

Jefferies London Healthcare Conference 2022

15-17 November 2022

Benevolent^{AI}

A woman with long dark hair, wearing a light-colored jacket and a beige knit hat, is seen from behind, carrying a young child on her shoulders. The child is wearing a pink jacket and a white knit hat. They are standing in a field of tall green grass or corn. The sun is low on the horizon, creating a bright, golden glow and long, thin light trails in the sky. The overall mood is peaceful and hopeful.

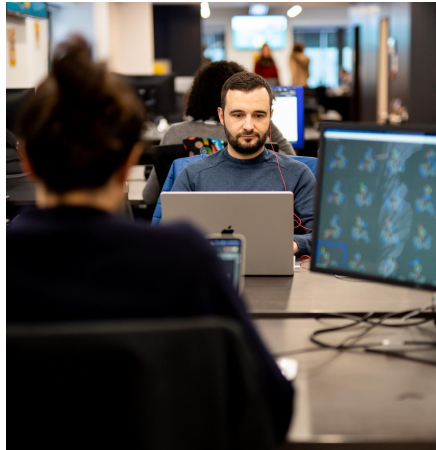
Disclaimer

Forward-Looking Statements

This document may contain forward-looking statements. Forward-looking statements are statements that are not historical facts and may be identified by words such as "plans", "targets", "aims", "believes", "expects", "anticipates", "intends", "estimates", "will", "may", "should" and similar expressions. Forward-looking statements include statements regarding objectives, goals, strategies, outlook and growth prospects; future plans, events or performance and potential for future growth; economic outlook and industry trends; developments in BenevolentAI's markets; the impact of regulatory initiatives; and/or the strength of BenevolentAI's competitors. These forward-looking statements reflect, at the time made, BenevolentAI's beliefs, intentions and current targets/aims. Forward-looking statements involve risks and uncertainties because they relate to events and depend on circumstances that may or may not occur in the future. The forward-looking statements in this release are based upon various assumptions based on, without limitation, management's examination of historical operating trends, data contained in BenevolentAI's records, and third-party data. Although BenevolentAI believes that these assumptions were reasonable when made, these assumptions are inherently subject to significant known and unknown risks, uncertainties, contingencies and other important factors which are difficult or impossible to predict and are beyond BenevolentAI's control.

Forward-looking statements are not guarantees of future performance and such risks, uncertainties, contingencies and other important factors could cause the actual outcomes and the results of operations, financial condition and liquidity of BenevolentAI or the industry to differ materially from those results expressed or implied by such forward-looking statements. The forward-looking statements speak only as of the date of this release. No representation or warranty is made that any of these forward-looking statements or forecasts will come to pass or that any forecast result will be achieved.

Benevolent^{AI} *Because it matters*



Clinical-stage AI-enabled drug discovery company

Uniting artificial intelligence with cutting-edge science to decipher complex disease biology and discover novel treatments

About us

\$300m in platform investment

Board with deep expertise

across AI, drug discovery & development,
pharmaceuticals

Listed on EuroNext Amsterdam

April 2022

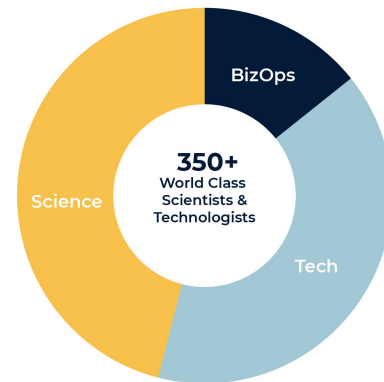
Cash runway to Q4 2024

providing sufficient capital for key value
inflection points

TEAM

as at June 2022

Full molecular biology, medicinal
chemistry and *in vivo*
pharmacology capabilities for
in-house experimentation



BOARD



Baroness Joanna Shields
CEO & Executive
Director



François Nader
Chairman



Susan Liautaud
Non-Executive
Director



Olivier Brandicourt
Non-Executive
Director



Jean Raby
Non-Executive
Director



Jackie Hunter
Non-Executive
Director



Nigel Shadbolt
Non-Executive
Director



John Orloff
Non-Executive
Director

The Benevolent Platform™ is scientifically and commercially validated and has already delivered:

13

Named Platform-generated drug programmes

1

asset in Phase II

3

assets in pre-IND

+10

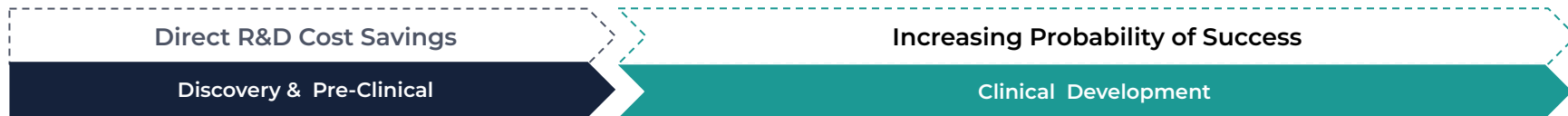
Exploratory stage programmes

Identified a leading **COVID-19 treatment** that is now **FDA approved**

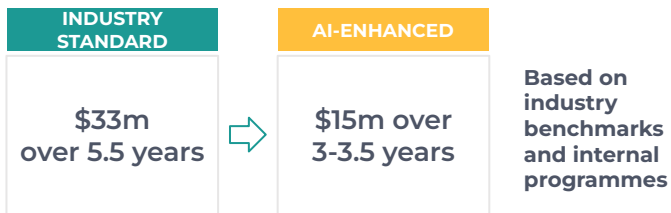
Successful multi-target collaboration with AstraZeneca further validates our approach with a total of **5 novel targets** selected for AstraZeneca's portfolio

Well funded with key **value inflection points** in the **near and medium term**

The AI value proposition for pharma R&D



“Faster and cost effective”



Reduce pre-clinical cost by >50% and time to market by 2-2.5 years

Note

Lab research and target identification costs and time not captured in industry data - likely to add significantly to the industry standard time and cost

“Get it right more often”

Highest attrition is at Phase II (current 34% success rate)⁽²⁾

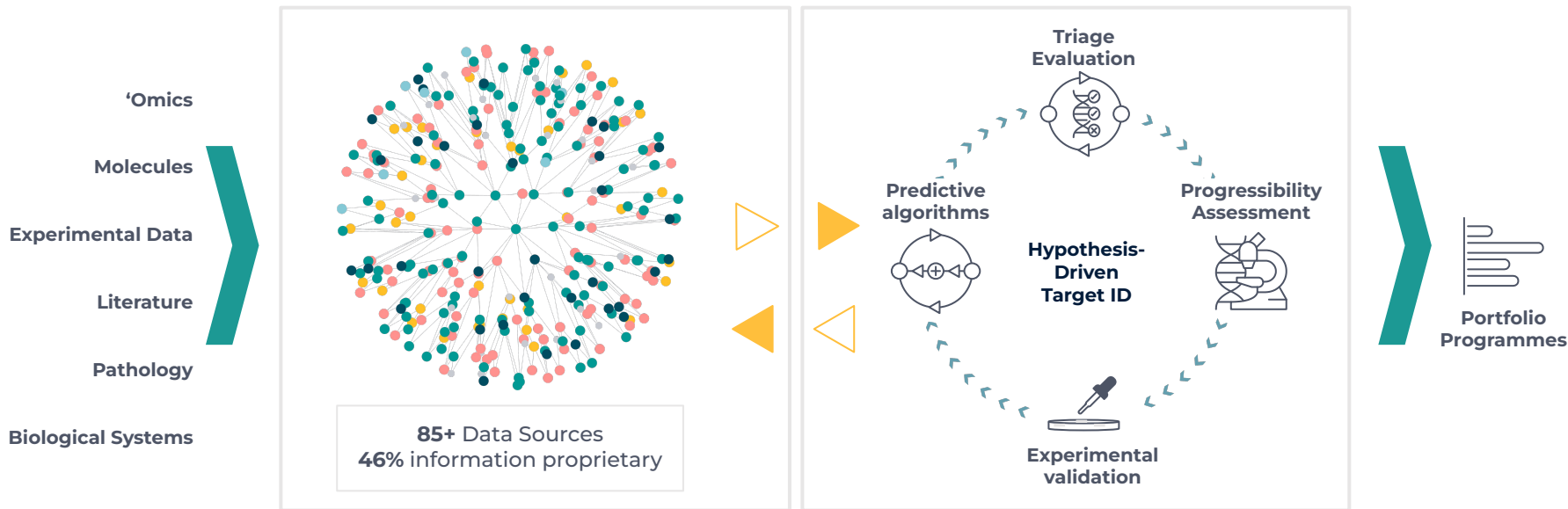
~50% Phase II/III trial failures due to lack of efficacy⁽³⁾

	INDUSTRY STANDARD	AI-ENHANCED (ILLUSTRATIVE)	Illustrative 25% PoS improvement at each clinical stage (Phase I-III)
PoS from Phase I to Market	12%	24%	Context <ul style="list-style-type: none"> Phase II trials with pre-selection biomarkers already >50% more likely to succeed⁽⁴⁾ Industry experts estimate that the use of AI can improve the PoS of each phase by up to 45%⁽⁵⁾
# Phase I Candidates Required for 1 Approved Drug	9	4	
Illustrative NPV ⁽¹⁾	c\$60m	c\$200m	

Notes and Sources: For illustrative purposes only; (i) Illustrative NPV for a theoretical \$750m peak sales drug during initial 10Y on the market (assumes (i) peak sales reached 5 years post-launch, (ii) 90% gross margin, (iii) 20% S&M expenses, (iv) 20% tax, (v) a 10% discount rate) and (vi) excludes any terminal value); (2) Based on Paul et al Nat Rev Drug Discov 2010. (3) Based on Harrison, Nat Rev Drug Discov 2016. (4) Based on Biomedtracker/Pharmaintelligence 2021. (5) Based on Odyssey Due Diligence report.

BenevolentAI technology approach

Our data foundations integrate the world's relevant and available biomedical data to surface insights through our tools, improving how scientists discover and develop new therapies



1. Creating Data Foundations

Integrated knowledge platform built to ingest, represent, and surface insights from **large volumes of diverse data types**

2. AI Tools for Scientists

Suite of AI-driven tools and workflows allow scientists to explore data and discover **novel, high-quality targets**

How BenevolentAI's approach compares to industry benchmarks



Typical proportion of targets identified validated by lab assay 23%	Potential increase in chance of a drug reaching the market vs industry benchmark >2x (based on 25% increase in PoS at each clinical stage)
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ACCURACY AND EFFICIENCY

Time from target to candidate 2 - 2.5 yrs	Potential time saved relative to industry benchmarks At least 2 yrs
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TIME



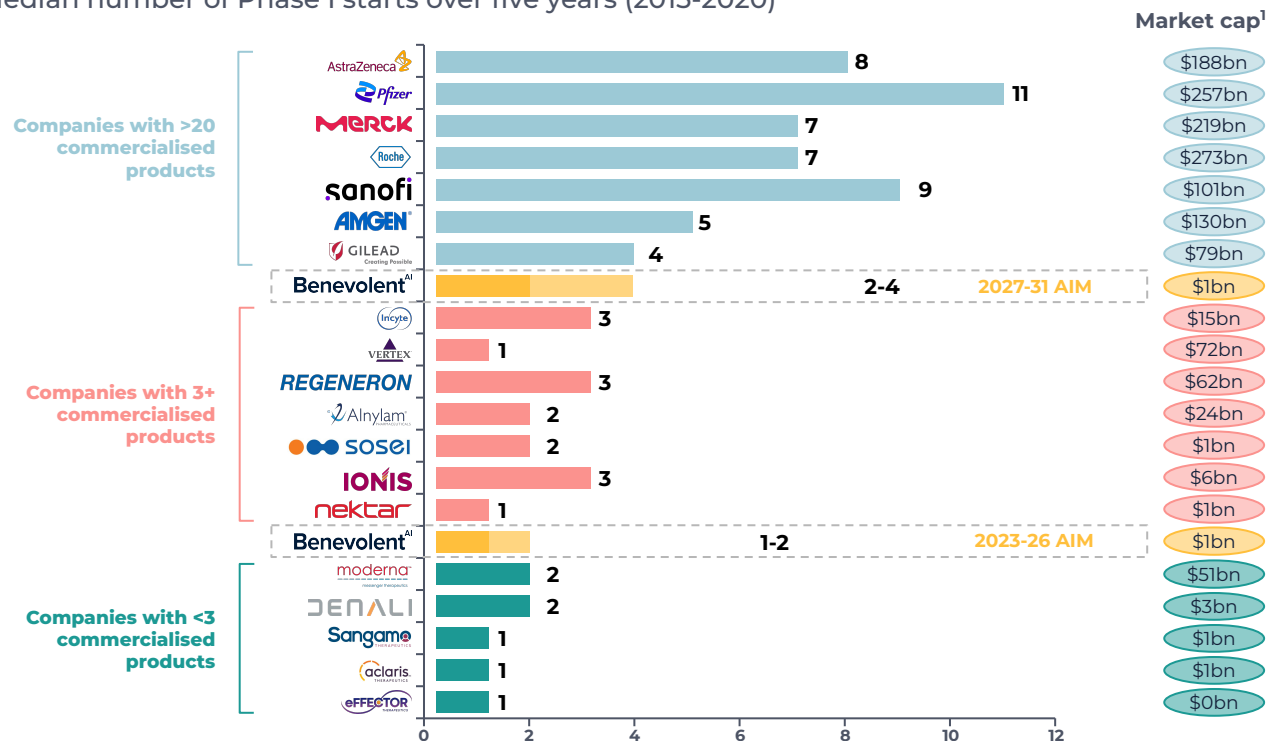
Cost from target to IND \$15m	Potential cost benefit per IND relative to industry benchmarks \$18m saving >50%
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COST

What that equates to: higher productivity

Number of new INDs filed by year by pharma and biotech companies

Median number of Phase I starts over five years (2015-2020)*

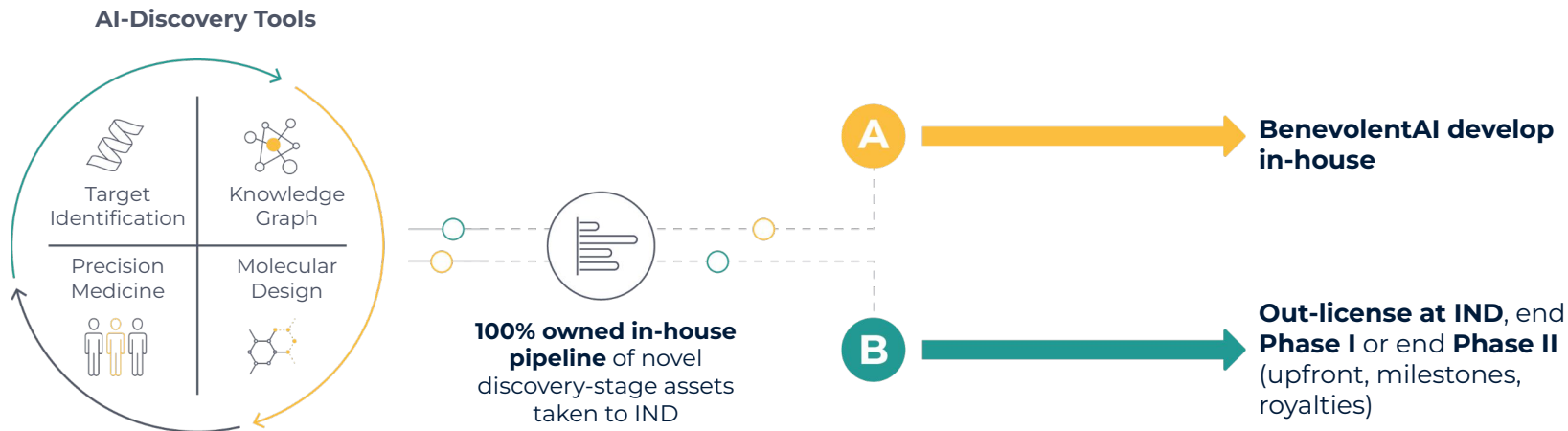


BenevolentAI potential productivity is in line with medium and large companies, but at a **fraction of the total cost.**

BenevolentAI will aim to increase the number of INDs from its Platform with incremental cost largely from development through to the clinic only

Note *IND filing rate is based on Phase I trial starts with the company as the lead sponsor. Average adjusted for companies which started clinical development during time period; ¹ Market cap as of 06 September 2022

The BenevolentAI business model — leveraging our technology platform to generate new drug IP at scale



C Pharma Collaborations:
Selective platform collaborations which can leverage the Platform in areas outside our core competencies

✓ Economic benefits

✓ Platform validation

✓ Data generated enriches the Benevolent Platform™

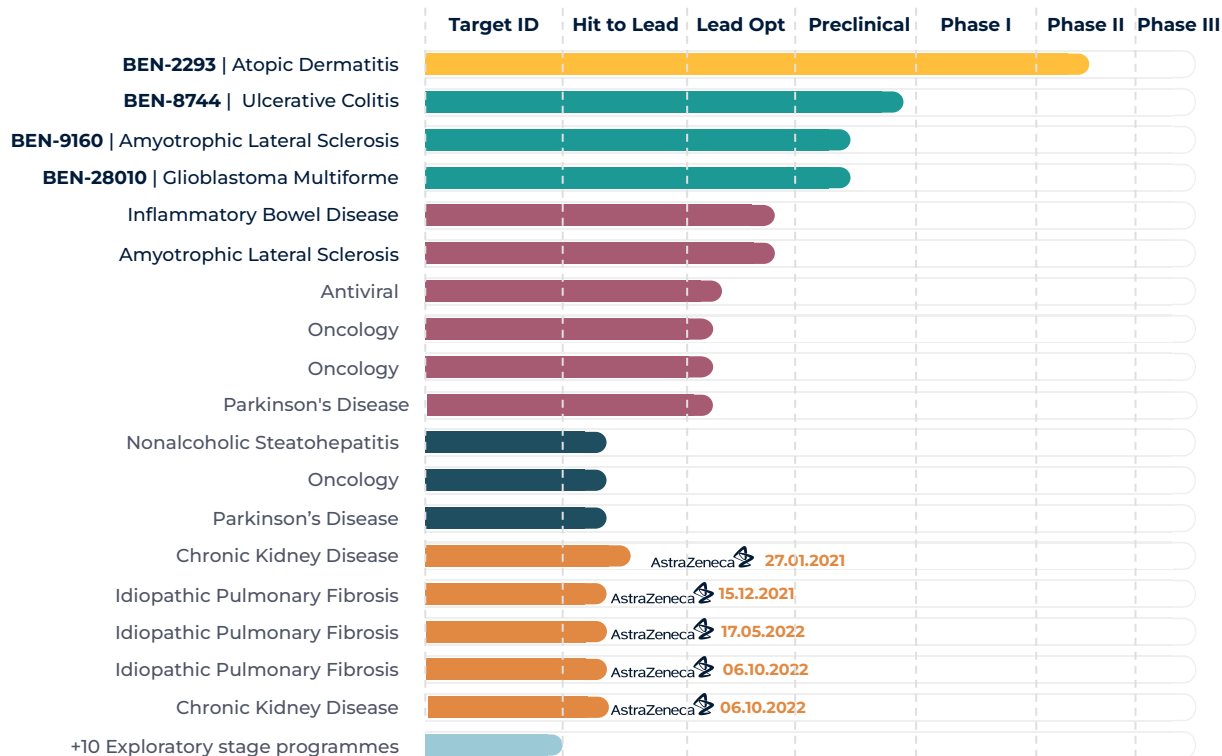
D Non-commercial collaborations (DNDi, COVID-19)

✓ ESG

✓ Platform validation

✓ Data generated enriches the Benevolent Platform™

Internal validation: pipeline generated from the Benevolent Platform™



BEN-2293 -
Phase Ib complete, **Phase IIa ongoing**

BEN-8744
Novel target - zero prior linkage to UC
2 years from target validation to candidate selection

Broad disease coverage given platform

Balance of risk between “best in class” and “first in class” drug candidates

BEN-2293 - Atopic Dermatitis (AD)

- Atopic dermatitis is the most common chronic inflammatory skin disease, characterized by intensely itchy, red, and swollen skin⁽¹⁾
 - Affects **10-20% of children** and up to **3% of adults**⁽²⁾
 - Approximately **60-70% of all cases** present with mild-moderate disease severity⁽³⁾
 - Prevalence is rising⁽³⁾, with market value in 7MM **forecast to exceed \$14 billion**^(2,4)
- Skin inflammation and chronic pruritus associated with atopic dermatitis negatively impact quality of life and psychosocial well-being⁽¹⁾
- Clear unmet need in **mild to moderate patient** segment for treatment addressing itch and inflammation, without side effects of steroids

BEN-2293: Topical best-in-class PanTrk inhibitor to relieve inflammation and rapidly resolve itch in patients with AD

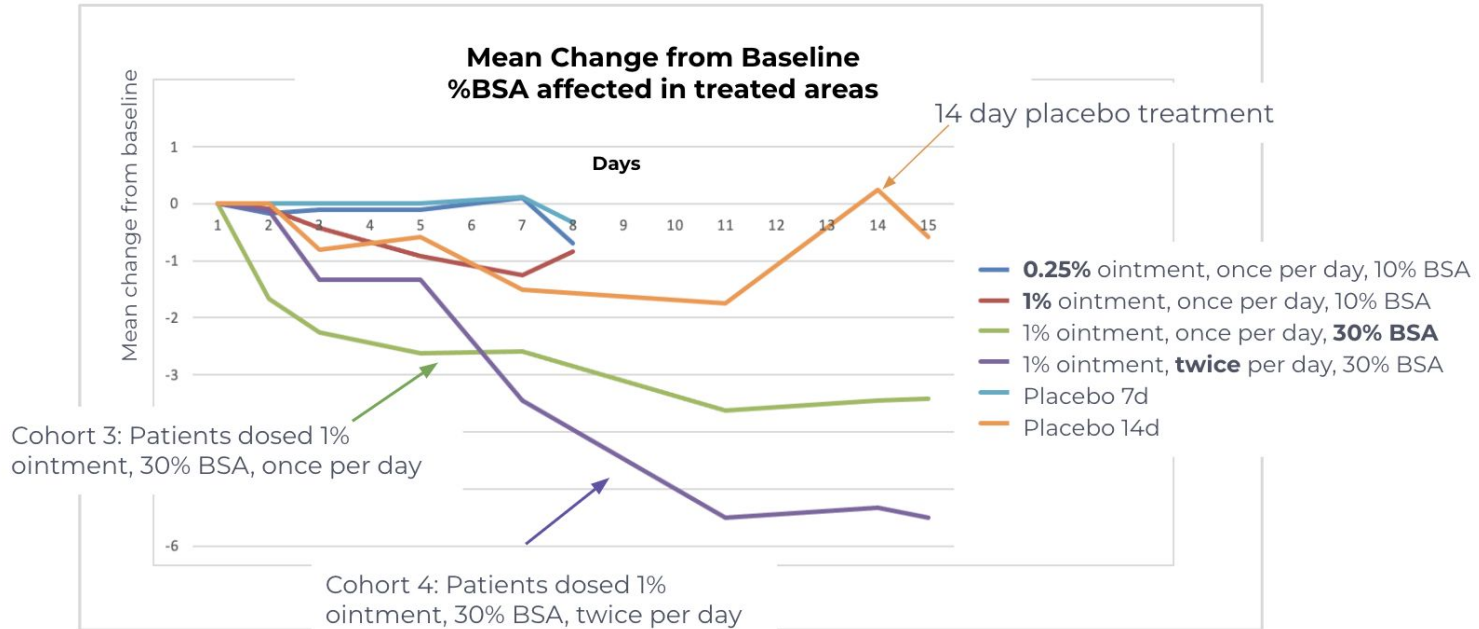
- **BEN-2293** is a **PanTrk inhibitor** targeting TrkA,B and C receptors. The Trk receptors were identified as part of an effort to find **mediators of both itch and inflammation in AD**. Using our Molecular Design expertise we were able to design a PanTrk inhibitor, equipotent against the 3 receptors
- BEN-2293 is expected to **treat atopic dermatitis** by: inhibiting **itch signaling** and blocking nerve sensitization (TrkA) in addition to inhibiting Th1 and Th2-mediated **dermal inflammation** (TrkB, TrkC)
- **BEN-2293** will target **Mild, Moderate and Severe Atopic Dermatitis patients**, addressing unmet need in the treatment of mild to moderate Atopic Dermatitis as a steroid sparing alternative and in more severe patients undergoing treatment with biologics (e.g. dupilumab) that require add-on treatment

BEN-2293 - indicative data from Phase Ib

Eczema Area and Severity Index (EASI)

Caveats:

- Phase Ib was **NOT** powered to meaningfully assess efficacy - only 6 patients dosed with active per group
- Maximum duration of dosing 14 days (EASI score changes typically measured at 28 days)



Strategic validation: successful collaboration with AstraZeneca

Multi-year Target-ID collaboration is delivering multiple, novel targets for complex diseases with high unmet need

- ✓ Separate data environment established to integrate AstraZeneca's data into a **bespoke Knowledge Graph**
- ✓ BenevolentAI and AstraZeneca teams working in **close collaboration** to explore, identify and validate targets
- ✓ Deal structure of **upfront license fee**, milestone payments and downstream royalties
- ✓ Collaboration enables BenevolentAI to enrich its platform via the data generated as part of the collaboration but also further validate the use of our AI platform



THERAPEUTIC AREAS

INITIAL DEAL (APRIL 2019)



Chronic kidney disease (CKD)



Idiopathic pulmonary fibrosis (IPF)

EXPANSION (DEC 2021)



Heart failure



Systemic lupus erythematosus

KEY MILESTONES

To date, **five novel targets** have been validated & selected for AstraZeneca's portfolio



Regulatory validation: identified a COVID-19 treatment now fully approved for use by the FDA

✓ NOVEL

Our technology and AI workflows identified a **previously unknown antiviral mechanism**⁽¹⁾

✓ RAPID

The Benevolent Platform™ empowered scientists to rapidly formulate a **hypothesis in just 48 hours**

✓ EFFECTIVE

Baricitinib shown to reduce mortality from COVID-19 in randomised controlled trials: **COV-BARRIER trial showed baricitinib reduces mortality by 38%** in hospitalised patients⁽²⁾, and by **46% in ventilated or ECMO patients**⁽³⁾



FDA approved the use of baricitinib to treat COVID-19 in **May 2022**⁽⁴⁾ after first granting emergency use authorisation for baricitinib in combination with remdesivir in **Nov 2020**⁽⁵⁾

BenevolentAI published research in Feb 2020⁽¹⁾

THE LANCET

Led to equity investment from Eli Lilly



Cash runway to Q4-2024 providing sufficient capital for key value inflection points

Cash Runway

Cash at 30th June 2022 £165m

H2 2022 cash spend £36m-£40m

BEN-2293 trial costs (c.£15m) fall away in 2023

Cash runway guidance assumes no future capital from licensing or collaboration agreements

Multiple assets at or close to key value inflection points and ready for out-licensing

Capital allocation

1 Fund Phase I/II trial for BEN-2293 in Atopic Dermatitis (before subsequent out-license)

2 Fund Phase I trial for BEN-8744 in Ulcerative Colitis and commencement of Phase II trial in 2024

3 Prioritisation of clinical spend on target Therapeutic Indications, with 2 Phase I trial starts by 2025

4 Continuous enhancement of the Benevolent Platform™

5 Investment to support listing status and further collaborations



Multiple value inflection points expected

