



University of Chicago - Howard Hughes Medical Institute

PhD/MS Translational Training Program (TTP)

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Goals:

- Engage students in both biological and clinical research.
- Bridge the gap between specialized research and human disease processes.

Approach:

- Appropriate coursework
- Active learning
- Team project



Translational Training Program (TTP) elements:

- Genetic Basis of Personalized Medicine (CTSA)
- Major Human Diseases (CTSA)
- Neurobiology of Disease
- Essentials of Patient-Oriented Research (CTSA)
- Team Translational Research Project
- Ethics
- Translational Research and Outcomes Workshops (CTSA)
- Peer mentorship (after first year)
- Team coaches
- Program Sessions
- Thesis projects focused on human biology or disease processes leading to PhD
- Dual mentorship: Thesis advisor and a clinical faculty member
- Completion of TTP requirements leading to MS in Translational Science

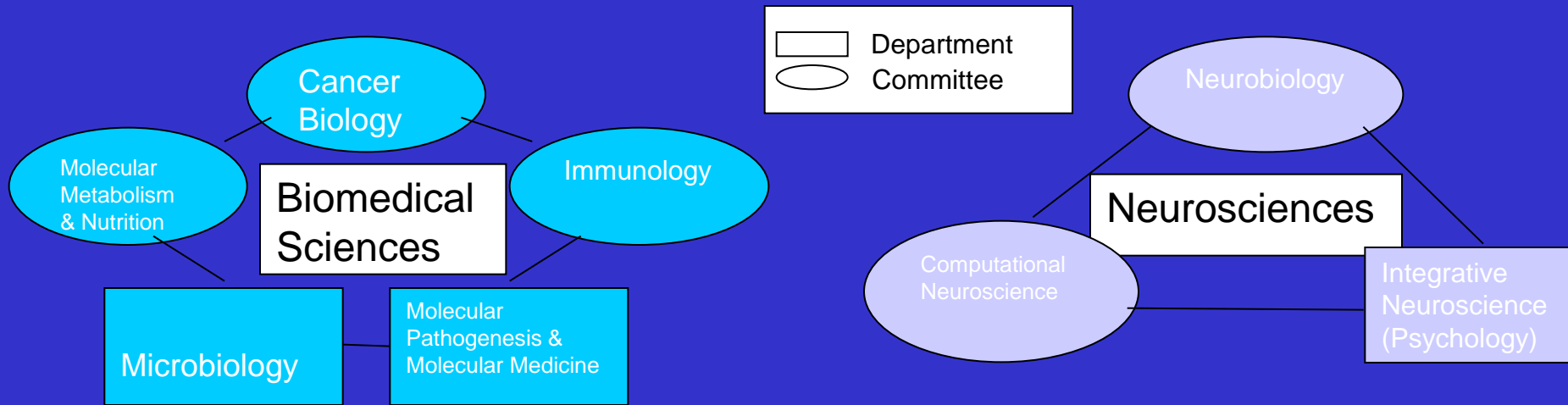


Student Participants

- Doctoral students in the eligible programs apply during their first year.
- Selection is based on academic performance, research experience and interests, and career goals.
- Program participants receive
 - supplements to current stipend levels
 - funds toward laboratory expenses (core facilities charges, statistical analysis, etc.)
 - funds for consumables
 - funds for conference registration and travel



Applicant Academic Units



Accepted:

- 2 students from Cancer Biology
- 2 students from Molecular Pathogenesis and Molecular Medicine
- 2 students from Neurobiology



Progress:

- Website and publicity materials developed.
- Recruitment and admission completed.
- Six students admitted (2CB, 2MPMM, and 2NB).
- Theme for initial TTP developed - mechanisms by which altered insulin homeostasis affects hippocampal cognitive functions.
 - Summer – Background lectures and team develops research plan for R01 level proposal.
 - Fall – Team develops pilot data in lab.
 - Winter – Clinical exposure to assess neurodevelopment and behavior in patients with monogenic diabetes treated with high doses of sulfonylureas.
 - Coached by neurologist and diabetologist with active research programs.



Evaluation:

- Evaluation representative designated.
- Initial interviews with each student
- Annual and exit interviews
- Track program graduates to assess long-term impact on translational research.