the evaluation of the project is managed from outside the project group.

Mary Peat  
1 July 2004
Publications and presentations

Referred Journal papers

Canfield, PR, and Taylor, RM (2004) Teaching and Learning at the Faculty of Veterinary Science, University of Sydney. Journal of Veterinary Medical Education April 2004


Lewis, A., Franklin, S. & Peat, M. Putting learning into context: helping education students to learn biology. Submitted to Australian Science Teachers Journal – November 2003


Book chapters


University Teaching and Learning Showcase


Kay, J. & Miller, A. (2001) A Mentor Programme – an opportunity for higher year students to assist new students and gain insights into their own learning. Abstracts of the VC’s Showcase of Scholarly Inquiry in Teaching and Learning, University of Sydney, pg 94
Sharma, M. D., O’Byrne, J. & Cooper, I.(2003) Using lab-based projects for teaching and learning problem solving skills in large first year classes, College of Sciences and Technology Teaching and Learning Showcase, University of Sydney, pp11
Taylor, R. (2001) Can small changes to assessment encourage students to take deep approaches to learning? Vice Chancellor’s Teaching Showcase 2001 Pp60
Taylor, Barton, J, Bosward, K et al (2003) Developing graduate attributes in team work throughout a professional curriculum Vice Chancellors Showcase: Graduates for the world p39
**Conference presentations**


Sharma, M., Khachan, J., Chan, B., Stewart, C. R. & O’Byrne


**Faculty/University/Invited Seminar**

Baguley, J and Feletti, G (2004) *Using feedback from the rotations to improve the program.* Partner Practitioner Conference of the Faculty of Veterinary Science, July 2004

Canfield, P, Krockenberger, M and Bosward, K (2004) *Host–pathogen-environment interactions as a basis for investigating and understanding (researching) animal diseases and its application to the teaching of “Principle of Disease (VET2013) and Veterinary Conservation Biology (VET 2015).* Faculty of Veterinary Science Research Led teaching Showcase

Collier, M (2004) *Critical evaluation of research material by students of Animal Science.* Faculty of Veterinary Science Research Led Teaching Showcase June 2004


Dixon, R (2002) *Digitisation is not a congenital malformation: progress toward the virtual animal for teaching.* Faculty of Veterinary Science Online Teaching Showcase, Nov 2002


Feletti, G and Robson, M (2004) *Improving the process of assessing interns on extramural rotations.* Partner Practitioner Conference of the Faculty of Veterinary Science, July 2004


Feletti, G and Taylor R (2002) *Implementing Grade Descriptors for Clinical Practice.* Faculty of Veterinary Science Training Workshop March 2002


Krockenberger, M (2002) *Integration by case-based learning ICAPs*. Faculty of Veterinary Science Online Teaching Showcase, Nov 2002

Marcus, G (2004) *Students perceptions of online case based learning in Veterinary Pathology*. Faculty of Veterinary Science Research Led teaching Showcase


McGreexy, P (2002) *Adding value to OLIVER records*. Faculty of Veterinary Science Online Teaching Showcase, Nov 2002

Norris, J (2002) *Veterinary online interactive learning system*. Faculty of Veterinary Science Online Teaching Showcase, Nov 2002


Peat, M., Fernandez, A., Stewart, C. & Taylor, C. E. (2003) Faculty of Science project: enhancing the employability of Science graduates: increasing the awareness of staff and students to the needs of the employers; given to the Science Librarians, August 2003


Radford, D. (2001) Provision of online tutorials for first-year Chemistry students. Seminar in Faculty of Science’s Teaching Development Grant seminar series


Taylor, R (2001) *Teaching into the future: shaping the next generation of veterinarians*. Faculty Teaching Showcase for Veterinary Schools Accreditation Committee, Sep 2001, University of Sydney

Taylor, R (2001) “Assessment matters” Faculty teaching development day, November 2001

Taylor, R (2002) *Developing and using Grade Descriptors for Assessment*. Faculty of Veterinary Science Teaching and Learning Development Workshop August 2002


Taylor, R (2003) *Using evidence to change approaches to learning (and the teaching culture)*. Faculty of Engineering Teaching Advance, June 2003
Taylor, R (2004) Benchmarking and group work. Faculty of Veterinary Science Research Led Teaching Showcase June 2004
Taylor, R and Hodgson, D (2004) Improving the educational experience in extramural rotations. Partner Practitioner Conference of the Faculty of Veterinary Science, July 2004
Windsor, P (2002) Ungulates behaving badly: improving resources to train protectors of our livestock industries. Faculty of Veterinary Science Online Teaching Showcase, Nov 2002