Transferring UCLA discoveries to the public.

Kathryn Atchison, DDS, MPH
Vice Provost,
Associate Vice Chancellor for Research
UCLA Research: A Winning Environment

- $811M+ in research awards for FY2006
- 3,300 Faculty; 200 Graduate Programs; 11 Professional Schools; 25,700 Undergraduate / 12,800 Graduate students
- #3 in US – 2006 ranking for academic annual R&D expenditures
- 5,500+ ongoing research projects
- Comprehensive campus
- “Best Hospital in the West” 17th consecutive year (US News)
Technology Transfer Mission is to support UCLA's research, education and public service mission by:

- Educating the academic community about appropriate methods for protecting intellectual property
- Accelerating the development of UCLA discoveries for the public good
- Promoting economic growth in California
- Facilitating collaborations with industry for next-generation scientific breakthroughs.
UCLA Statistics

- 1401 Active Inventions
- 358 Active Licenses/Options
- 20 equity holdings in start up companies
- 150 start ups formed around UCLA IP
- 291 patents filed in FY07
- 78 Licenses/Options issued in FY07
- $20 Million Licensing Income in FY07
Successful UCLA Products

- Nicotine Patch
- GDC Coil
- Clot Retriever Coil
- Blood Cooling Device
- Protein Imaging Software
- Pomegranate Extract
- Inflammatory Bowel Disease Diagnostic
- Micro Pet
- Gleevac Resistance Test
# UCLA Biotech Pipeline

<table>
<thead>
<tr>
<th>Company</th>
<th>Phase</th>
<th>Indication</th>
</tr>
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<tbody>
<tr>
<td>Company 1</td>
<td>FDA Approved</td>
<td>Physician’s Office Asthma Monitor</td>
</tr>
<tr>
<td>Diamyd</td>
<td>Phase III</td>
<td>Diabetes Therapy</td>
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<tr>
<td>Pipex</td>
<td>Phase II/III</td>
<td>CNS Therapy</td>
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<tr>
<td>Aeras</td>
<td>Phase II</td>
<td>TB Vaccine</td>
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<tr>
<td>Bruin Pharma</td>
<td>Phase II</td>
<td>Lipid Lowering Therapy</td>
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<tr>
<td>Agensys</td>
<td>Phase IIb</td>
<td>Oncology</td>
</tr>
<tr>
<td>Adolor</td>
<td>Phase IIa</td>
<td>Pain Management</td>
</tr>
<tr>
<td>Armagen</td>
<td>Phase I/II</td>
<td>Stroke Therapy</td>
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<tr>
<td>Medivation</td>
<td>Phase I/II</td>
<td>Prostate Cancer</td>
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<tr>
<td>Bone Biologics</td>
<td>Pre-clinical</td>
<td>Bone Regeneration</td>
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<tr>
<td>New Co 1&amp;2</td>
<td>Pre-clinical</td>
<td>Oncology</td>
</tr>
<tr>
<td>New Co 3</td>
<td>Pre-clinical</td>
<td>Cardiovascular</td>
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Key Features of UC Licenses

- UPFRONT FEE (CASH OR CASH AND EQUITY)
- LICENSE MAINTENANCE FEES
- ROYALTY RATE
- MINIMUM ANNUAL ROYALTIES
- MILESTONE PAYMENTS
- PATENT REIMBURSEMENT
- DILIGENCE TIMELINE
UC Patent Policy

After expenses (legal fees, patent costs), revenue is shared:

- 35% to inventors
- 15% to department/laboratory
- 12.5% to General Fund
- Remainder used to pay office expenses and distributed to campus
University Technology Transfer Process for Patents

OIP Evaluates:
1. Patentability
   - Novel
   - Useful
   - Non-obvious

2. Commercializability
   - Adequate market
   - Limited timeframe

Seek Licensee → Licensee Develops Product → Sells Product

FILE PATENT → PROSECUTE PATENT

UCLA Royalty income
How do you judge the educational contribution of Technology Commercialization to UCLA?

<table>
<thead>
<tr>
<th></th>
<th>FY04</th>
<th>FY05</th>
<th>FY06</th>
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<tbody>
<tr>
<td>New Inventors to educate</td>
<td>191</td>
<td>221</td>
<td>183</td>
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<tr>
<td>New Invention Disclosures to manage</td>
<td>186</td>
<td>291</td>
<td>264</td>
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<tr>
<td>Inventions Licensed</td>
<td>197</td>
<td>261</td>
<td>307</td>
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What is the Scope of UCLA’s Technology Transfer?

<table>
<thead>
<tr>
<th>Year</th>
<th>Active Portfolio</th>
<th>Revenue</th>
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<tr>
<td>FY01</td>
<td>686</td>
<td>9,541,604</td>
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<tr>
<td>FY02</td>
<td>727</td>
<td>11,579,898</td>
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<tr>
<td>FY03</td>
<td>790</td>
<td>13,185,614</td>
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<tr>
<td>FY04</td>
<td>948</td>
<td>16,208,745</td>
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<tr>
<td>FY05</td>
<td>1,151</td>
<td>19,115,131</td>
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<tr>
<td>FY06</td>
<td>1,293</td>
<td>21,869,987</td>
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<tr>
<td>FY07</td>
<td>1,300</td>
<td>25,358,009</td>
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</table>
A Case Study: Aneurism Treatment

1990: Prof. Guglielmi, Vinuela, and team disclose minimally invasive treatment designed to place a micro-coil inside an aneurysm to prevent rupture.

1995: FDA approval

To-date: over 400K coils placed in hemorrhagic stroke victims worldwide

2004: Matrix Detachable Coil, and research goes on......
UCLA supports industry’s mission as a land grant institution:

- Graduate well-trained workforce
- Industry support research at UCLA on their topic
- Visiting Scientist Agreements
- Equipment agreements for shared research
- Student Internships in company labs
Reflections on University-Industry Collaboration

- Faculty need to practice the full range of research – bench (or book) to public
- Collaboration facilitates faculty’s desire to see fruits of their research
- Partner with industry to create new products for public use
- Prepare students to launch new companies
- Find great opportunities for new graduates
Thank you, and How can we help you?