Thoughts on University / Industry Relations

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Our Desires from Industry

**Funding**
- At level appropriate for value provided

**Connections**
- Increase research relevance
- Understand real-world problems
- Work with smart & talented people

**Access to Data**
- Get behind firewall
Mechanisms

- In order of increasing complexity

**Individual Connections**
- Summer internships for grad students
- Sabbaticals for faculty
- OK for connections & data. Not for resources

**Gifts**
- Avoids complexity of contracts office

**Sponsored Research**
- Difficult to negotiate
- Required when resource level substantial
Intellectual Property Complexity

- Major cause of failed or delayed agreements

Massive negotiations over unlikely outcomes
- Chances of commercially valuable IP slim
- Lawyers (on both sides) don’t understand this
- Faculty don’t understand regulations

Difficult legal constraints
- Universities cannot do work for hire
  - Must retain ownership of IP
- Varied interpretation about rules regarding use of buildings funded by tax-exempt bonds
- Rights of faculty
Other Pain Points

Warranties
- We don’t give them

Indemnification
- We don’t do it
- We want company to indemnify us
Successful Mechanisms I

Intel Open Collaborative Initiatives

- Labletts and Intel Science & Technology Centers
- All sides give up their IP rights
  - Company, university, faculty
  - All code put into open source
  - All work published
- Maximizes free flow of ideas & information
- Mechanisms in place to foster spin-out companies
Successful Mechanisms II

Graduate Fellowships
- IBM, Yahoo, Google, Facebook
- More targeted to specific students

Yahoo Data Sets
- Anonymized data sets in ~40 different areas
- User agreement to guard against inappropriate use

Cloud Computing Services
- Yahoo M45
- Discounts on Amazon EC2
- Google / IBM resource via NSF