

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION**
Washington, D.C. 20549

FORM 8-K

**CURRENT REPORT
Pursuant to Section 13 OR 15(d)
of The Securities Exchange Act of 1934**

Date of Report (Date of earliest event reported): November 10, 2021

Recursion Pharmaceuticals, Inc.
(Exact name of registrant as specified in its charter)

Delaware
(State or other jurisdiction of incorporation or organization)

001-40323
(Commission File Number)

46-4099738
(I.R.S. Employer Identification No.)

41 S Rio Grande Street
Salt Lake City, UT 84101
(Address of principal executive offices) (Zip code)

(385) 269 - 0203
(Registrant's telephone number, including area code)

Not Applicable
(Former name or former address, if changed since last report.)

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions:

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
- Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
- Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
- Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

Securities registered pursuant to Section 12(b) of the Act:

Title of each class	Trading symbol(s)	Name of each exchange on which registered
Class A Common Stock, par value \$0.00001 per share	RXRX	Nasdaq Global Select Market

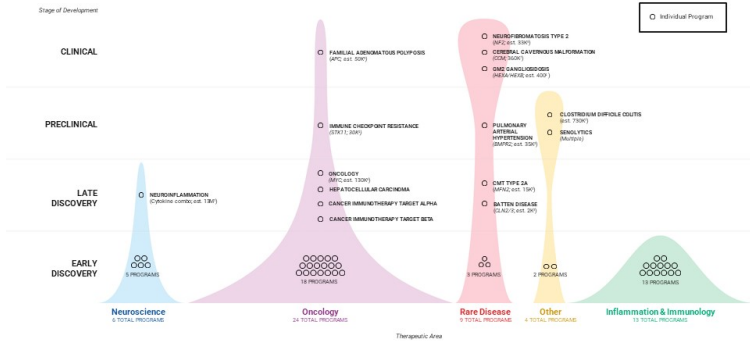
Indicate by check mark whether the registrant is an emerging growth company as defined in Rule 405 of the Securities Act of 1933 or (§230.405 of this chapter) or Rule 12b-2 of the Securities Exchange Act of 1934 (§240.12b-2 of this chapter).

Emerging growth company X

Recursion Provides Business Updates and Reports Third Quarter 2021 Financials

- Received Fast Track Designation for REC-2282, a potential treatment for NF2 meningiomas, and expect to enroll the first patient in a Phase 2/3 trial in early 2022
- Advanced REC-994, a potential treatment for CCM, and now expect to enroll the first patient in a phase 2 trial in early 2022
- Received Orphan Drug Designation from the FDA for REC-4881, a potential treatment for FAP, and expect to enroll the first patient in a Phase 2 trial in the first half of 2022
- Continued to advance multiple simultaneous discovery programs in fibrosis with Bayer
- Accelerated investment in the industrialization of chemistry to complement its longstanding work to decode biology

SALT LAKE CITY, November 10, 2021 — Recursion (Nasdaq : RXXR), a clinical-stage biotechnology company decoding biology by integrating technological innovations across biology, chemistry, automation, data science, and engineering, today reported business updates and financial results for its third quarter ending September 30, 2021.



EGS is defined as France, Germany, Italy, Spain and the UK. (1) Our program has the potential to address a number of indications within neuroinflammation, including multiple neurodegenerative diseases including at least 1.2 million patients in the US and EGS. (2) 7,30,000 annual incidence in US and EGS. (3) Annual US and EGS prevalence. (4) Worldwide prevalence. (5) Annual US and EGS incidence for all NF2-driven meningiomas. (6) Our program has the potential to address a number of indications driven by MHC interactions, including 120,000 patients in the US and EGS annually. We have not finished a target product profile for a specific indication. (7) Hereditary oral squamous squamous carcinoma.

“In Q3, our team made progress towards our vision to industrialize drug discovery. We are now harvesting the efforts of the past few years to build a map of human cellular biology through the continued refinement and increased usage of our inference-based approach to drug discovery. With the power of our Recursion Map illuminating new and exciting relationships in biology, we are now deeply focused on extending our chemistry capabilities to significantly improve, scale and speed up new chemical entity development to address the plethora of novel biological relationships we are discovering,” said Recursion Co-Founder & CEO Chris Gibson, Ph.D. “In addition, our rapidly growing development team is preparing for our four clinical-stage programs to initiate Phase 2 or Phase 2/3 studies in the first half of 2022, including two of the programs

that we expect will enroll their first patients in early 2022. To facilitate our broad ambition, we continue to rapidly grow our workforce while nurturing Recursion's culture and community."

Recursion finished the third quarter of 2021 with a portfolio of 4 clinical stage programs, 4 preclinical programs, 7 late discovery programs, and 41 early discovery programs. Additionally, Recursion continued scaling the total number of executed phenomic experiments to approximately 95 million, the size of its proprietary data universe to over 11 petabytes, and the number of biological inferences to approximately 200 billion. Data have been generated on the Recursion OS across 38 human cell types, an in-house chemical library of over 717 thousand compounds, and an *in silico* library of 12 billion small molecules, by a growing team of more than 330 Recursionauts that is balanced between life scientists and computational and technical experts.

Summary of Business Highlights

- **Clinical Programs**
 - **Neurofibromatosis type 2 (NF2) (REC-2282):** In early October, we received Fast Track Designation for REC-2282 from the FDA for the potential treatment of NF2 meningiomas. We plan to initiate a parallel group, two stage, Phase 2/3, randomized, multicenter study in early 2022.
 - **Cerebral cavernous malformation (CCM) (REC-994):** We plan to initiate a Phase 2, double-blind, placebo-controlled safety, tolerability and exploratory efficacy study of this candidate in early 2022.
 - **Familial adenomatous polyposis (FAP) (REC-4881):** In September we received Orphan Drug Designation for REC-4881 from the FDA for the potential treatment of Familial Adenomatous Polyposis. We plan to initiate a Phase 2, randomized, double-blind, placebo-controlled study to evaluate safety, pharmacokinetics, and efficacy in the first half of 2022.
 - **GM2 gangliosidosis (REC-3599):** We plan to initiate a Phase 2 study of this candidate in the first half of 2022.
- **Preclinical Programs**
 - **Clostridium difficile colitis (REC-3964):** We expanded our medicinal chemistry team and digital chemistry tools and made progress in IND-enabling studies for REC-3964, which is the most advanced New Chemical Entity developed by the Recursion OS.
- **Bayer AG Partnership:** We continue to advance our collaboration with Bayer to discover small molecule drug candidates with the potential to treat fibrotic diseases. We have multiple programs progressing simultaneously with our partner.
- **Recursion OS**
 - **Biological Contexts:** We advanced our capabilities to model diseases in multiple biological contexts, including new types of biological perturbations beyond CRISPR-based knockouts, complex cell type onboarding, and organoid model systems. Moreover, we made progress on multiple maps in iPSC-derived neural cell types.
 - **Mechanisms of Action:** We improved our computational methods to identify mechanisms of action and used this technology to increase our ability to screen out compounds with potentially toxic effects for multiple programs earlier than is possible with traditional approaches. We believe that such methods will better enable us to advance the most promising novel chemical compounds through discovery.

- **Transcriptomics Validation:** We made significant improvements to our transcriptomics protocols to enable increases in throughput. Additionally, we have been optimizing our ability to use transcriptomics signatures for compound characterization.
- **Facilities and Manufacturing:** We continued to make progress in expanding our current headquarters and creating a chemistry, manufacturing and controls (CMC) site in Salt Lake City. These spaces are designed with flexibility in mind to enable next generation automated workflows and instruments for compound, tissue culture, and biobank management to further industrialize the drug discovery and development process.

Third Quarter 2021 Financial Results

- **Cash Position:** Cash, cash equivalents and investments were \$578.9 million as of September 30, 2021.
- **Revenue:** Total revenue, consisting primarily of revenue from collaborative agreements, was \$2.5 million for the third quarter of 2021, compared to \$1.0 million for the third quarter of 2020. The increase was due to revenue recognized from our collaboration with Bayer.
- **Research and Development Expenses:** Research and development expenses were \$33.2 million for the third quarter of 2021, compared to \$16.5 million for the third quarter of 2020. The increase in research and development expenses was primarily due to an increased number of experiments run on the Recursion OS, an increased number of assets being validated, and increased clinical costs as studies progressed.
- **General and Administrative Expenses:** General and administrative expenses were \$15.7 million for the third quarter of 2021, compared to \$7.0 million for the third quarter of 2020. The increase in general and administrative expenses was due to the growth in size of the company's operations, including an increase in salaries and wages of \$3.7 million, equipment costs, human resources-related costs, facilities costs and other administrative costs associated with operating a high-growth company.
- **Net Loss:** Net loss was \$47.4 million for the third quarter of 2021, compared to a net loss of \$23.9 million for the third quarter of 2020.

Additional Corporate Updates

- **Operations in Canada:** Jordan Christensen joined Recursion as Vice President, Engineering and also became our Toronto Site Lead. Additionally, we opened our Montreal office and hired multiple machine learning research scientists.
- **Translational Biology:** Alison O'Mahony, Ph.D., joined Recursion as Vice President, Discovery Platform and will be responsible for continued scaling and improvement of Recursion's orthogonal validation and bespoke validation assays to continue driving down the time from initial discovery to clinical development. Dr. O'Mahony previously served as Vice President, Translational Biology at Eurofins Discovery.
- **Information Security:** Ganesh Jagannathan joined Recursion as Chief Information Security Officer & Vice President, Information Technology and will be responsible for all strategic, innovative and operational aspects of Information Security and Information

Technology. Mr. Jagannathan previously served as Chief Information Security Officer at Jazz Pharmaceuticals.

- **CEO Rule 10b5-1 Plans:** Chris Gibson, Ph.D., the company's Co-Founder and CEO, established personal stock trading plans in the second quarter of 2021 in accordance with Rule 10b5-1 under the Securities and Exchange Act of 1934 and Recursion's insider trading policy. Under the plans, all outstanding stock options may be exercised and we anticipate shares representing up to approximately 4% of Dr. Gibson's holdings may be sold or transferred to donor-advised philanthropic funds. We anticipate the Rule 10b5-1 transactions may take place over the next 13 months. Any such transactions will be disclosed through public filings as required by the SEC.

About Recursion

Recursion is a clinical-stage biotechnology company decoding biology by integrating technological innovations across biology, chemistry, automation, machine learning, and engineering. Our goal is to radically improve the lives of patients and industrialize drug discovery. Central to our mission is the Recursion Operating System, which combines an advanced infrastructure layer to generate what we believe is one of the world's largest and fastest-growing proprietary biological and chemical datasets. We combine that with the Recursion Map, a suite of custom software, algorithms, and machine learning tools that we use to explore foundational biology unconstrained by human bias and navigate to new biological insights. We are a biotechnology company scaling more like a technology company. Learn more at www.Recursion.com, or connect on [Twitter](#) and [LinkedIn](#). Recursion is also a founding member of BioHive, the Utah life sciences industry collective.

Contact

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Condensed Consolidated Statements of Operations

Recursion Pharmaceuticals, Inc.
Condensed Consolidated Statements of Operations (unaudited)
(in thousands, except share and per share amounts)

	Three months ended		Nine months ended	
	September 30,		September 30,	
	2021	2020	2021	2020
Revenue				
Grant revenue	\$ 34	\$ 163	\$ 145	\$ 409
Operating revenue	2,500	862	7,500	862
Total revenue	2,534	1,025	7,645	1,271
Operating expenses				
Research and development	33,246	16,535	86,979	42,621
General and administrative	15,690	6,964	38,481	17,684
Total operating expenses	48,936	23,499	125,460	60,305
Loss from operations	(46,402)	(22,474)	(117,815)	(59,034)
Other loss, net	(1,026)	(1,399)	(3,731)	(2,206)
Net loss	\$ (47,428)	\$ (23,873)	\$ (121,546)	\$ (61,240)
Per share data				
Net loss per share of Class A and B common stock, basic and diluted	\$ (0.28)	\$ (1.09)	\$ (1.10)	\$ (2.82)
Weighted-average shares (Class A and B) outstanding, basic and diluted	168,533,550	21,817,900	110,513,231	21,704,008

Condensed Consolidated Balance Sheets

Recursion Pharmaceuticals, Inc.
Condensed Consolidated Balance Sheets (unaudited)
(in thousands)

	September 30, 2021	December 31, 2020
Assets		
Current assets		
Cash and cash equivalents	\$ 394,721	\$ 262,126
Restricted cash	10,233	5,041
Accounts receivable	34	156
Other receivables	2,248	—
Investments	184,189	—
Other current assets	9,445	2,155
Total current assets	600,870	269,478
Property and equipment, net	55,439	25,967
Intangible assets, net	2,262	2,490
Other non-current assets	35	650
Total assets	\$ 658,606	\$ 298,585
Liabilities, convertible preferred stock and stockholders' equity (deficit)		
Current liabilities		
Accounts payable	\$ 6,326	\$ 1,074
Accrued expenses and other liabilities	25,113	10,485
Current portion of unearned revenue	10,000	10,000
Current portion of notes payable	88	1,073
Current portion of lease incentive obligation	1,416	467
Total current liabilities	42,943	23,099
Deferred rent	3,348	2,674
Unearned revenue, net of current portion	9,167	16,667
Notes payable, net of current portion	656	11,414
Lease incentive obligation, net of current portion	3,460	2,708
Total liabilities	59,574	56,562
Commitments and contingencies		
Convertible preferred stock	—	448,312
Stockholders' equity (deficit)		
Common stock (Class A and B)	2	—
Additional paid-in capital	934,175	7,312
Accumulated deficit	(335,147)	(213,601)
Accumulated other comprehensive income	2	—
Total stockholders' equity (deficit)	599,032	(206,289)
Total liabilities, convertible preferred stock and stockholders' equity (deficit)	\$ 658,606	\$ 298,585

Forward-Looking Statements

This document contains information that includes or is based upon "forward-looking statements" within the meaning of the Securities Litigation Reform Act of 1995, including, without limitation, those regarding Recursion's mission; early and late stage discovery, preclinical, and clinical programs; collaborations; prospective products and their future indications and market opportunities; Recursion OS and other technologies; expansion of facilities and expected uses; workforce growth; employee stock trading plans; business and financial performance; and all other statements that are not historical facts. Forward-looking statements may or may not include identifying words such as "plan," "will," "expect," "anticipate," "intend," "believe," "potential," "continue," and similar terms. These statements are subject to known or unknown risks and uncertainties that could cause actual results to differ materially from those expressed or implied in such statements, including but not limited to: challenges inherent in pharmaceutical research and development, including the timing and results of preclinical and clinical programs, where the risk of failure is high and failure can occur at any stage prior to regulatory approval due to lack of sufficient efficacy, safety considerations, or other factors; our ability to leverage and enhance our drug discovery platform; our ability to obtain financing for development activities and other corporate purposes; the success of our collaboration activities; our ability to obtain regulatory approval of, and ultimately commercialize, drug candidates; the impact of the COVID-19 pandemic; our ability to obtain, maintain, and enforce intellectual property protections; cyberattacks or other disruptions to our technology systems; our ability to attract, motivate, and retain key employees and manage our growth; and other risks and uncertainties described under the heading "Risk Factors" in our filings with the U.S. Securities and Exchange Commission, including our most recent Quarterly Report on Form 10-Q. All forward-looking statements are based on management's current estimates, projections, and assumptions, and Recursion undertakes no obligation to correct or update any such statements, whether as a result of new information, future developments, or otherwise, except to the extent required by applicable law.



Decoding Biology To Radically Improve Lives

End of Q3 2021



Forward-Looking Statements

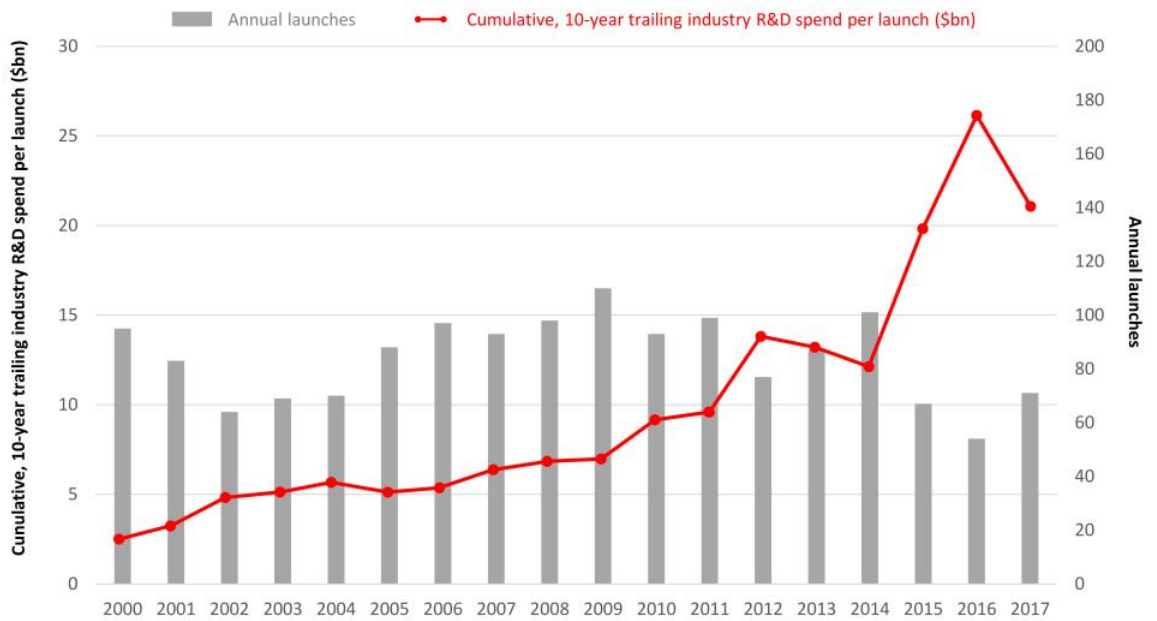
This presentation and any accompanying discussion or documents may contain information that includes or is based upon "forward-looking statements" within the meaning of the Securities Litigation Reform Act of 1995. These forward-looking statements are based on our current expectations, estimates and projections about our industry, management's beliefs and certain assumptions we have made. They are neither historical facts nor assurances of future performance, are subject to significant risks and uncertainties, and may turn out to be wrong. For a discussion of factors that could affect our business, please refer to the "Risk Factors" sections in our Prospectus filed with the SEC on April 16, 2021 and in our periodic filings with the SEC. This presentation does not purport to contain all the information that may be required to make a full analysis of the subject matter. We undertake no obligation to correct or update any forward-looking statements.

Technology is disrupting many aspects of our lives...



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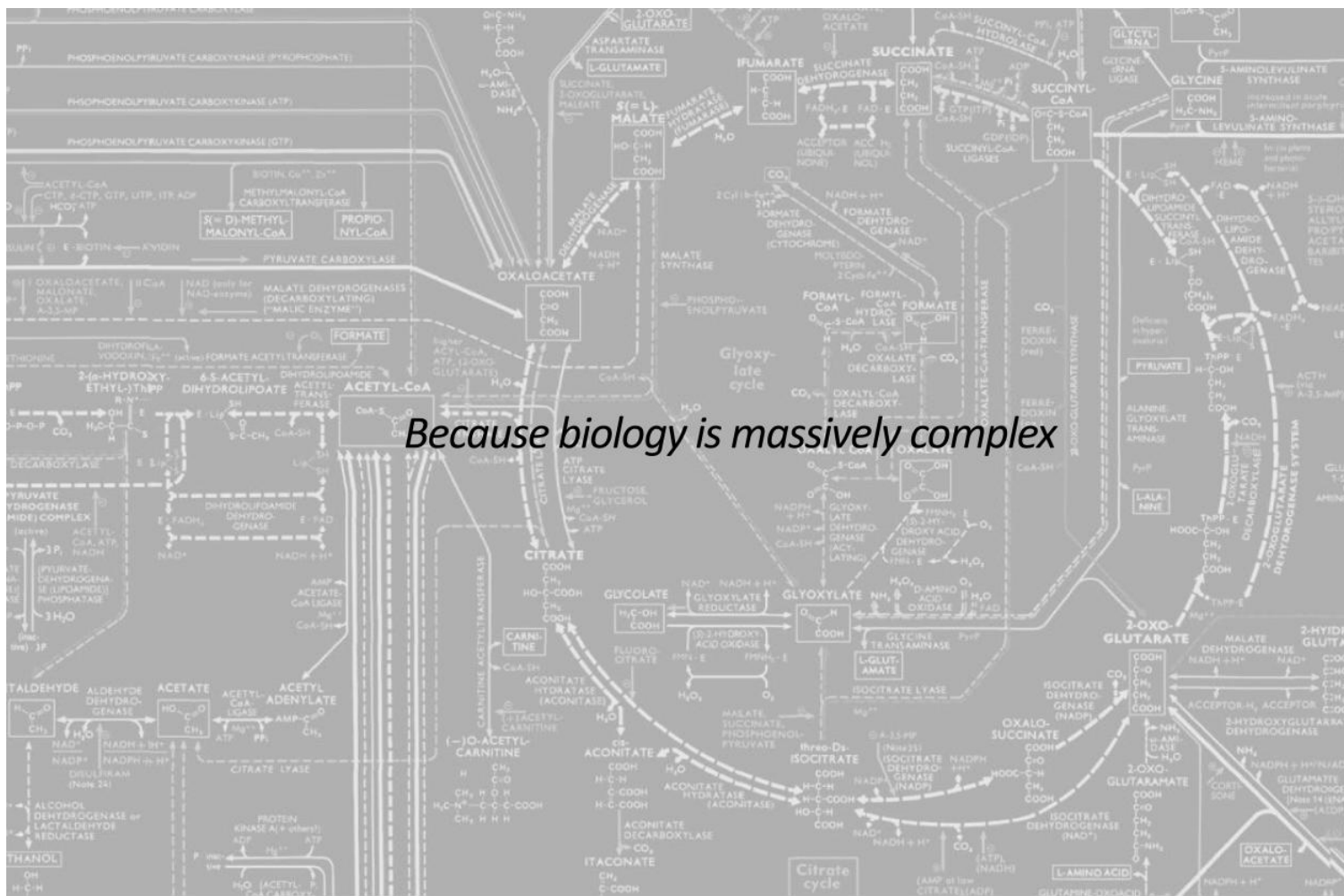
... but in biopharma, we see a decades long trend of increasing costs



About 90% of clinical trials fail and it takes about 14 years and \$2B of R&D for each new drug approval

Source: based on EvaluatePharma. Analysis is not inflation-adjusted. Analysis is not restricted to novel molecules, though it does exclude generics.

Why have we not seen the same scale of improvements in drug discovery and development efficiency?



This diagram illustrates the intricate metabolic pathways of the Citrate cycle and Glyoxylate cycle. The Citrate cycle is a central metabolic pathway that converts Acetyl-CoA into CO₂ and H₂O. The Glyoxylate cycle is a bypass of the Citrate cycle, allowing for the net conversion of two Acetyl-CoA molecules into Malate.

Citrate Cycle Pathway:

- Acetyl-CoA + Oxaloacetate → Citrate (via Citrate synthase)
- Citrate → Isocitrate (via Citrate isomerase)
- Isocitrate → α-Ketoglutarate (via Isocitrate dehydrogenase)
- α-Ketoglutarate → Succinyl-CoA (via α-Ketoglutarate dehydrogenase)
- Succinyl-CoA → Succinate (via Succinyl-CoA synthetase)
- Succinate → Fumarate (via Succinate dehydrogenase)
- Fumarate → Malate (via Fumarate hydratase)
- Malate → Oxaloacetate (via Malate dehydrogenase)

Glyoxylate Cycle Pathway:

- Two Acetyl-CoA molecules → Citrate (via Citrate synthase)
- Citrate → Isocitrate (via Citrate isomerase)
- Isocitrate → Glyoxylate (via Isocitrate lyase)
- Glyoxylate + Acetyl-CoA → Malate (via Malate synthase)

The diagram also shows the conversion of Acetyl-CoA to Citrate and the subsequent steps of the Citrate cycle. The Glyoxylate cycle is shown as a bypass of the Citrate cycle, allowing for the net conversion of two Acetyl-CoA molecules into Malate.

Exponential improvements in tools and technology are converging to enable less biased systems biology approach to industrialize drug discovery

Bio Tools



Tools like CRISPR allow CONTROL of Biology

Automation



Automation tools enable massive scale

Storage



1M-Fold Decrease In Costs over 40 years

Compute



1M-Fold Increase in Compute over 40 years

AI



Expert Systems given way to Modern AI

~95M

Proprietary experiments in human cells conducted in our own laboratories

38

Human cell types onboarded to our high throughput phenomics platform and hundreds of cell types/lines in-house for validation assays

11PB+

At >11 petabytes, one of the largest proprietary biological and chemical datasets

~200B

Inferred relationships between human genes, chemical compounds and more using our Map of biology

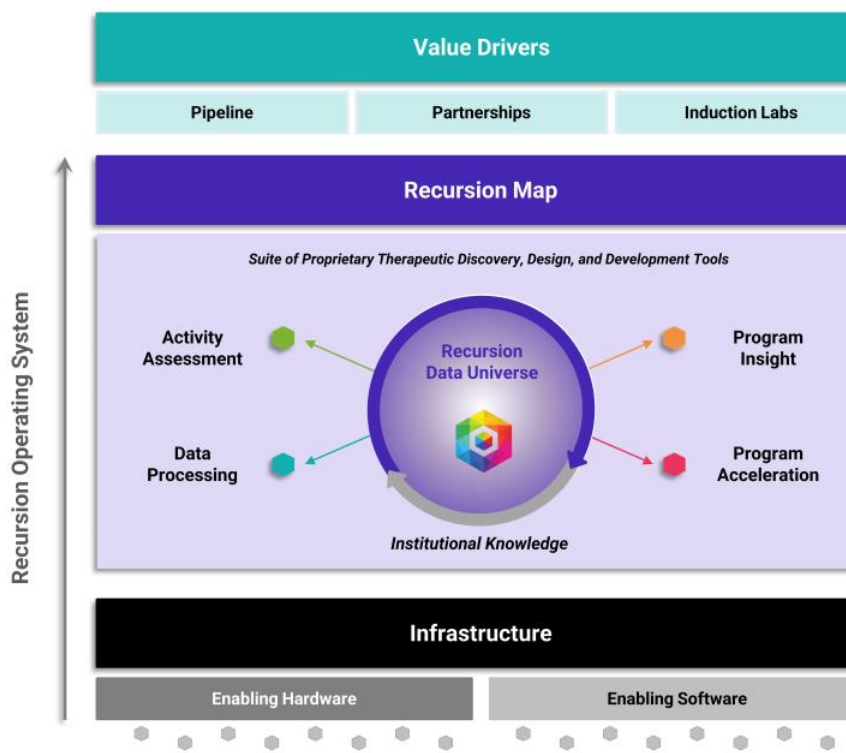
The Recursion Operating System for industrializing drug discovery

An integrated, multi-faceted system for generating, analyzing, and deriving insight from massive biological and chemical datasets to industrialize drug discovery.

It is composed of:

- **Infrastructure Layer**
- **Recursion Data Universe**
- **Recursion Map**

...and held together by our *People and Culture*



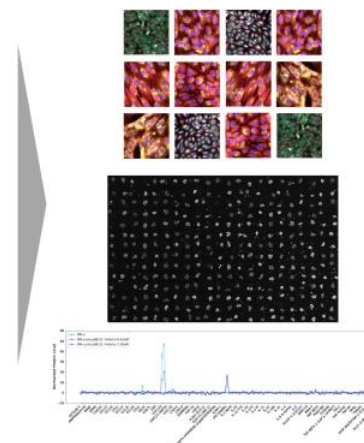
Our OS enables highly scalable, unbiased exploration of biology across multi-omics technologies, with phenomics (images) as a foundation...



Recursion in-house software to design, manage and execute experiments



Execute up to 1.7 million experiments each week in highly automated laboratories



Generate high-dimensional data including *phenomics*, *proteomics*, *transcriptomics*, and more at scale

...and new investments in computational infrastructure and digital chemistry demonstrate we are scaling our technology stack



We have more data flux to the cloud than the  firehose

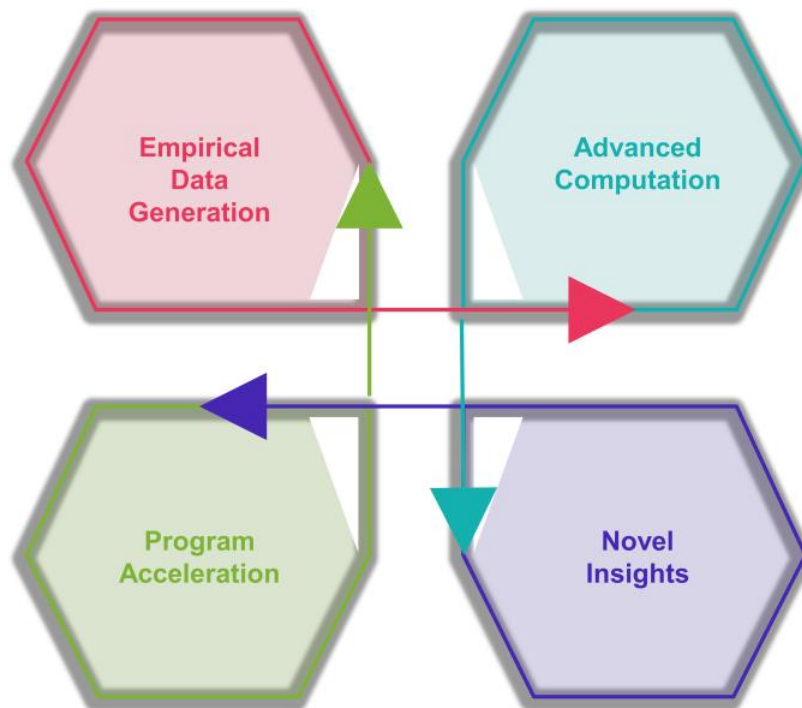


Over 11 PB of data served to scientists using Recursion software to generate insights

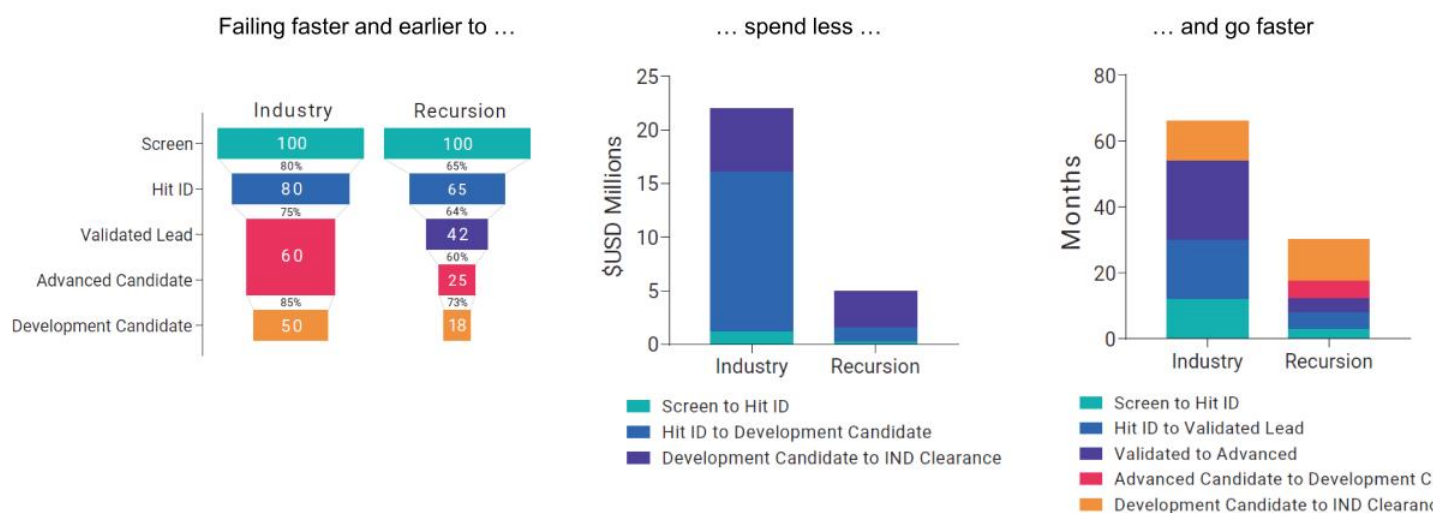


In-house digital chemistry tools *in silico* screen 12 billion molecules

Our OS learns and grows thanks to a virtuous cycle of wet-lab and dry lab side by side

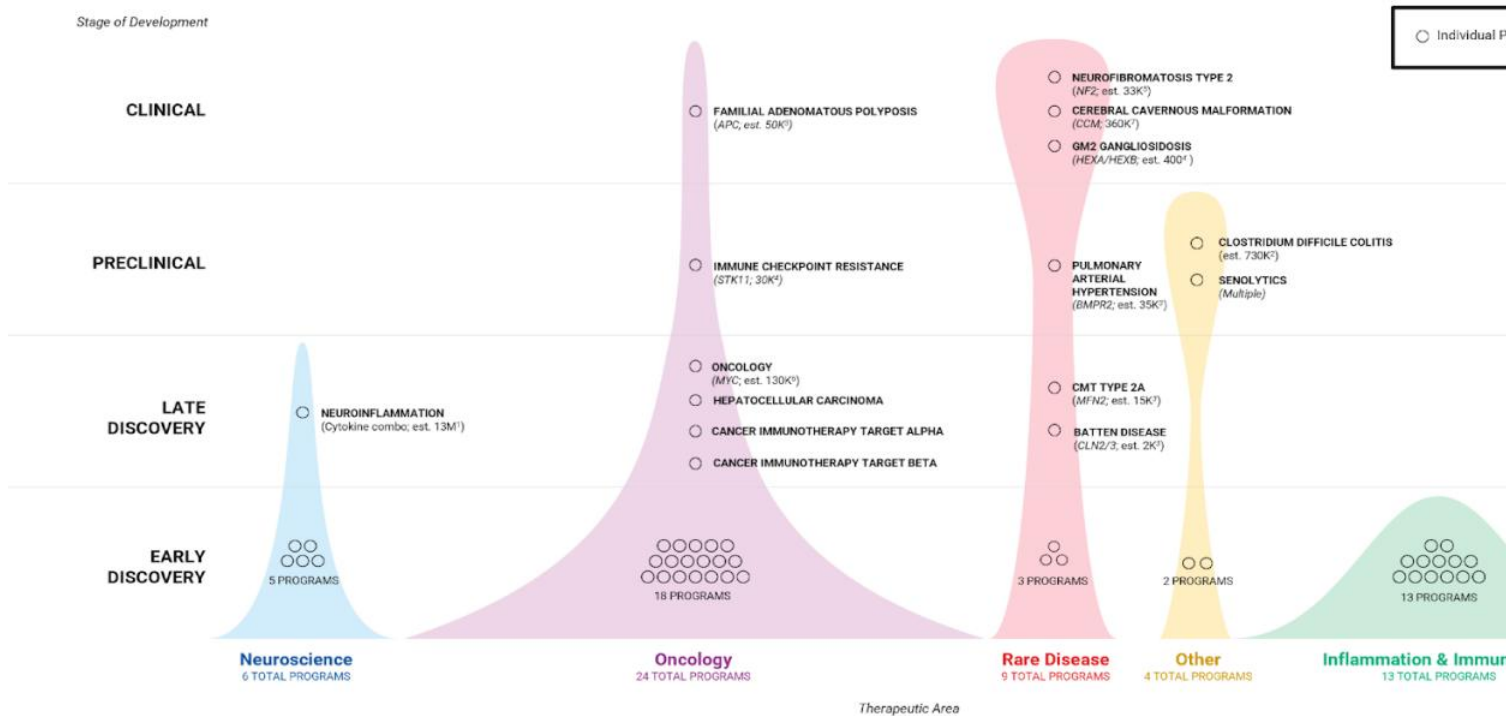


We are demonstrating meaningful leading indicators of industrializing drug discovery and development



Data shown is the average of all our programs since late 2017. All industry data adapted from Paul, et al. Nature Reviews Drug Discovery. (2010) 9, 203-214

The power of the Recursion OS is demonstrated by the scale and breadth of active research and development programs



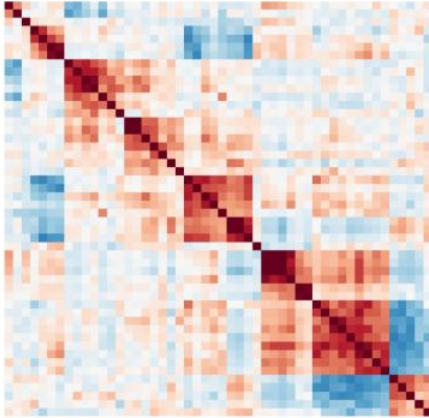
EUS is defined as France, Germany, Italy, Spain and the UK. (1) Our program has the potential to address a number of indications within neuroinflammation, including multiple neurodegenerative diseases totalling at least 13 million patients in EUS. (2) 730,000 annual incidence in US and EUS. (3) Annual US and EUS prevalence (4) Worldwide prevalence (5) Annual US and EUS incidence for all NF2-driven meningiomas. (6) Our program has the potential to address a number of indications for MYC alterations, totalling 120,000 patients in the US and EUS annually. We have not finalized a target product profile for a specific indication. (7) Hereditary and sporadic symptomatic population.

Choose Your Own Adventure:

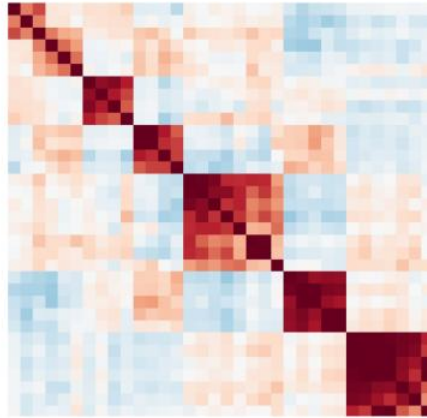
We are transforming drug discovery into a search problem

Using **~95M proprietary experiments**, we can algorithmically infer **~200B biological relationships** across the human genome, 100s of thousands of compounds and soluble factors to explore many therapeutic areas for novel targets, compounds and mechanisms:

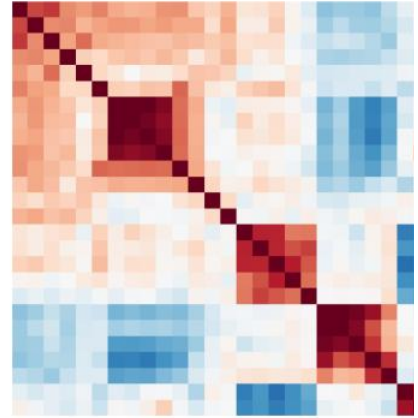
Oncology



Neuroscience



Immunology

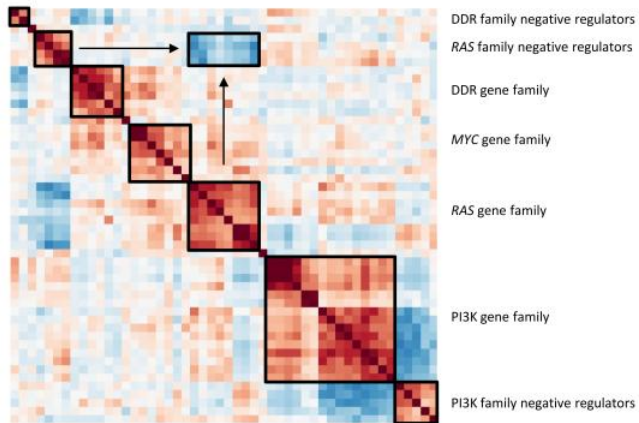


Oncology:

Known oncology pathways cluster together as expected

Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS

Oncology



Multiple oncology pathways cluster independently demonstrating ability to identify known biology, including negative regulators in the same pathway

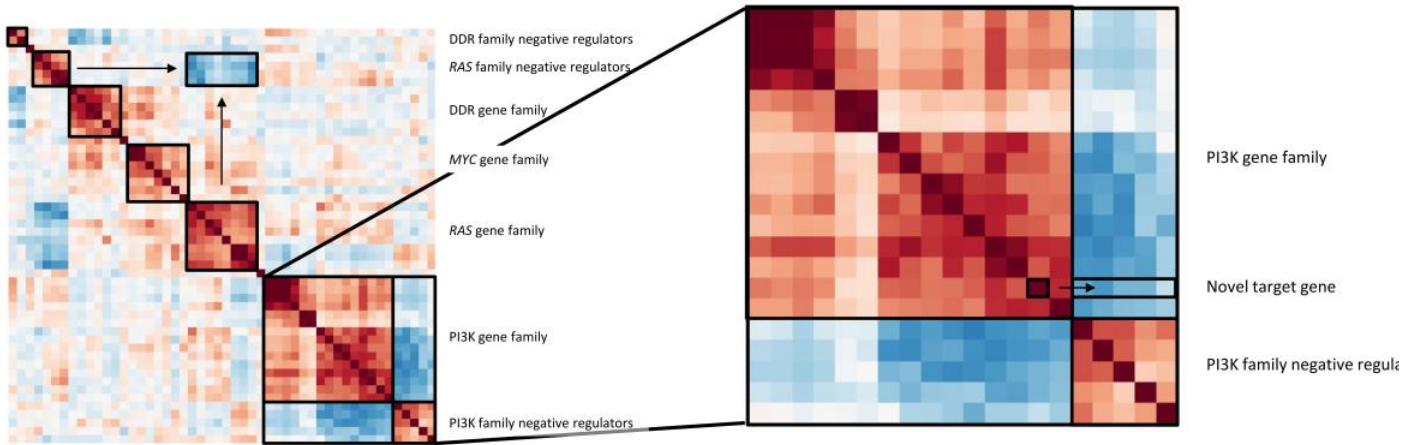


Oncology:

Novel targets can be identified as they cluster with known biology

Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS

Oncology



Knockout of novel gene is inferred to be similar to PI3K gene family, presenting a potential novel target gene

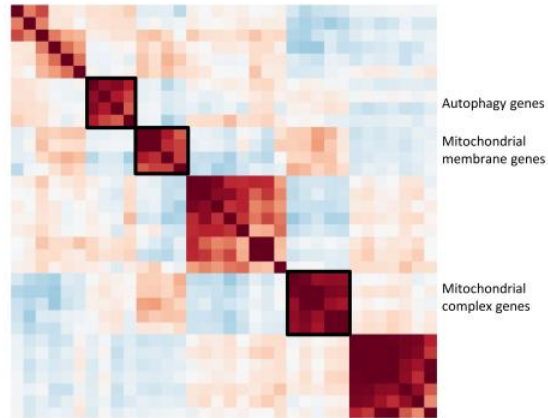


Neuroscience:

Neuro-relevant pathways cluster together as expected

Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS

Neuroscience



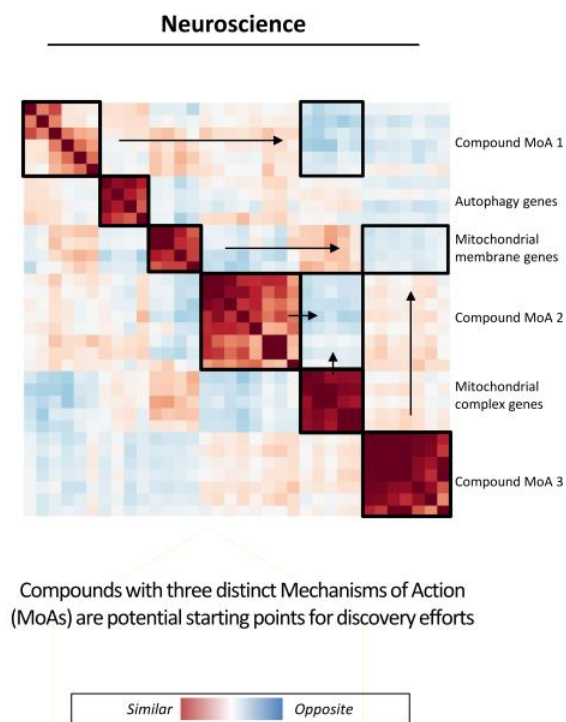
Gene knockout of mitochondrial and autophagy genes, highly relevant in neurological disorders, cluster as expected



Neuroscience:

Novel chemical insight provides fodder for discovery programs

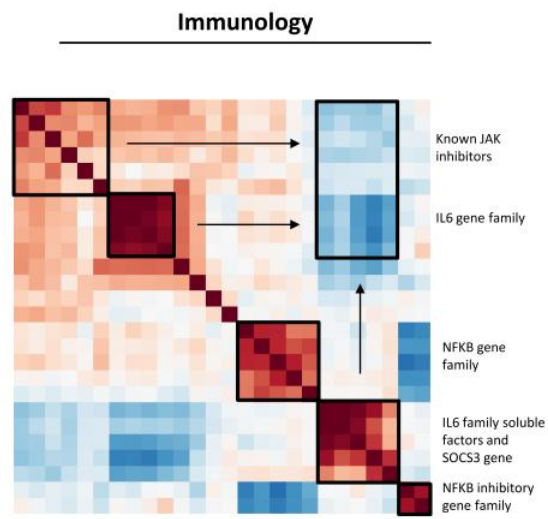
Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS



Immunology:

IL6/JAK biology recapitulates across gene knockouts and chemical su

Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS



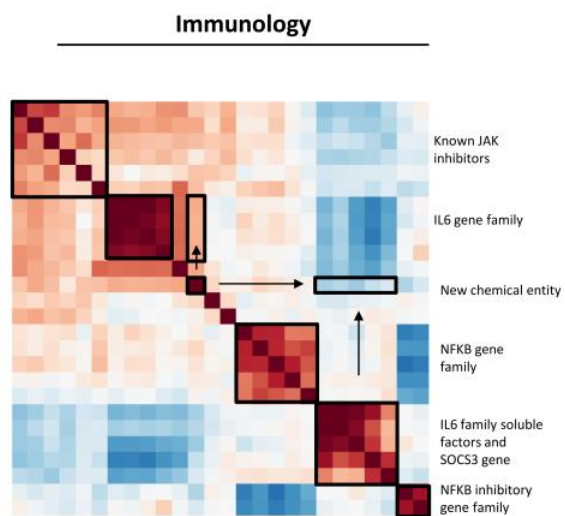
Knockout of IL6 gene family and dosing of cells with IL6 show expected opposite relationship



Immunology:

Novel chemical insight provides fodder for discovery programs

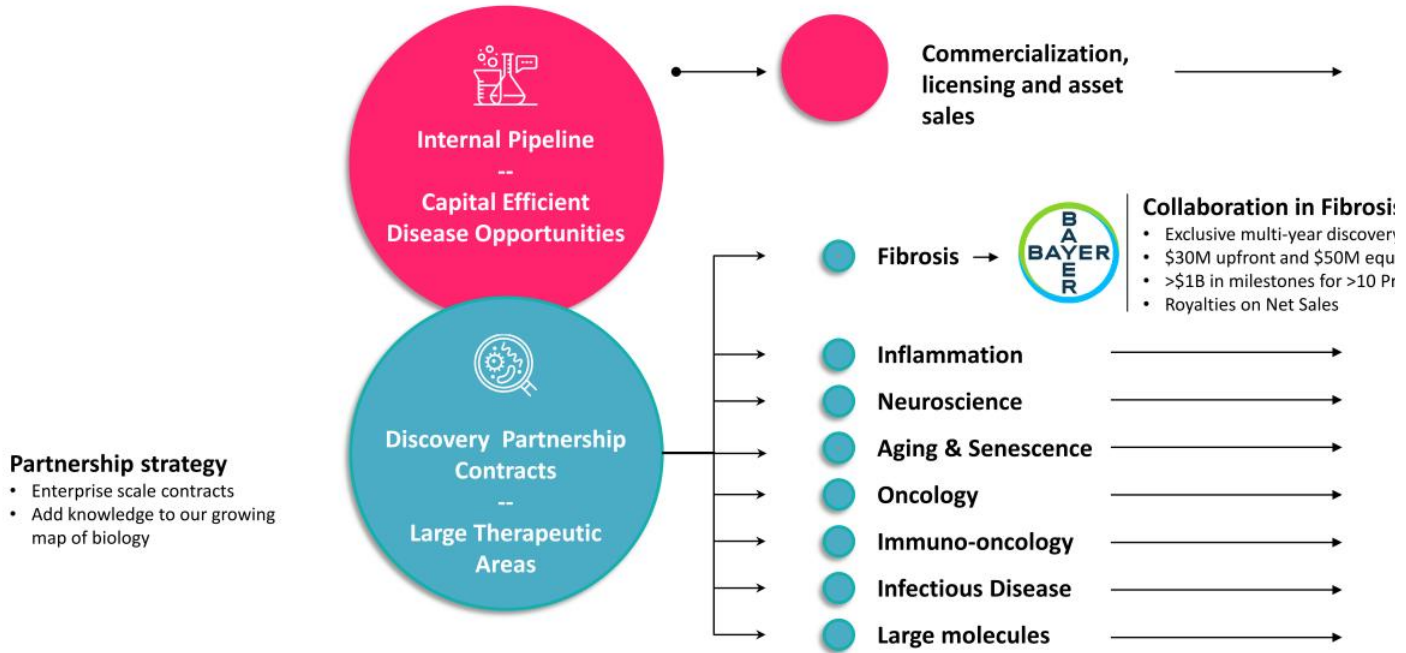
Shown below are therapeutic area specific subsets of the thousands of genetic knockouts, compounds, and soluble factors profiled by the Recursion OS



A novel chemical series similar to IL6 gene knockout and opposite to IL6 soluble factor dosing present a starting point for a discovery effort



We leverage a capital efficient business strategy with broad ambition for the future



A biotechnology company scaling more like a technology company



Forward program growth










Significant program growth

- Growing economic opportunity
- Reduction of binary risks

Year	2017	2018	2019	2020
Total Phenomic Experiments (Millions)	2.2	7.6	23.9	55
Data (PB)	0.5	1.8	4.3	6.8
Cell Types	7	12	25	36
Unique Perturbations ¹ (Millions)	0.02	0.1	0.5	1.3
Total Chemical Library ² (Thousands)	3	24	106	70
<i>In Silico</i> Chemistry Library (Billions)	0	0	0.015	3
Inferential Relationships ³ (Billions)	NA	NA	NA	13
Clinical Assets	0	1	2	4
Cost Per Experiment ⁴ (\$)	0.63	0.45	0.36	0.3

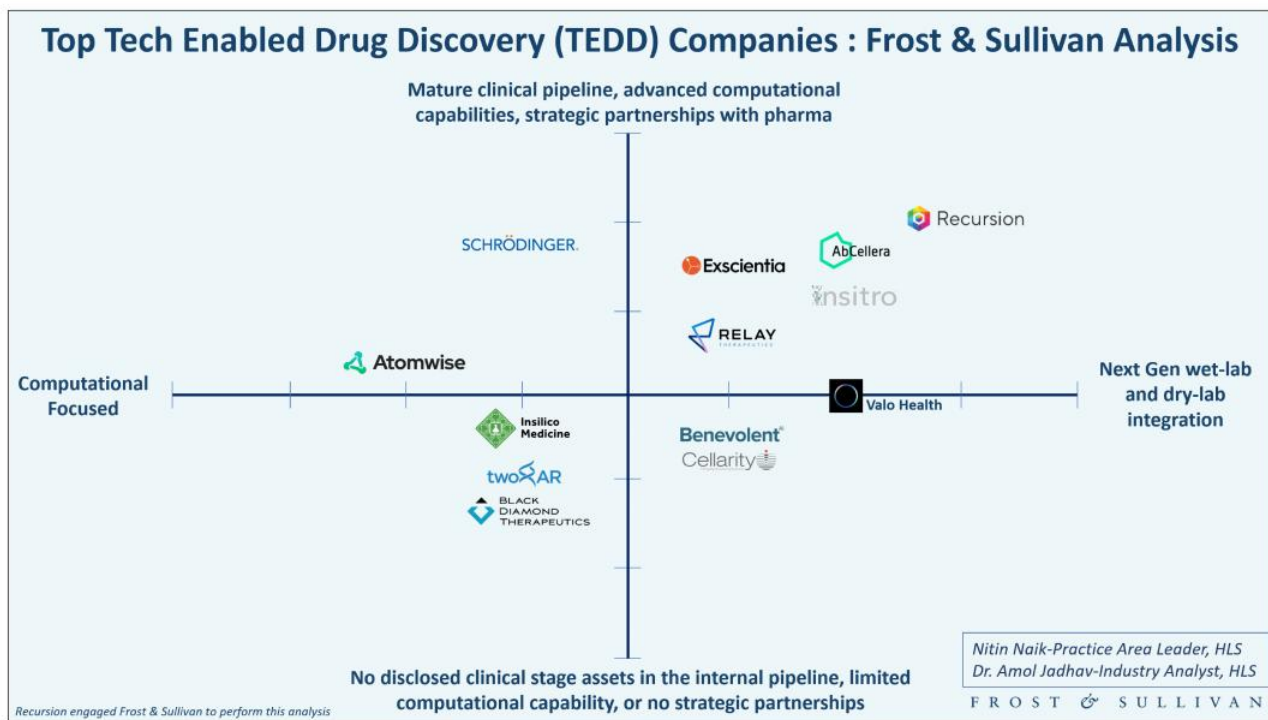
(1) 'Unique Perturbations' refers to the number of gene, soluble factor, cell and/or compound combinations physically explored. (2) Includes approximately 500,000 compounds from Bayer's proprietary library. (3) 'Inferential Relationships' refers to the number of Unique Perturbations predicted using our Recursion Map. (4) 'Cost Per Experiment' refers to the average adjusted direct cost to perform one phenomic experiment (defined as one well per perturbation) and is inclusive of consumable, compound and labor costs.

Comparison to relevant platform companies

Company	Early Discovery – Preclinical	Clinical / Commercial Assets
 moderna	13	18
 BIONTECH	10	18
 CUREVAC <small>the RNA people®</small>	11	3
 bridgebio	7	12
 SCHRODINGER	7	(multiple through collaboration)
 RELAY <small>THERAPEUTICS</small>	1	2
 Recursion	52	4

Pipeline data from company websites as of 11/08/2021. Trademarks are the property of their respective owners and used for informational and educational purposes only.

Recursion is leading technology-enabled drug discovery



Trademarks are the property of their respective owners and used for informational purposes only. Analysis as of April 2021.

Our diverse interdisciplinary team is one of our greatest strengths

Team Credentials

330+ Employees today

~25% Advanced degrees
(Ph.D. or M.D.)

Gender: % Women

~45% Below VP

~45% VP and above

Full-time Employee Split

~40% Biology, Chemistry
& Development

~35% Data Science,
Software
Engineering &
Automation

~25% BD, Product,
Administration,
Legal, IP, etc.

Team Experience























Our leadership team brings together experience & innovation to build the operating system for scaling biopharma discovery

Board of Directors

 <p>CHRIS GIBSON, PHD Co-founder & CEO</p> 	 <p>DEAN LI, MD/PHD Recursion Co-founder, President of Merck Research Labs</p> 	 <p>BLAKE BORGESON, PHD Recursion Co-founder, Board member Machine Intelligence Research Institute</p> 	 <p>ZAVAIN D. Partner, Lux</p> 
 <p>ZACHARY BOGUE, JD Partner, Data Collective</p> 	 <p>ROBERT HERSHBERG, MD/PHD Former EVP CSO & BD, Celgene</p> 	 <p>TERRY-ANN BURRELL, MBA CFO & Treasurer Beam Therapeutics</p> <p>J.P.Morgan </p>	 <p>R. MARTI Vice-Chair Financial. F at GS</p> 

Executive Team

 <p>CHRIS GIBSON, PHD Co-Founder & CEO</p> 	 <p>TINA LARSON President & COO</p> 	 <p>SHAFIQUE VIRANI, MD FRCS Chief Corp Dev Officer</p> 	 <p>MASON VICTORS Chief Product Officer</p> 	 <p>RAMONA DOYLE Chief Medical Officer</p> 
 <p>HEATHER KIRKBY Chief People Officer</p> 	 <p>BEN MABEY Chief Technology Officer</p> 	 <p>RON ALFA, MD/PHD SVP of Research</p> 	 <p>MICHAEL SECORA, PHD Chief Financial Officer</p> 	 <p>LOUISA DANIELS Chief Legal Officer & Counsel</p> 

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Impact

 RECURSION



Business Updates for Q3 2021

Programs

- **Fast Track Designation** from FDA for a potential treatment of NF2 meningiomas
- **Orphan Drug Designation** from FDA for a potential treatment of FAP
- **CMC and trial-site onboarding** for CCM ph2 (SYCAMORE) trial
- Advancing **4 clinical-stage programs** to ph2 or ph2/3 studies in the first half of 2022
- Making progress in **IND-enabling studies** for C diff (first NCE program)
- Added **8 new R&D programs** to pipeline across multiple therapeutic areas

Partnerships

- Advancing **multiple simultaneous discovery programs** with Bayer in fibrosis
- Exploring **enterprise-scale partnerships**

Capabilities

- Breaking ground for advanced **CMC facility**
- Making progress on multiple maps in **iPSC-derive neural cell types**
- Improved computational methods to identify **mechanisms of action**
- Improvements to **transcriptomics** protocols for compound validation

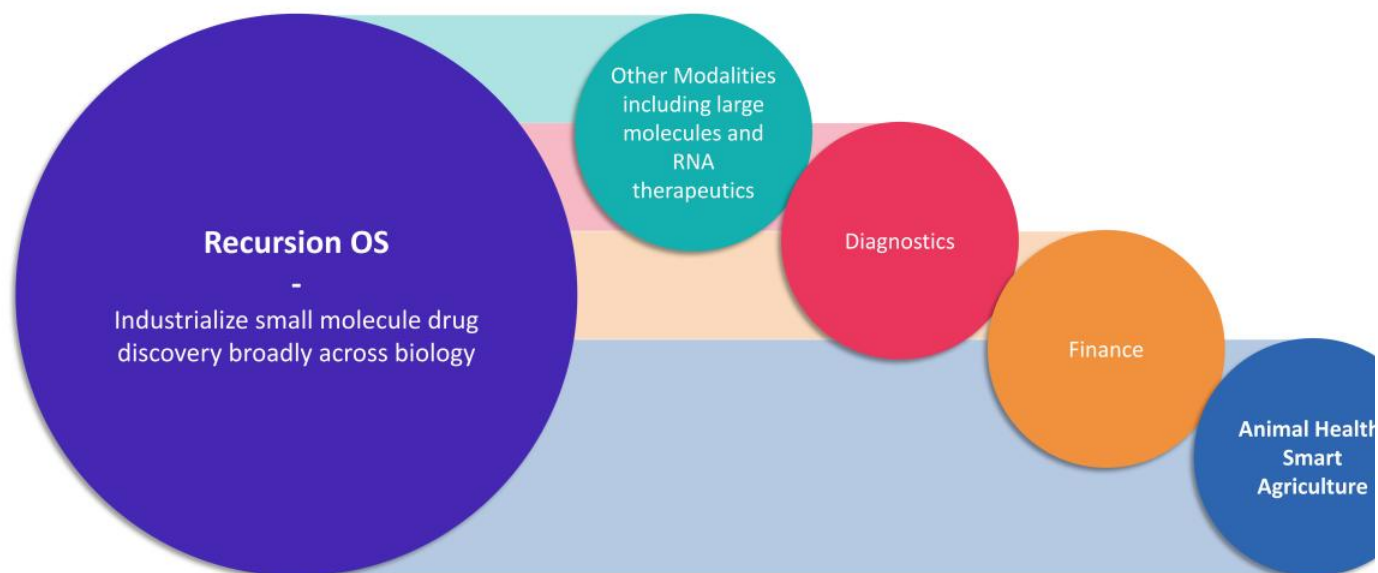
Data Universe

- **Proprietary biological data** increased by >2 PB, total biological data now >11 PB
- Increased **inferred biological relationships** to ~2

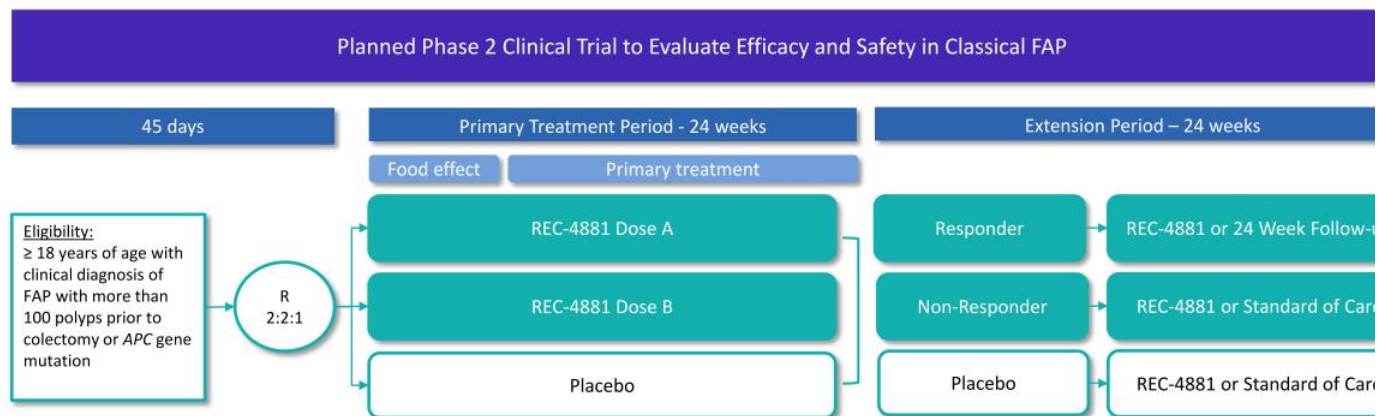
People

- Grew from 217 employees at IPO to **>330 today**
- Opened **Montreal Office** and hired multiple machine learning research scientists

Induction Labs is a growth engine for exploring additional market opportunities



REC-4881: Planned Phase 2 clinical trial design to evaluate efficacy and safety in classical Familial Adenomatous Polyposis



REC-994: First-in-disease, orally bioavailable potential treatment for Cerebral Cavernous Malformation (CCM)

Disease Overview:

- Autosomal dominantly inherited neurovascular disease caused by mutations in CCM1, CCM2, or CCM3 genes affecting approximately 360,000 patients in US and EU5

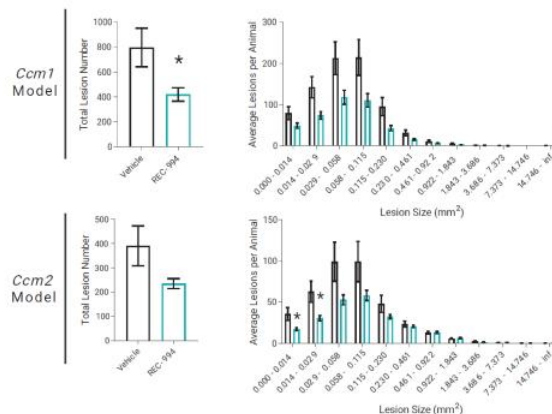
Expected Milestone:

- First patient enrolled in a Phase 2 double-blind, placebo-controlled trial in early 2022

Summary and differentiation:

- First-in-disease industry-sponsored oral small molecule therapeutic for treatment of Symptomatic CCM
- Well tolerated in healthy human volunteers with safety profile supporting proposed phase 2 doses
- To our knowledge, REC-994 is the only industry-sponsored therapeutic program in clinical trials for CCM targeting one of the largest unmet needs in the rare disease space

REC-994 reduces lesion number in chronic mouse model



REC-994: Planned Phase 2 trial to evaluate efficacy and safety in Symptomatic Cerebral Cavernous Malformation patients



REC-2282: First-in-class CNS-penetrant, orally bioavailable HDAC inhibitor for the potential treatment of Neurofibromatosis Type 2 (NF2)

Disease Overview:

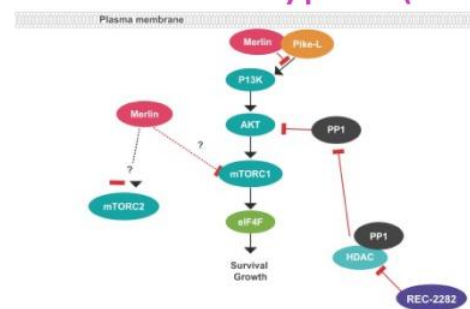
- Autosomal dominantly inherited rare tumor syndrome caused by mutations in *NF2* gene
- 33,000 patients per year in US and EU5 affected by both inherited and sporadic meningiomas with *NF2* mutations

Expected Milestone:

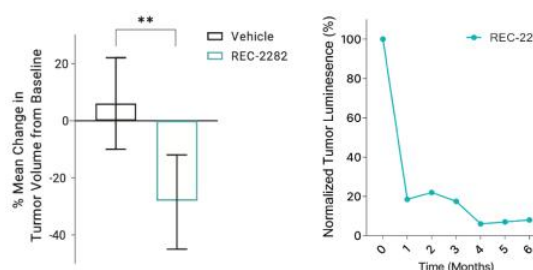
- Adaptive, parallel group, Phase 2/3 randomized, multicenter study with first patient enrolled in early 2022

Summary and differentiation:

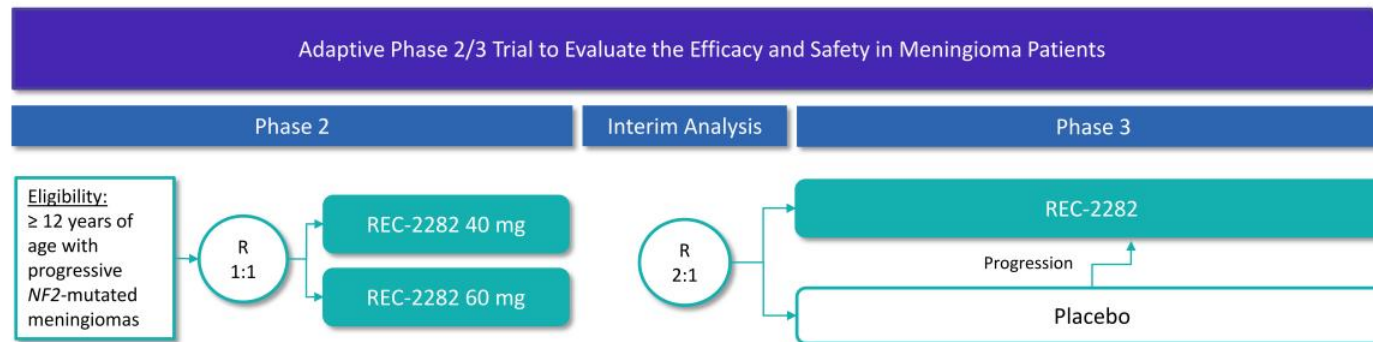
- First-in-class, oral small molecule therapeutic for treatment of NF2-mutant meningiomas
- Oral bioavailability and CNS exposure together are unique among clinical-stage HDAC inhibitors
- Early Phase 1 data demonstrates intratumoral PK/PD in CNS tumors from NF2 patients
- Clinical precedent for long-term chronic dosing in a subset of patients from Phase 1 studies



REC-2282 prevents growth of human vestibular schwannoma and meningioma tumor grafts in mouse s



REC-2282: Planned adaptive Phase 2/3 trial to evaluate efficacy and safety in Meningioma patients



REC-3599: First-in-class orally bioavailable, selective inhibitor of PKC and GSK3 β for the potential treatment of GM2 gangliosidosis (GM2)

Disease Overview:

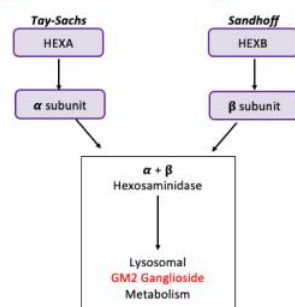
- Pediatric lysosomal storage disease caused by mutations in HEXA or HEXB genes affecting more than 400 patients worldwide resulting in neurological decline and death in the first few years of life

Expected Milestone:

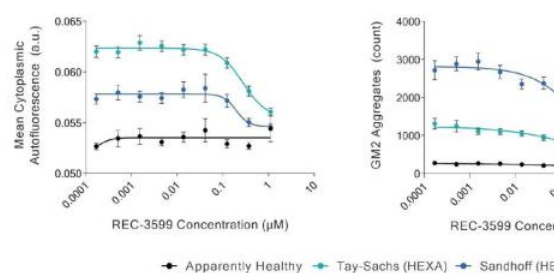
- First patient enrolled in open-label phase 2 study in patients with GM2 gangliosidosis in the first half of 2022

Summary and differentiation:

- First-in-class orally bioavailable small molecule therapeutic for treatment of infantile GM2-gangliosidosis
- Human safety database with established chronic dosing
- Oral small molecule therapeutic with complementary MOA for potential combination with genetic therapies



REC-3599 reduces autofluorescence substrate accumulation and GM2 aggregates in GM2 patient-derived fibroblasts



REC-3599: Planned Phase 2 clinical trial to evaluate efficacy and safety in infantile GM2 Gangliosidosis



Additional notable programs moving through our pipeline

C. difficile Colitis (REC-3964)

Current status: preclinical

- New chemical entity with potential to be orally active, gut-biased, *C. difficile* toxin inhibitors via glycosyl transferase inhibition.
- *C. difficile* affects up to 730k patients annually in the US and EU5
- IND-enabling studies underway

INFERENCE: Treatment of Immune Checkpoint Resistance in STK11-mutant NSCLC

Current status: preclinical

- Orally bioavailable small molecule to restore and improve sensitivity to immune checkpoint inhibitors in tumors harboring mutations in *STK11*
- Inference to Animal Model validation in ~6 months

Lead Molecules for the Treatment of Neuroinflammation

Current status: late discovery

- Multiple new chemical entities with potential to be first-in-disease, orally bioavailable, safe, CNS-penetrant small molecule inhibitors of microglial activation
- Neuroinflammation is a hallmark of many major neurodegenerative diseases
- Data suggests the target of these molecules may be novel and NF- κ B independent

INFERENCE: Cancer Immunotherapy Target Alpha

Current status: late discovery

- Selected based on an inferential assessment of the strength of its relationship to known genes impacting immunotherapy response
- A small molecule inhibitor of target alpha demonstrated a 40% complete response in a CT26 model of immune checkpoint resistance

INFERENCE: MYC Inhibitors for Solid/Hematological Malignancies

Current status: late discovery

- Multiple scaffolds with confirmed MYC inhibitory effects in human cells
- Inference to in vitro validation in ~3 months

Lead Molecules for the Treatment of Charcot-Marie-Tooth 2A

Current status: late discovery

- Four new chemical entities (multiple scaffolds) with potential to be orally bioavailable, disease-modifying therapeutics to slow or reverse the progression of the mitochondrial disease CMT2A
- CMT2A is a rare, autosomal dominant peripheral nerve disease with no disease modifying therapies

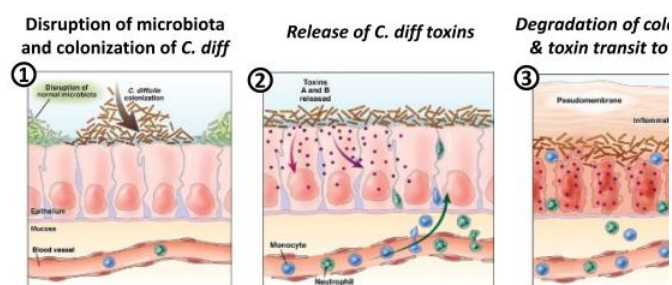
REC-3964: Orally active small molecule toxin inhibitor for prophylaxis and recurrent *C. difficile* infection

Disease Overview:

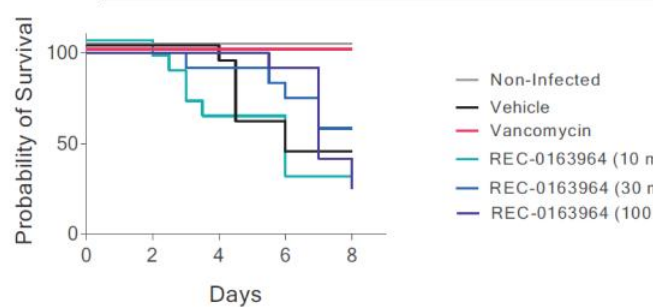
- Infectious disease caused by *Clostridium difficile* affecting more than 730,000 patients per year in the US and EU5 with hallmarks including severe diarrhea, colitis, and risk of toxic megacolon, sepsis, and death

Summary and differentiation:

- Orally active small molecule toxin inhibitor
- Glucosyl transferase inhibitor suppresses toxin-induced glycosylation of Rho-GTPases
- Gut-biased pharmacology to target infection at diseased locus after oral dosing
- Non-antibiotic approach with potential for combination with SOC and other therapies
- Lead candidates currently in IND-enabling studies



***C. difficile*-infected model hamsters treated with REC-163964 survive longer than vehicle-treated animals**



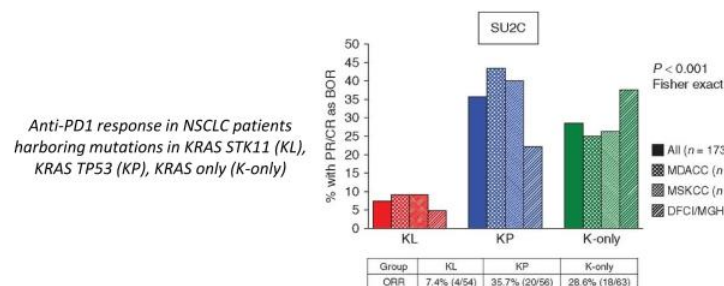
STK11: Orally bioavailable, small molecule to enhance anti-PD-(L)1 response of STK11 mutant cancers

Disease Overview:

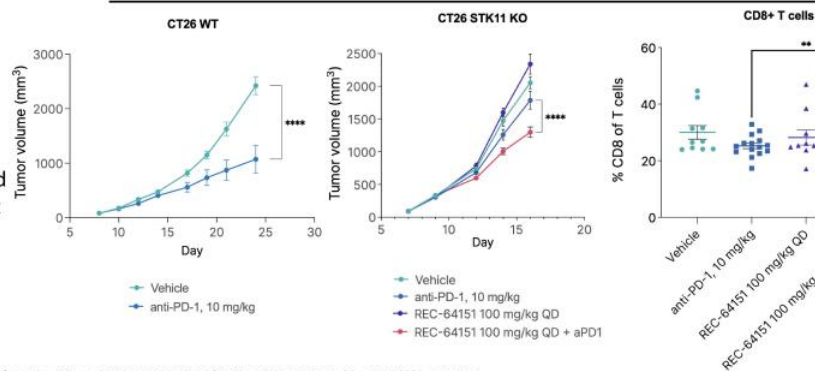
- *STK11* is a tumor suppressor mutated in a variety of cancers
- Mutations in *STK11* have been shown to underlie resistance of cancers to immune checkpoint inhibitors, especially in non-small cell lung cancer (NSCLC)
- *STK11* mutations characterize approximately 30,000 cases of metastatic NSCLC in the US and EU5
- There are currently no approved therapies to improve checkpoint sensitivity of tumors harboring mutations in *STK11*

Summary and differentiation:

- Orally bioavailable, small molecule therapeutic to enhance immune responses of *STK11* mutant tumors
- For combination therapy with anti-PD(L)1 and targeted therapies in both checkpoint refractory and treatment naïve metastatic cancers



Relative to wild type, *STK11* KO show a diminished anti-PD1 response
 REC-64151 restores anti-PD1 response of *STK11* mutant CT26 tumors
 REC-64151 in combination with anti-PD1 demonstrates enrichment in



EU5 is defined as France, Germany, Italy, Spain and the UK. Figure demonstrating anti-PD1 response in NSCLC patients adapted from Skoulidis et al. 2018, DOI: 10.1158/2159-8290.CD-18-0099, ** p<0.01 **** p<0.0001

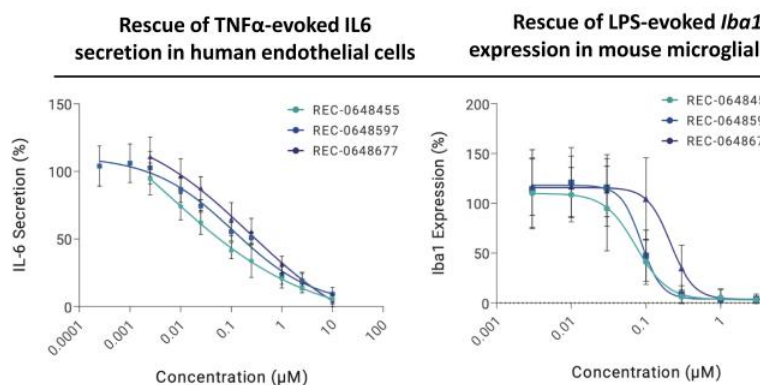
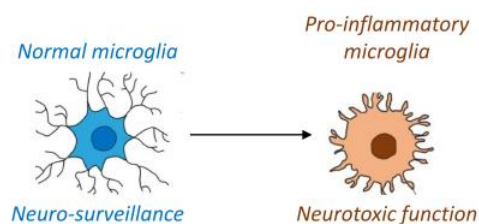
Neuroinflammation: Orally bioavailable, CNS-penetrant, small molecule modulators of microglial activation

Disease Overview:

- Neuroinflammation is a hallmark of diseases of the CNS, including neurodegenerative diseases with hallmark of microglial activation and secretion of proinflammatory cytokines such as TNF α , IL-6, IL-1 β , MCP-1

Summary and differentiation:

- Orally bioavailable, CNS-penetrant small molecule modulators of microglial activation
- Modulation of proinflammatory pathways through NF κ B- and JAK-independent mechanisms
- Additional potential therapeutic opportunities outside of CNS disease in systemic diseases of inflammation
- 3 NCE lead molecules (REC-648455, REC-648597, and REC-648677) in lead optimization phase



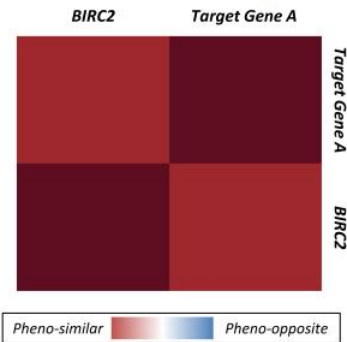
Cancer Immunotherapy Target Alpha: Inferential search identified targets and molecules active on checkpoint resistance pathways

Disease Overview:

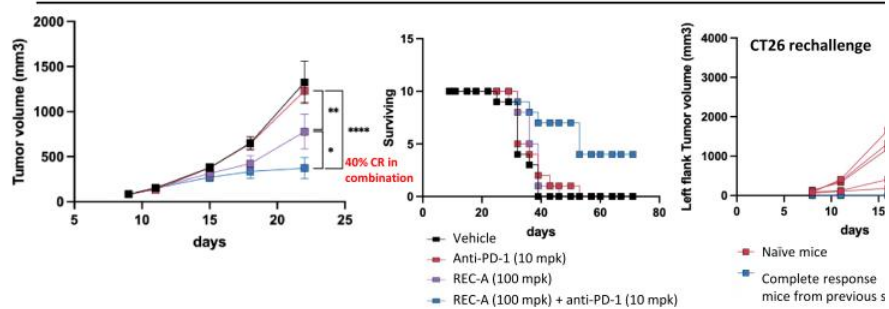
- Checkpoint therapy is rapidly becoming standard of care across a wide variety of oncology indications
- Resistance to checkpoint is a significant unmet need
- **Goal:** Identify novel targets and compounds capable of sensitizing tumors to checkpoint therapy

Summary and differentiation:

- PhenoMap clustering of known checkpoint sensitivity genes (e.g. *BIRC2*) reveals Target Gene A as a strong phenosimilar druggable target
- No known reported Target Gene A inhibitors in the clinic
- REC-A, a small molecule inhibitor of Target Gene A, alone or in combo with anti-PD-1, shows significant reduction in tumor growth vs. anti-PD-1 alone, including 40% complete response in combination with anti-PD-1
- Complete responders are robust to rechallenge



Efficacy demonstrated in CT26 mouse model of checkpoint resistance Rechallenge study shows minimal tumor regrowth in complete response (CR) mice from



CT26: mouse colon carcinoma. REC-A was dosed PO, QD for 5 weeks. Anti-PD-1 was dosed IP, BIW for 5 weeks. 10 mice per group, dosing initiated when tumors reached ~ 80 mm³; * p<0.05 ** p<0.01 **** p<0.0001

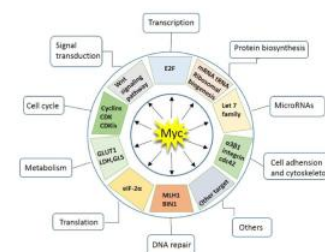
MYC: Small molecule inhibitors of MYC for the treatment of MYC-driven cancers

Disease Overview:

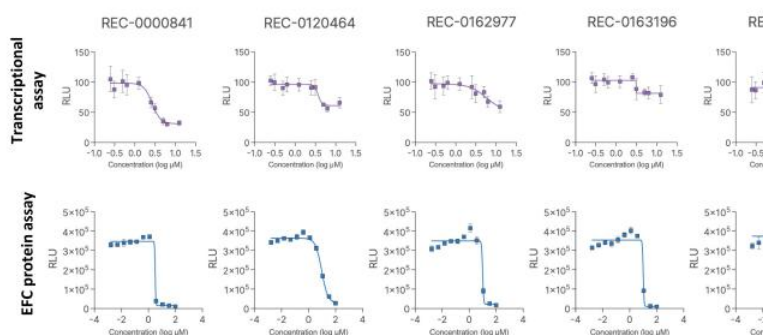
- *MYC* regulates diverse cellular processes involved in oncogenesis
- Gain-of-function alterations and amplifications in *MYC* have been identified in more than 50% of human cancers
- *MYC* pathway activation is observed in tumors harboring alterations in diverse oncogenic mutations, including WNT pathway activation
- *MYC* has remained an important undruggable target in oncology for decades

Summary and differentiation:

- Orally bioavailable, NCE small molecule inhibitors of *MYC* activation would be of broad utility in oncology
- Multiple structural and mechanistic classes have been identified and are being advanced through medicinal chemistry
- One mechanistic class represents a series of molecules that modulate *MYC* degradation (10 unique structural classes)



Subset of inference-based NCE hit molecules with verified activity in *M* transcriptional assay and c-MYC EFC¹ protein turnover assay



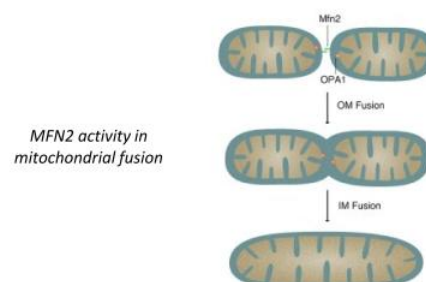
CMT2A: Potential first-in-disease, orally bioavailable disease modifying therapeutic for Charcot-Marie Tooth Disease, Type 2A

Disease Overview:

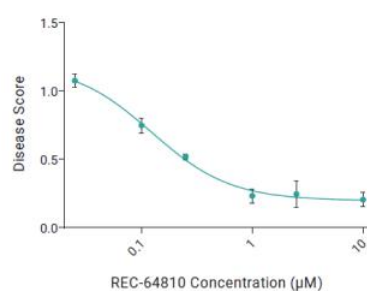
- Rare, autosomal dominant, peripheral nerve disease caused by mutations in *MFN2* estimated to affect approximately 15,000 patients in US & EU5 and leads to progressive muscle atrophy in the lower legs and hands

Summary and differentiation:

- Aim to discover and develop the first safe and efficacious, orally bioavailable small molecule disease-modifying therapy for CMT2A
- Multiple lead molecules identified and designed to be peripheral nervous system-penetrant to achieve activity on the affected tissues
- Target a mechanism novel to this disease but with established clinical precedent that supports the CMT2A target product profile



Rescue of *MFN2* cellular phenotype in human cells



Rescue of mitochondrial length in *MFN2*-deficient human cell:

