

# Issues related to the revision of the IP option in DCTD sponsored Clinical Trials



Slides and Data provided by:

Sherry Ansher, Ph.D., Regulatory Affairs Branch, *CTEP*

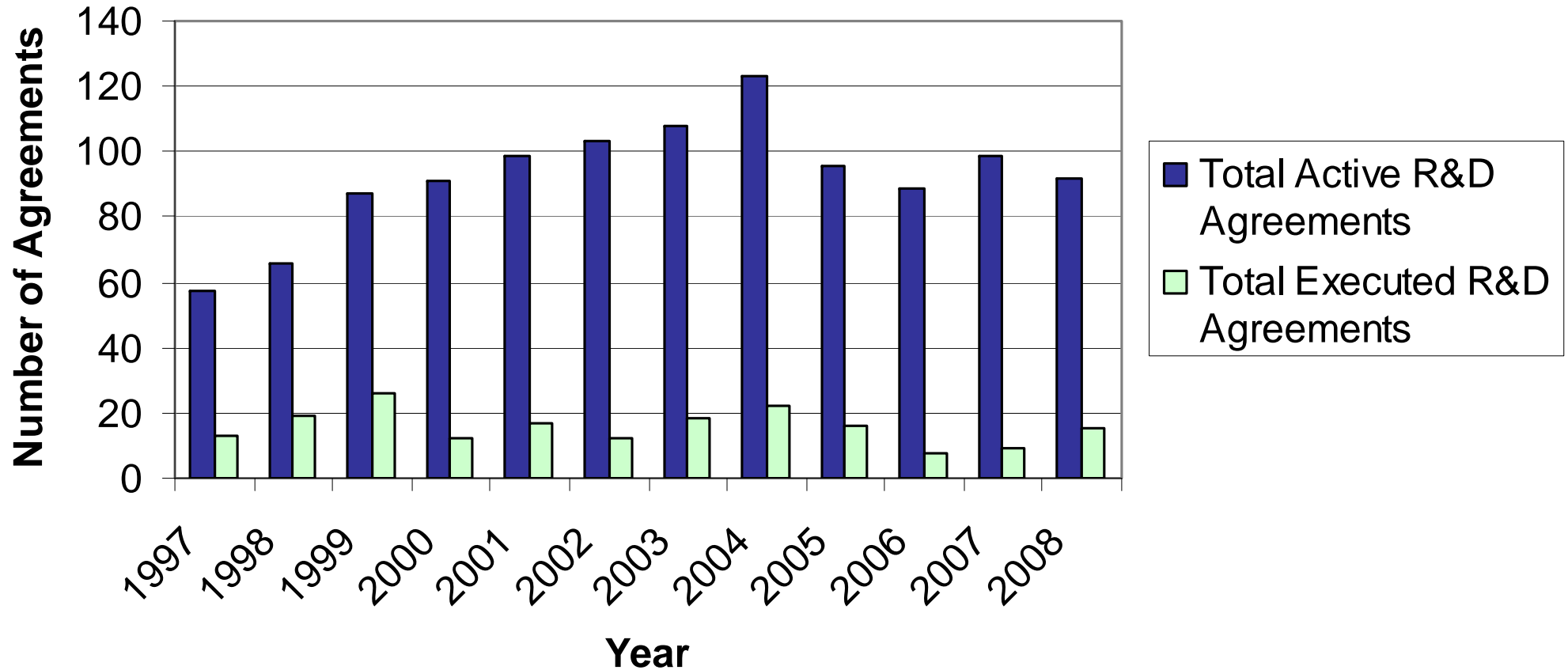
Jeffrey Abrams, M.D., Associate Director, *DCTD, CTEP*

Jason Cristofaro, J.D., Ph.D., *Office of the Director, Division of Cancer Treatment and  
Diagnosis*

# DCTD (CTEP) by Numbers

- Currently sponsors over 100 INDs
- Approx. 11,000 registered investigators at over 3,300 institutions
- Over 750 active protocols
- 150-250 new protocols/year
- Approx. 30,000 patients accrued/year
- Over 80 collaborative agreements (CRADAs, CTAs, and CSAs) with pharmaceutical companies (Collaborators)

# Total CTEP R&D Agreements Executed and Active Between 1997-2008



# Selected NCI/CTEP-sponsored Group Trials Contributing to FDA-approved Indications for New Oncology Agents

- 1991
  - Fludarabine phosphate (SWOG)
  - Pentostatin (CALGB, SWOG)
- 1992
  - Paclitaxel (GOG, CALGB, ECOG, NCCTG, SWOG)
- 1993
  - Melphalan IV (CALGB)
- 1994
  - Pegaspargase (POG)
- 2001
  - Imatinib mesylate (COG, SWOG)
- 2004
  - Letrozole (NCIC, Intergroup)
  - Oxaliplatin (NCCTG, Intergroup);
  - Taxotere (SWOG)
- 2005
  - Nelarabine (COG, CALGB)
- 2006
  - Bevacizumab (ECOG, Intergroup);
  - Rituximab (ECOG, Intergroup)
  - Herceptin (NSABP, NCCTG, Intergroup)

# History

- **January 1997:** Discussions with NIH initiated on methods to assist Collaborators in gaining access to extramural inventions using their proprietary agents.
- **March 1998:** Approval to move forward with language to allow Collaborators to be able to license extramural inventions arising from the use of their agent.
- **November 1998:** Letters to Institutions explaining reason for new IP term.
- **January 1999:** IP Option first added to grants and contracts for clinical trials.

# Existing IP Option

- “Institution agrees to grant to Collaborator:
  - (i) a paid-up **non-exclusive, nontransferable, royalty-free**, world-wide license to all Institution Inventions for **research purposes only**; and
  - (ii) a time-limited **first option** to negotiate an **exclusive, or co-exclusive** if applicable, world-wide **royalty-bearing license for all commercial purposes**, including the right to grant sub-licenses, to all Institution Inventions on terms to be negotiated in good faith by Collaborator and Institution.”

# History (continued)

- **June 2001:** Same IP Option added to MTAs to provide agents for non-clinical studies.
- **September 2003:** Modified IP option to provide Non-Exclusive, Royalty-Free (NERF) commercialization licenses for inventions arising from combination studies to all collaborators providing an agent for the study.
  - Extremely successful program with over 100 such **clinical trials open** to date.
- **January 2009:** Proposed updating to deal with new IP issue (correlative science projects) facing both Collaborators and participating institutions.

# Intellectual Property Issues Related to Investigational Combinations

([http://ctep.cancer.gov/industryCollaborations2/default.htm#guidelines\\_for\\_collaborations](http://ctep.cancer.gov/industryCollaborations2/default.htm#guidelines_for_collaborations))

---

## Single Agent Studies

- Collaborator receives a non-exclusive, royalty-free license for internal research purposes only.
- Collaborator has first rights to negotiate an exclusive or non-exclusive royalty-bearing license.

## Combination Agent Studies

- Each Collaborator receives a non-exclusive, royalty-free license for all purposes, including commercial purposes, to any combination IP.
- Still can negotiate a co-exclusive or exclusive license for Collaborator agent IP.



# Changing Times - Today's Issues

- Entrance of molecularly targeted agents into clinical trials has changed relationships among parties. Trials depend more on defining targets and developing biomarkers.
- Current IP Option and most of our collaborative agreements (and funding agreements) are silent as to the disposition of agent-treated human tumor samples and rights related to them. The IP framework surrounding agent-treated samples and the associated clinical data have become increasingly important.

# Changing Times - Today's Issues (continued)

- PD & Biomarker development is an important part of early drug development; potential to generate new IP during non-clinical studies is usually much greater than for clinical trials.
- DCTD receives requests from extramural investigators, especially those engaged in early phase clinical development, for greater and earlier access to samples from trials using cutting edge therapeutics for both non-clinical and clinical evaluation.
- Collaborators more concerned with studies in this area having the potential to generate “blocking” IP.

# Changing Times - Today's Issues (continued)

- Collaborators request freedom to operate provisions for “blocking” IP generated using their proprietary agent-treated samples and the resulting clinical data as a condition of making agent available.
- Cooperative groups request freedom to interact with small diagnostic companies to develop assays based on data from their clinical trials.

# Issues - Academic Community Feedback

- **Data Rights and Ownership** - Investigators should be free to use the data they generate in trials for their own and the public's benefit.
- **Invention Rights** - Investigators do not want the early stage IP they generate subject to a non-exclusive licensing requirement, as that will remove the incentive for investigators to conduct research/partner with small businesses in assay development.
- **Removal of assignment language** - Grants complete ownership to inventions resulting from unauthorized use of collaborators material. Conflicts with tax-exempt bond status.

# Issues - Industry Feedback

- The concern about blocking patents is omnipresent. Specifically, the development of assays that the FDA may require for treatment leading to the requirement to license ancillary technology to practice the main invention.
- Collaborators are fearful of having their development plan for an agent impacted by inventions that they neither foresaw nor did they have the opportunity to understand the science involved.
- Development of new indications by others based upon Collaborator technology.
- All of these issues factor into the Collaborators cost-benefit analysis in deciding to work with the NCI.

# NCI's Concerns

- **Academic Freedom** - Researchers must be free to conduct experiments that may enhance development and/or optimal use of new treatments with minimal outside interference.
- **Public Good** - The NCI will support policies that it believes provides the highest likelihood of developing treatments and tools beneficial to the broader cancer community, and the patients it serves.
- **Issue is:** How best to effect a compromise between these competing and legitimate interests of academia and industry collaborators?

# Revised IP Option - NCI Proposal Clinical Inventions (Inventions using the agent)

- **A.** Inventions arising from clinical studies involving the Collaborator's agent that use or incorporate the Collaborator's agent or inventions arising from non-clinical studies under an MTA that directly utilize Collaborator-supplied agent:
  - (i) a **royalty-free**, worldwide, **non-exclusive license for commercial purposes**; and
  - (ii) a time-limited **first option to negotiate an exclusive, or co-exclusive**, if applicable, world-wide, **royalty-bearing license for commercial purposes**,

# Revised IP Option - NCI Proposal Biomarker Related Inventions (“Assay” inventions)

- **B.** Inventions arising from studies utilizing clinical data or specimens collected from patients enrolled in a clinical trial that utilized the Collaborator’s agent (including specimens obtained from NCI funded tissue banks):
  - (i) **Nonexclusive**, nontransferable, **royalty-free**, world-wide license to all Institution Inventions for **research purposes only**; and
  - (ii) a time-limited **first option** to negotiate an **exclusive, or co-exclusive** if applicable, world-wide **royalty-bearing license for all commercial purposes**, including the right to grant sub-licenses, to all Institution Inventions on terms to be negotiated in good faith by Collaborator and Institution.



# Revised IP Option - NCI Proposal (continued)

- For exclusive license option:
  - For Section A inventions Collaborator shall notify Institution within three (3) months of receipt of patent application or six (6) months of receipt of an invention report (clinical or non-clinical inventions utilizing agent).
  - For Section B inventions Collaborator shall notify Institution within twelve (12) months of Collaborator's receipt of a patent application or eighteen (18) months of receipt of an invention report (inventions utilizing clinical data or specimens treated with Collaborator agent).
    - Collaborator will be offered the option to negotiate an exclusive license for up to ten (10) years following completion of the clinical trial that generated the clinical data and/or specimens.

# Revised IP Option - NCI Proposal (continued)

- If Institution and Collaborator fail to reach agreement within ninety (90) days, (or such additional period as Collaborator and Institution may agree) on the terms for an exclusive license Institution shall not offer license to any third party on materially better terms than those last offered to Collaborator without first offering such terms to Collaborator.
- Collaborator shall have a period of thirty (30) days in which to accept or reject the offer.
- In all cases, Institution shall retain right to make and use any inventions for internal non-commercial research and for educational purposes and to permit other educational and non-commercial institutions to do so.

# Revised IP Option - NCI Proposal (continued)

- **Unauthorized Use:** No unauthorized modifications to the agent will be created and that no unauthorized research with the agent will be conducted. DCTD is obligated to report any unauthorized use to Collaborator.
- Institution will grant to Collaborator, at Collaborator's expense, a royalty free exclusive or co-exclusive license to the inventions.

# Future Steps

- Draft IP Option revised in response to comments from:
  - Council on Government Relations (University Tech Transfer Representatives), Cooperative Groups, Phase 1/2 sites
- NCI/NIH review of proposed changes
- Federal Register announcement of changes with review/comment period
- Finalize and post new version on CTEP/DCTD website