

Innovation

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The University

- **Role**
- **Funding**
 - Peer review
- **People**
 - Incentives / Motivation / Pay
 - Teaching / Admin / Performance Measurement
 - Flexibility

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Commercialisation Challenges

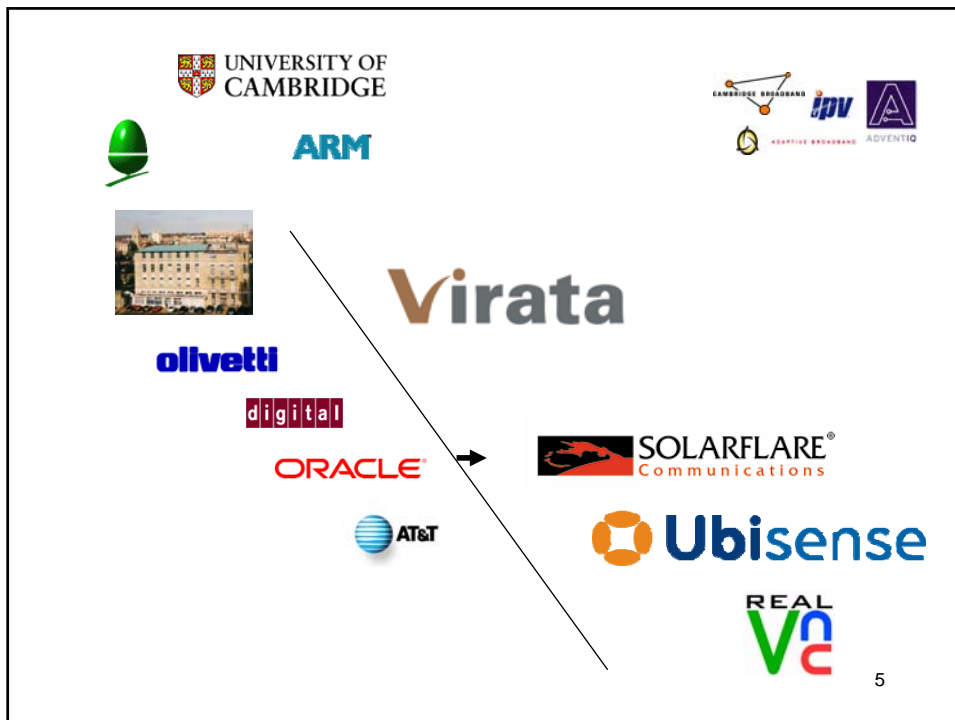
- **Funding Gap**
- **Institution Gap**
- **Obstacles / Barriers**
- **Constraints**
- **Sustainability**

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Wealth Creation

- **University**
- **Large Company**
- **Small Company (SME)**
- **Start-up / Spin-out**
- **Capital**
- **Some (Cambridge) Big Success Stories**
 - ARM, Virata, Autonomy, CSR
- **Intermediate Organisations**
 - CCL, TTP, ORL

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My Innovation Experience

- **Innovation model: make bets on applied research**
 - Buck trend, construct real systems, use assets
- **Operational model: play to local strengths**
 - Create teams, culture, know-how, prototypes, IPR
 - Empower team, prioritise impact, "infinite" money, actively manage
 - Plug in to cluster: university, multinationals, start-ups, Angels, VCs, global marketplace
- **Commercial model: keep technology in play**
 - Support transfer (of team) to sponsor
 - Spin-out company (and team), licence, open source, give away, ...
 - Never discard technology
- **Educate customers about the future**
- **Arrange industrial dates / marriages**

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Examples

Virata

1993 - 2002

- Chips for 30% of world's DSL connections
- 1-5\$Bn Valuation
- 6 years from spin-out to IPO
- 7 financing rounds - \$682 Million capital raised
- 5 acquisitions, 1 merger

- Innovation perspective



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Examples

SOLARFLARE[®] Communications

2002 - now

- 10GB Ethernet chips for Data Center and Enterprise Networks
- Headquarters in USA following a merger
- "Traditional" funding chain including US VCs (over \$100M)

- Innovation perspective

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Examples



2003 - now

- **Precise real-time in-building location systems**
- **New market area**
- **Fully Angel funded (£8M)**
- **Transparent capital structure**

- **Innovation perspective**

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Examples



2002 - now

- **Software for remote control of computers**
- **100M+ open source licences, 50K paying customers**
- **Profitable for 20 quarters so far, 90% of revenues from export**
- **Organically grown and funded**

- **Innovation perspective**

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More Geese that lay Golden Eggs

- **Experiment with sector-oriented innovation labs each with a theme, autonomy, a strong leader**
 - Industrial entities with little down side
- **Create broadly-based teams with incentives for success**
 - Innovation is people centric not idea centric
- **Operate offshore from Universities and Multinationals (but very close to them)**
 - Face territories, markets
- **Compete (and collaborate) on the global scene**
- **Empower the people not the process**

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