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OTA Office of Therapeutics Alliances

The Office of Therapeutics Alliances:

Accelerating Drug Discovery at NYU

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Legacy of success, notable NYU-licensed drugs:
Helping bringing in over ***$2.5B*** in license revenue



REMICADE
$11B Worldwide Sales

- Rheumatoid Arthritis
- Ulcerative Colitis
- Crohn's Disease
- Psoriasis
- Psoriatic Arthritis
- Ankylosing Spondylitis



SUTENT
$1.2B Worldwide Sales

- Kidney Cancer
- Stomach Cancer



ORACEA
$250M Worldwide Sales

- Rosacea



ZINECARD
~ $7M US Sales

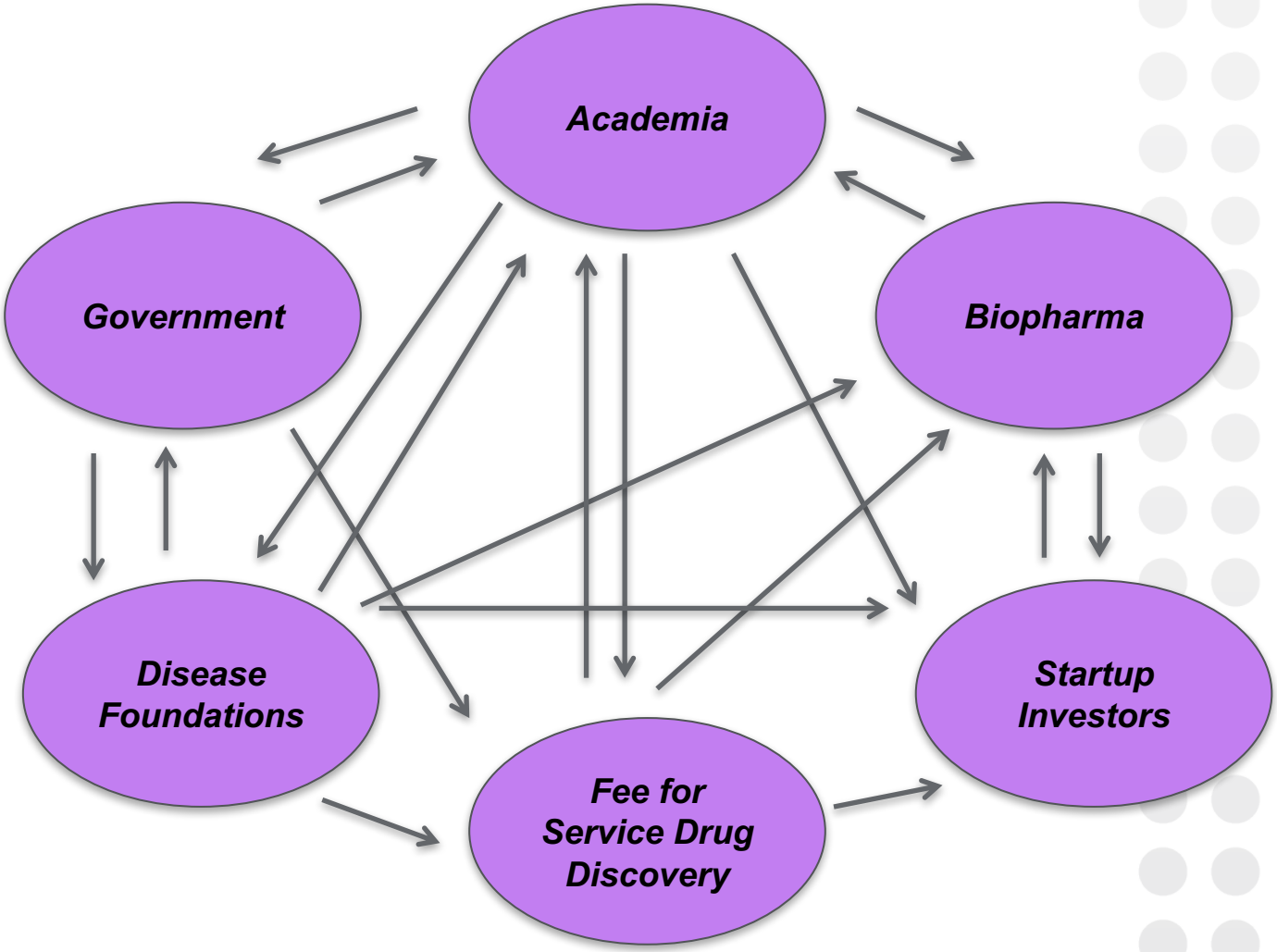
- Reduce chemotherapy side effects

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How do we advance the NEXT generation of NYU-discovered therapeutics?

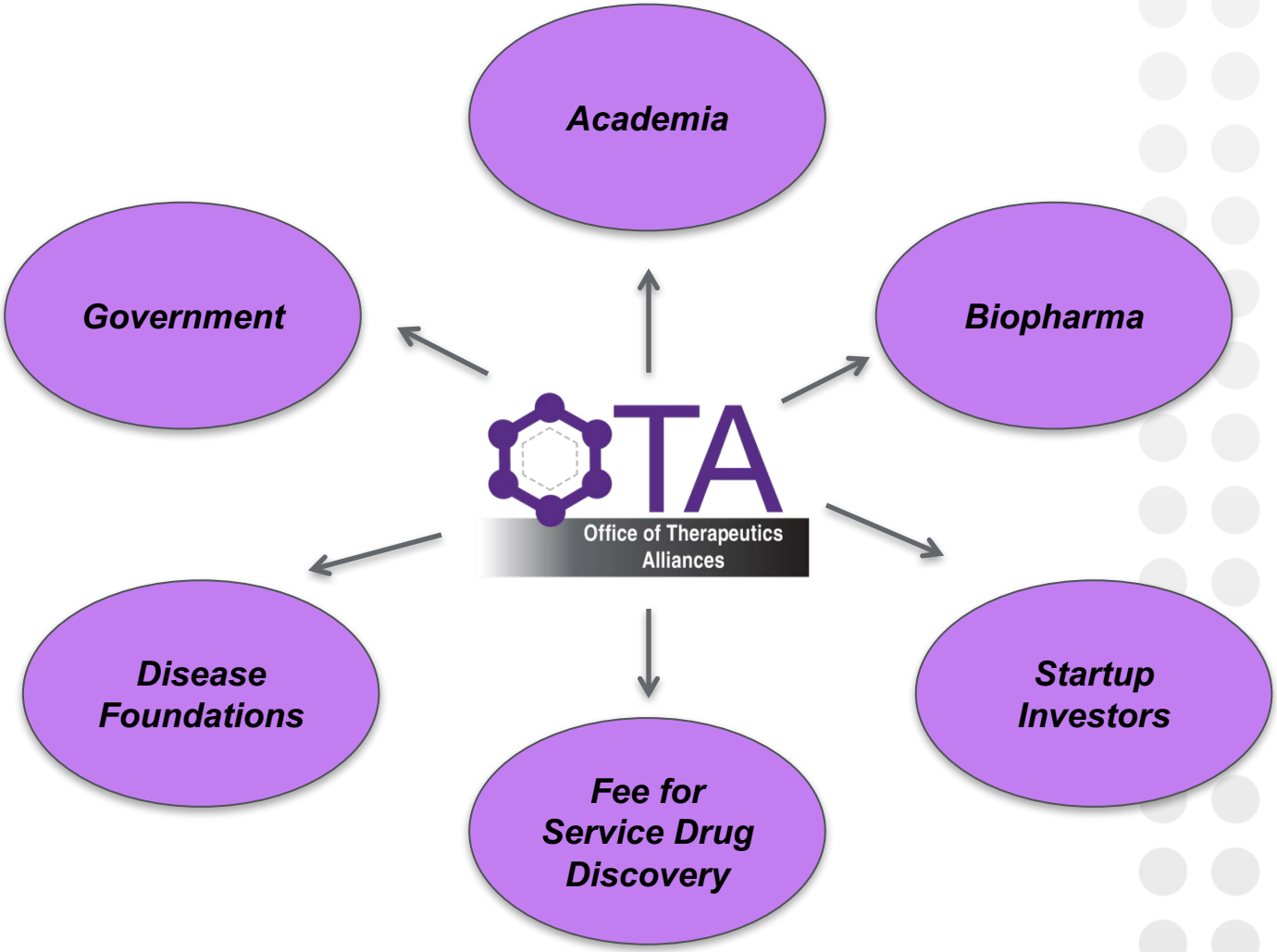
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The Evolving Drug Discovery Ecosystem: New Models



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NYU Office of Therapeutics Alliances (OTA): Aligning Strengths of Today's Drug Discovery Ecosystem



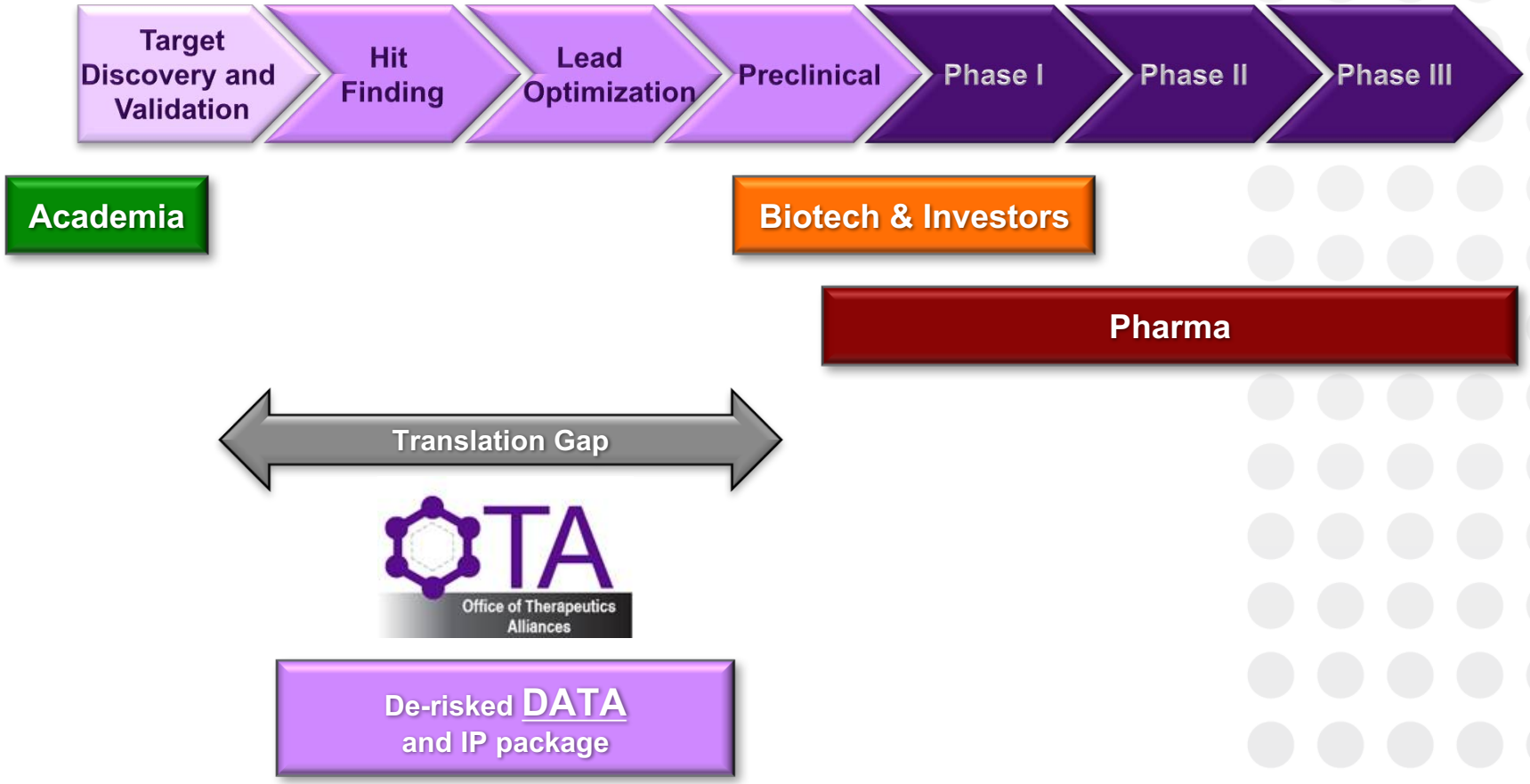
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Risk aversion by industry



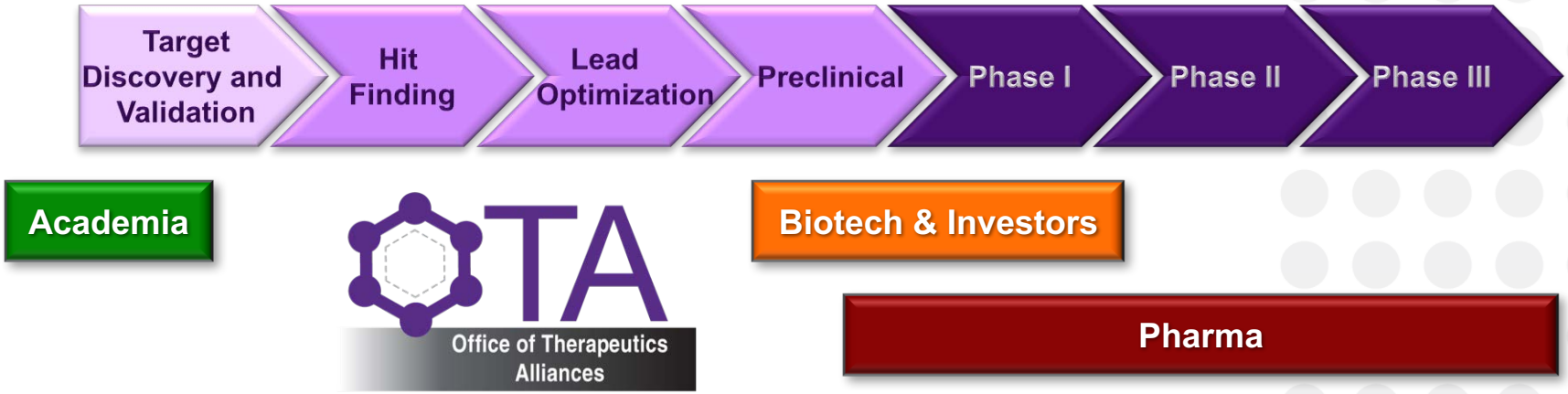
The NYU Office of Therapeutics Alliances (OTA):

De-risking drug discovery projects for investors, biopharma and disease foundations



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What are the critical elements required to efficiently de-risk academic projects to industry?



- *Ready and intimate access to promising discovery research* ☑
- *Flexibility and authority to initiate, advance and terminate projects* ☑
- *Project and alliance management* ☑
- *Access to diverse industry capabilities and expertise* ☑
- *Continuous alignment of scientific efforts with business and IP activities* ☑

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OTA Operates By Recognizing The Value Proposition of Academic Biomedical Research…And Its Limits

Academia Strengths	Industry Strengths
Novel Disease Biology	Compound Screening
Novel Platforms	Medicinal Chemistry
Clinical samples, biomarkers	DMPK
	SOPs

OTA is a university-wide "virtual biotech" program to harness external resources via CROs and Seasoned Biopharma Consultants:

- Industry grade drug discovery capabilities and expertise
- Flexible, specialized and customized partners
- Third party validation

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OTA External Advisory Board



David McElligott, PhD,
CSO, Petra Pharma



Dennis J. Purcell Senior
Managing Partner,
Aisling Capital



Brian Gallagher, PhD,
Partner, SR One Ltd.



Susan Froshauer, PhD,
President & CEO,
Connecticut United for
Research Excellence (CURE)



Francois Nader, MD
Chairman of the Board,
Acceleron Pharma



Satish Jindal, PhD
CEO, Allied Minds-Bristol



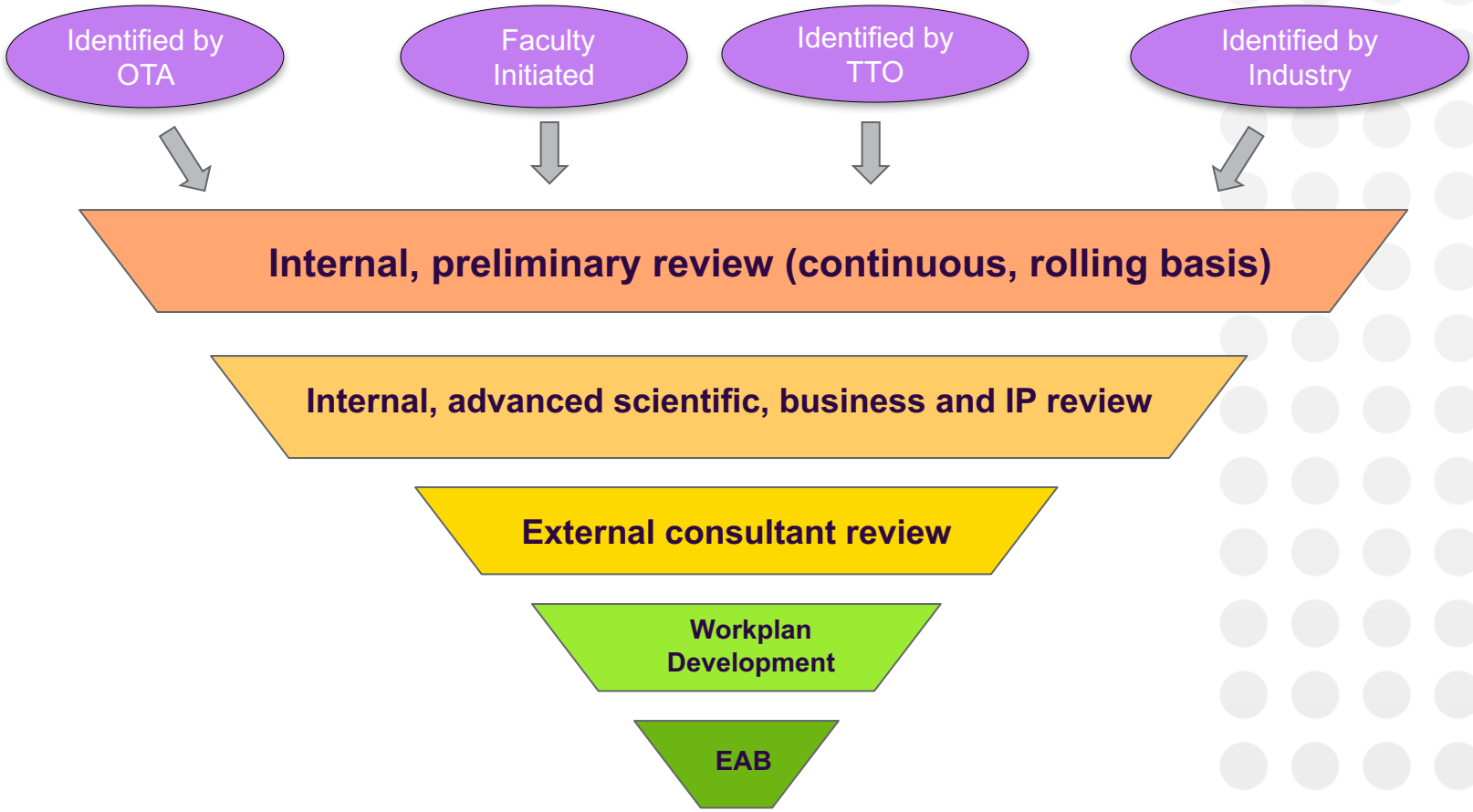
Jeanne Magram, PhD
CSO, Northern Biologics



Steven Squinto, PhD
Venture Partner, Orbimed

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OTA Decision Tree



Milestone-driven workplan funded + alliance managed + ongoing business development



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Current Active Pipeline, 10/2017

Project	Area: Target	Target Discovery	Target Validation	Hit Finding	Lead Optimization
NYUF-SF	**Immuno-Oncology, Other Indications:** Identification of ion channels and transporters modulating immune responses for multiple pathologies (***Under Option with Undisclosed Partner***)				
NYUF-JL	**Immuno-Oncology, NSCLC:** Identification of novel, druggable T-reg oncotargets				
NYUF-VT	**Antibacterials**: Identification of leukocidal toxins of Gram-negative bacteria				
NYUF-EH	**Melanoma:** Identification of druggable regulators of oncogenic miR-7				
NYUF-DL	**Neuroinflammation:** Confidential Targets				
NYU018	**Lupus:** DNAse1L3				
NYU023	**Multiple Cancers:** Vaccinia-based Oncolytic Virus Platform				
NYUF-ES	**Immuno-Oncology:** Confidential Target (***Under Option with Undisclosed Partner***)				
NYU025	**Multiple Cancers:** NFS1				
NYU013	**Osteolysis, Other Inflammation:** Netrin-1 (***Co-development with LifeArc, a nonprofit***)				
NYU017	**Antibacterials:** M. tuberculosis, Dop				
NYUF-SS	**Immuno-Oncology:** Confidential Target (***Under Option with Undisclosed Partner***)				
NYU024	**Leukemia:** TET2				
NYU009	**Relapsing Leukemia:** Mutant NT5C2				
NYU014	**Glioblastoma:** GPR133 (***Co-development with Heptares Therapeutics***)				
NYU001	**Diabetic Vascular Complications, Other Inflammation, Neurodegenerative:** RAGE				
NYU007	**Demyelinating diseases:** Gli-1				
NYU016	**Multiple Cancers:** Confidential Target (***Co-development with Undisclosed Partner***)				
NYU006	**Melanoma:** ETBR				
NYU011	**CRPC:** Multivalent Agents Targeting Androgen Receptor				
NYU022	**Antibacterials:** Antibiotic Potentiation by Targeting H2S				

Metrics since inception in Fall 2013:

- Worked on 30 projects in various stages
- 9 projects successfully exited to industry (pharma, startups) including 2 co-development projects
- > $9M raised to date in ***supplemental*** research funding from government and nonprofit sources
- 5 papers published on supported research, 1 currently under review

OTA Project Deal Examples:

Project NYU012

Repare Therapeutics Raises US$68 Million Series A

Projects NYU019 NYU020

Boston's **PureTech** Gives Birth to New Biotech and Its Name is **Nybo Therapeutics**

Project NYU008

Allied-Bristol Life Sciences Launches iβeCa Therapeutics from NYU School of Medicine to Develop Novel Cancer Therapeutics Targeting the Wnt Pathway

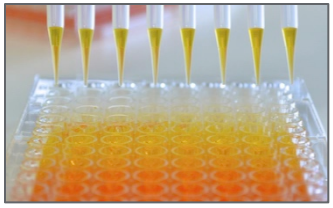
Project NYU14

Heptares Enters a New Research and Drug Discovery Collaboration Under its "Orbit" Initiative With New York University School of Medicine

Project NYU16 ***Startup, Angel Investor, Stealth Mode***

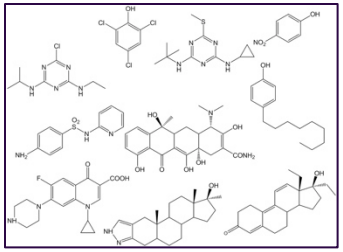
Project NYU21 ***Startup, Venture Capital, Stealth Mode***

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THANK YOU!

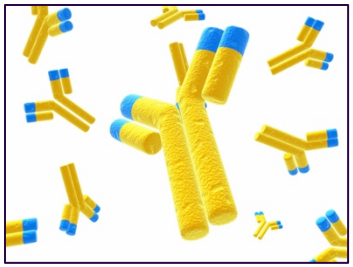




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http://www.nyulmc.org/ota







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