Smashing the Silo: Tips of Effective Collaborations between Basic & Clinical Scientists

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Why does a divide exist between basic and clinical research?

• In 1950-60’s, most research was performed by physician-scientists

• Explosion of molecular biology in the 1970’s revolutionized research creating a divide between clinical & basic research

• “Translational research” term first appeared in Pubmed in 1993 in pubs on BRCA1 and other cancer genes

• Basic science experimental expertise & assay development
• More time to devote to grants/manuscripts
• Flexibility
• Managing day-to-day experiments

• Frame research questions in a clinically impactful manner
• Clinical samples
• An understanding of the regulatory framework for human participants research
Different Cultures But Similar Goals

• Rapid decision when all info isn’t available vs. through evaluation of the data before judgement

• Adherence to accepted methods of diagnosis & therapy vs challenging paradigms

• Respect for hierarchical authority vs challenging authority

• Mistakes carry much greater weight in the clinic compared to the lab where breakthroughs can be made from mistakes/errors

• Time starved vs financially starved

• Inflexible schedule vs flexibility

• Formal vs informal
Common Misperceptions of the “Other Side”

Superiority complex
Impatient
Conservative
Skeptical & overly reluctant, indecisive
Clueless regarding clinical relevance
Dismissive of single clinical observations
Liberal
I’m just a set of hands
How to Find Collaborators

Grand Rounds Talks
Conferences
Seminars
Match-making through senior mentors

Networking events
BU profiles
Reaching out to leaders in the department
Effective Collaboration Requires

Trust
A shared vision/goal
Defined roles & responsibilities
Clear communication
Common language
Setting expectations
What data and how it will be shared
Sharing credit- define authorship
When Meeting in Person is a Challenge—Get Creative

• Document sharing
  *Google Docs, Microsoft Office Online, SharePoint, Zoho docs*

• Instant messaging

• Web-based screen sharing
  *Webex, GoToMeeting, Zoom, Adobe Connect*
Why should you collaborate with the “other side”?

New perspectives
Multi-PI NIH grants
Innovation
Greater impact
Rewarding