

Commercializing Research

University Policies and Practice

Road Map

- Policy Environment
 - External
 - Internal
- Institutional Policies & Practice
- Issues & Roles of “TLO’s
- Impact on Commercial Management of IP
- Impact on Science Parks

Policy Environment

- External
 - Government (National, Regional)
 - International (eg WIPO, GATT, TRIPS)
 - Economic Environment
 - Business / Markets
- Internal
 - Mediation of External Pressures into Institutional Policy & Practice

Types of Influence

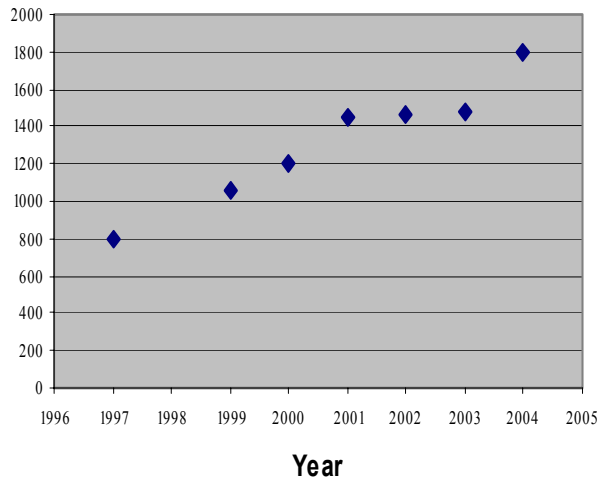
- Legislative Environment
 - Establishes Rights and Obligations of Research Institutions
- Funding Environment
 - Determines resources available to Research Institutions and how they might augment them
- Policy Objectives
 - Objectives of Commercializing Research
 - Message to Institutions via metrics
 - “What gets measured gets done”

External (1)

- Rôle and Importance of Commercializing University Research
 - Indifference vs Employment vs Income Generation
- Legislative / Regulation
 - IP ownership in context of Employment
 - Eg UK grants to universities as employer
 - Eg Bayh-Dole in US for Federally Funded Research
 - “Researchers Exemption” in Sweden
 - Human Resource Policies
 - Bayh-Dole Imposes Incentives to disclose inventions
 - Patent Office Practice
 - Eg variations in software patenting

Increasing Interest in Commercialisation of Research

Attendance at AUTM Conferences



In the UK there were a series of White Papers – stressing the importance - (Our Competitive Future – Building the Knowledge Driven Economy, 1998, Excellence and Opportunity 2000, Opportunity for All in a World of Change, 2001)



In 2004 nearly 30% of the attendance at AUTM was from the international community

External (2)

- Funding
 - Research Funding
 - Volume of outcomes
 - Prioritisation on commercial outcomes
 - “Knowledge Transfer” Funding
 - Deliberate programmes aimed at commercialisation of Research
 - Seed and Pre-seed Funding Availability
 - “Valley of Death”

External (3)

- National / Regional Policies favouring specific outcomes
 - Focus (eg in UK) on Spin Outs
 - Role of Science Parks as Incubation facilities
 - Proximity to Universities
 - Route for Company Incubation & Development
- Vs
 - Access for Companies to Researchers

Internal (1)

- National Policies Mediated by Institution
- Objectives of Technology Licensing Operation
 - Support Research Agenda
 - Economic Development
 - Generation of Income
- IP Ownership
 - Institution may affect application of Legislation
 - Inventors Rewards

Internal (2)

- Structure and Rôle of TLO
 - Allied to Research Office
 - Separate organisation
 - Separate Admin Office (typical US)
 - Subsidiary, profit making company (“UNICO’s” in UK)
- Staff Mission
 - Assist researchers
 - Create profitable licence deals / spin-out companies

Functions of TLO's

Professional
/ Admin

- Identification and Protection of IP
- Screening (“Triage”) for commercialisation potential
- Finding Licensees / Negotiation of Licences
- Creating Companies
- Management Services
 - Contracts
 - Finance
- Finding Potential Investment



Commercial

Variations In Practice (1)

- Staff Organisation
 - Degree of Specialisation
 - Function vs Sector
- Assistance vs Control
- Spin-Outs vs Licensing
 - Range of services carried out
 - Range of expertise

Variations in Practice (2)

- Interactions – eg Research agenda & funding
 - Low research funding – focus on income generation via commercial contracts
 - High investment in research – focus on public good
- SME Engagement

Issues (1)

- Culture
 - Protection vs Dissemination
- Mission
 - University
 - TLO
 - Science Park
- IP ownership
- Exploitation of Expertise

Issues (2)

- Technology Push Mode of Operation
- Possible rôle conflicts
 - Research Agenda
 - SME culture clash / transaction costs

Implications for Science Parks

- Connection of Companies to University Expertise
- Marketing Support / Due Diligence for Spin-Outs
- Attraction of Start-Ups
- Understanding University Processes & Objectives