Communication, creativity and commercialisation of science in Australian research institutions

Beryl Morris
CEO
Vaccine Solutions Pty Ltd

November 2002
The challenges

- Researchers respect the non-disclosure requirements involved in commercialisation of science
- Researchers do not become so rule-bound and ‘applied’ that they decrease creativity
- Commercial managers and researchers are partners in achieving commercial success
# Creativity models

<table>
<thead>
<tr>
<th>Organisational structure approach</th>
<th>Knowledge management approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>- structured coordination of people &amp; information</td>
<td>- bottom up</td>
</tr>
<tr>
<td>- top down</td>
<td>- fosters improvisation at the local level</td>
</tr>
<tr>
<td>- assumes you can write down what creates value</td>
<td>- assumes unpredictable environment</td>
</tr>
<tr>
<td>- assumes a predictable environment</td>
<td></td>
</tr>
</tbody>
</table>
Creativity models

Processes:
- formal
- organisation of matters

Practices:
- the way things are actually done
Creativity models

- Too much practice
  - new ideas but no structure to harness them

- Too much process
  - too little freedom for the creative spark

The balance is important
Balance and university commercialisation

- Universities track innovation from a wide range of departments and disciplines
- Policies and procedures are typically ‘one size fits all’
- Process dominates due to the need for economies of scale
Case study: UQ

- **Faculty**
  - School
  - Department

- Office of Research and Postgraduate Studies
  - Research-related contracts
  - Grants

- **Corporate Legal Office**
  - Service contracts

- **UniQuest Pty Ltd (Techcom)**
- **IMBcom**
- **JK Tech**
  - Patentable IP
  - Licences

- **UniQuest Pty Ltd**
  - Consulting & Testing Division
UQ’s answer to the challenges

- Hub and spoke model
- Joint venture between the relevant parties
  - Faculty / Office of Research / UniQuest/UQ
- Allows customisation of processes to better fit discrete types of innovations and markets
- Local practitioner partners with a researcher in a hybrid bottom-up approach
“Hub & Spoke” Organisation Structure

Faculty of Social and Behavioural Sciences
Faculty of Arts
Faculty of Natural Resources Agriculture and Veterinary Science
Faculty of Engineering, Physical Sciences and Architecture
Faculty of Health Sciences
Faculty of Biological and Chemical Sciences

ORPS
UniQuest

Faculty
Find out what you know

- Key is to have a ‘local practitioner’
- Collate all the ‘business’ or ‘research’ practices and policies
  - e.g. UQ Legal, UQ Research and UniQuest
- Enact the best fit for each situation
- Share and generate insights between the ‘local practitioners’ to create a critical resource

Community of Practice
Cooperative Research Centres

- Innovation is sector-specific
- There is an expectation of commercialisation
- There is a dedicated commercialisation entity
- Researchers can be geographically separated and inaccessible to the commercial manager
Cooperative Research Centres

- Researchers come from traditional institutions where there is structured coordination of people & information.
- Challenge is to have influence over researchers who are employed in a rule-bound university or university-like environment but whose intellectual property is managed by a dedicated commercial entity.
## Creativity through balance

<table>
<thead>
<tr>
<th>Organisational structure approach</th>
<th>Knowledge management approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>• structured coordination of people &amp; information</td>
<td>• bottom up</td>
</tr>
<tr>
<td>• top down</td>
<td>• fosters improvisation at the local level</td>
</tr>
<tr>
<td>• assumes you can write down what creates value</td>
<td>• assumes unpredictable environment</td>
</tr>
<tr>
<td>• assumes a predictable environment</td>
<td></td>
</tr>
</tbody>
</table>
Thank you