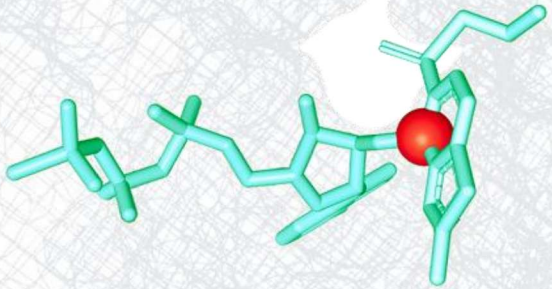
AN2Therapeutics

INVESTOR WEBCAST
EPETRABOROLE IN POLYCYTHEMIA VERA (PV)



MARCH 4, 2026

Forward-Looking Statements

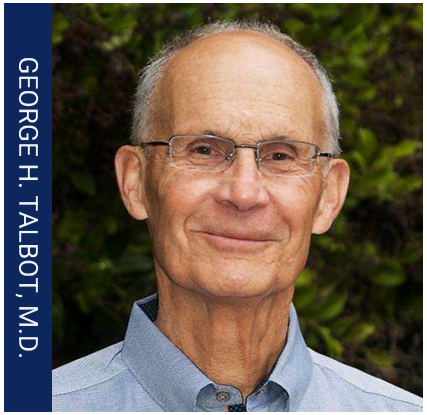
This presentation contains forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Forward-looking statements expressed or implied in this presentation include, but are not limited to, statements regarding: the potential and competitive advantage of the Company's boron chemistry platform; the addressable market for indications; the initiation of proof-of-concept clinical programs, which are subject to regulatory, scientific, and other operational risks; the potential efficacy and safety of epetraborole in PV; epetraborole's ability to selectively impact red cells in PV; epetraborole's prospective competitive positioning and comparative advantages versus other PV treatments, if approved; the attributed and limitations of current treatments; the Company's approach to capital allocation and the duration of its runway; expectations regarding the Company's clinical trials, including initiation, enrollment, conduct and the timing of data and related announcements; the ability of non-human models to de-risk translation to human efficacy; market and sales potential; the ability to identify patients within the estimated addressable patient population; potential for development molecules to be best-in-class within a therapeutic area; priority review voucher eligibility and registrational pathways; cash runway; continued global health programs; and other statements that are not historical fact. These statements are based on AN2's current estimates, expectations, plans, objectives and intentions, are not guarantees of future performance and inherently involve significant risks and uncertainties.

Actual results and the timing of events could differ materially from those anticipated in such forward-looking statements as a result of these risks and uncertainties, which include, but are not limited to, risks and uncertainties related to: epetraborole's ability to control hematocrit in PV in a manner similar to what was observed in non tuberculous mycobacteria patients, in healthy volunteers, and in preclinical testing; AN2's ability to implement its plans for a phase 2 trial in PV, including the ability to obtain the requisite regulatory clearance to conduct the trial, and to enroll and conduct the trial on the planned timeline, and the possibility that safety events will not interrupt or cause cessation of the trial; its internal boron chemistry platform and pipeline programs; timely enrollment of patients in AN2's clinical trials; disruptions at the FDA and other government agencies caused by funding shortages, staff reductions and statutory, regulatory and policy changes; AN2's ability to procure sufficient supply of its product candidates for its clinical trials; the potential for results from clinical trials to differ from preclinical, early clinical, preliminary or expected results, the ability of particular preclinical models in non-human primates to predict safety and efficacy in humans; significant adverse events, toxicities or other undesirable side effects associated with AN2's product candidates; the significant uncertainty associated with AN2's product candidates ever receiving any regulatory approvals; continued non-dilutive funding of AN2's global health development programs; AN2's ability to obtain, maintain or protect intellectual property rights related to its current and future product candidates; implementation of AN2's strategic plans for its business and product candidates; the sufficiency of AN2's capital resources and need for additional capital to achieve its goals; global macroeconomic conditions and global conflicts and other risks, including those described under the heading "Risk Factors" in AN2's Annual Reports on Form 10-K, Quarterly Reports on Form 10-Q and other reports filed with the U.S. Securities and Exchange Commission (SEC). These filings, when made, are available on the investor relations section of AN2's website at www.an2therapeutics.com and on the SEC's website at www.sec.gov.

This presentation also contains estimates relating to market size and potential and timelines for clinical trials. These estimates involve a number of assumptions and limitations, and are subject to risks and uncertainties.

Forward-looking statements contained in this presentation are made as of this date, and AN2 undertakes no duty to update such information except as required under applicable law.

Agenda



OVERVIEW	Eric Easom Co-Founder, President, Chief Executive Officer and Chairman; AN2
CLINICAL	George H. Talbot, M.D. Co-Founder, Senior Medical Advisor; AN2
PV TREATMENT PERSPECTIVES	Aaron T. Gerds, M.D. Associate Professor of Medicine at the Cleveland Clinic Lerner College of Medicine of Case Western Reserve University; Deputy Director for Clinical Research at the Cleveland Clinic Taussig Cancer Institute; Deputy Director for Clinical Research at the Case Comprehensive Cancer Center
NEXT STEPS & FUTURE MILESTONES	Eric Easom
Q&A	Eric Easom George H. Talbot, M.D. Aaron T. Gerds, M.D.

Strategic rationale for advancing epetraborole into PV

COMPELLING ENABLING DATA

- Epetraborole has demonstrated consistent, dose-dependent **hematocrit reductions** across studies in prior development programs
- Minimal impact on white blood cells and platelets

ORAL TARGET PROFILE WITH NOVEL MOA WOULD FILL GAP

- Durable hematocrit control is key but **remains difficult to maintain** with phlebotomy and current cytoreductive therapies
- No oral therapies approved or in clinical development specifically targeted at erythrocytosis

NEW, NEAR-TERM CATALYSTS

- Phase 2 initiation in Q3/26
- **Initial data anticipated Q4/26**; open-label design enables early data assessment, within current cash runway

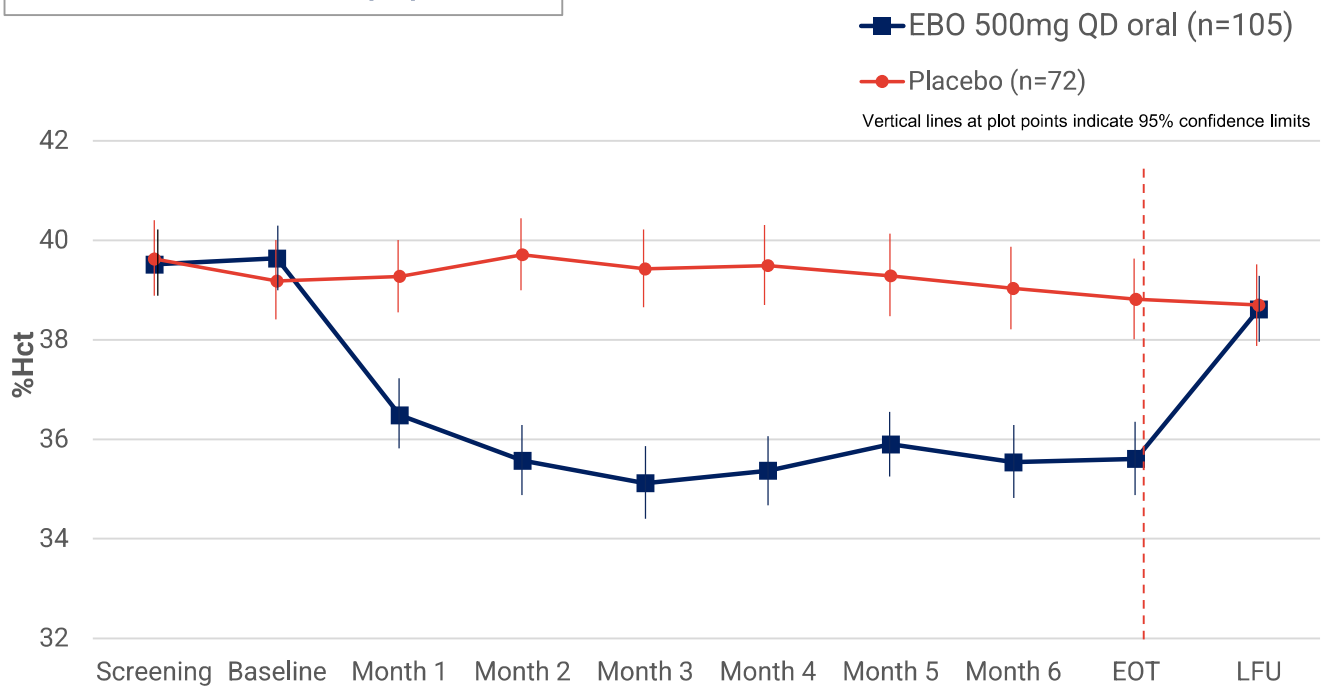
Large market opportunity with potential meaningful, near-term catalysts within runway

Early and sustained hematocrit reductions in Phase 2/3 NTM study (n=177)

Hematocrit reductions observed throughout epetraborole treatment

Phase 2/3 NTM trial

Hematocrit (%)



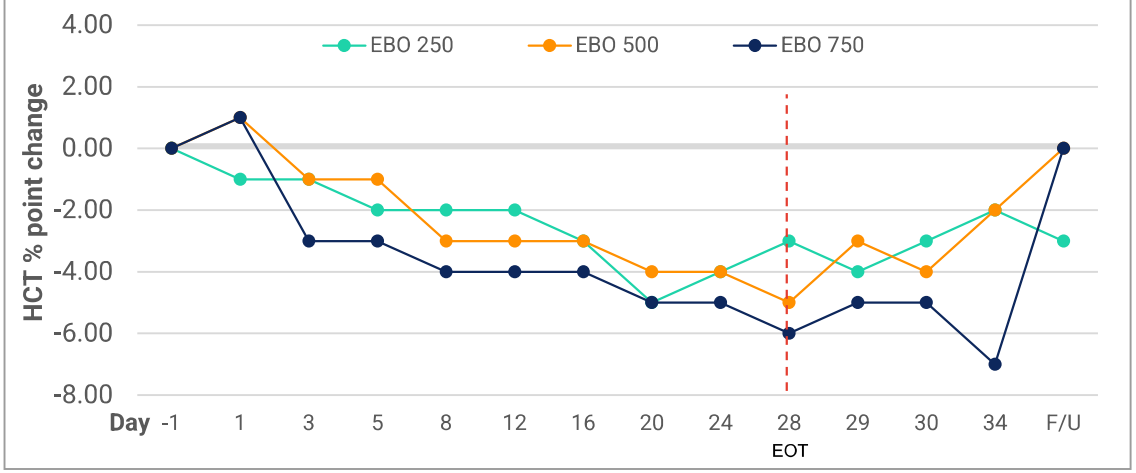
Sustained, stable HCT reduction

- HCT reductions were reversible upon treatment discontinuation, with no evidence of lasting marrow suppression
- Reductions in HCT occurred without broad myelosuppression or disruption of other hematologic lineages

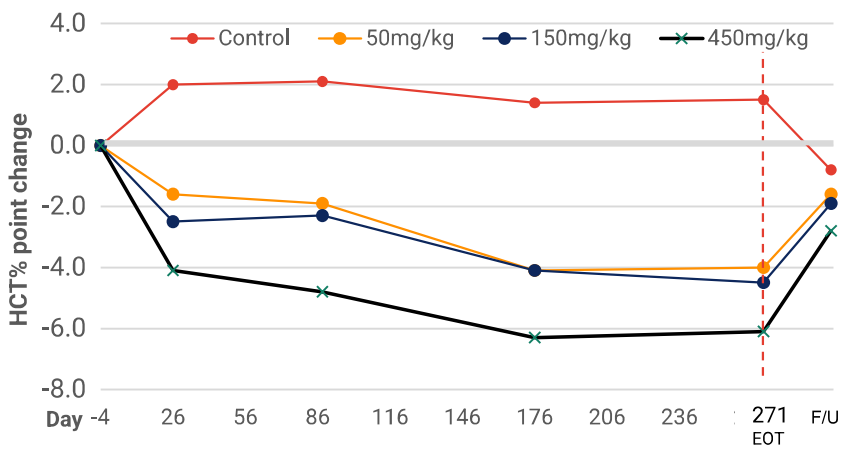
Trial replicated results in long-term NHP studies and healthy volunteers

Durable, reversible HCT reduction across epetraborole preclinical and clinical studies

Phase 1



Nonhuman primates



- Phase 1 data: absolute change from baseline
- Shows dose-related, stable, early HCT effect, with greater magnitude at higher dose level
- Stabilized during dosing and trended back toward baseline after discontinuation, consistent with a reversible pharmacologic effect

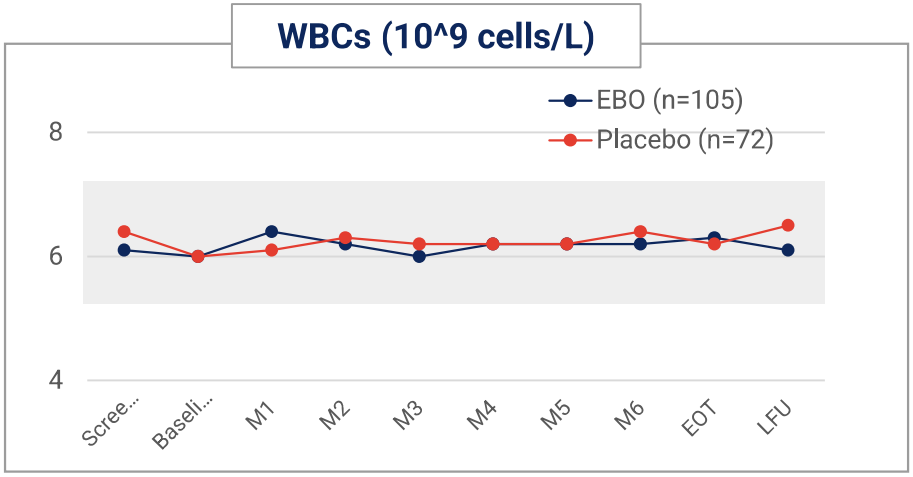
- Phase 1 followed NHP study, which showed similar trends in HCT reduction and reversibility, with stable effect observed over full 9 months of study

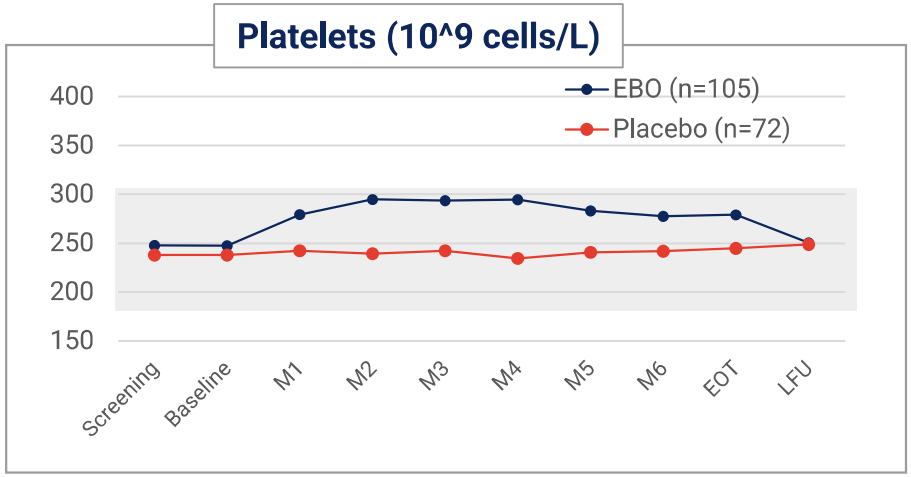
Company data on file

EBO demonstrated selective red-cell effect and preserved WBCs and platelets

Data consistent with erythroid-lineage selectivity rather than generalized cytoreduction

In prior trials, platelet and WBC counts remained stable and within normal ranges, with no evidence of broad myelosuppression



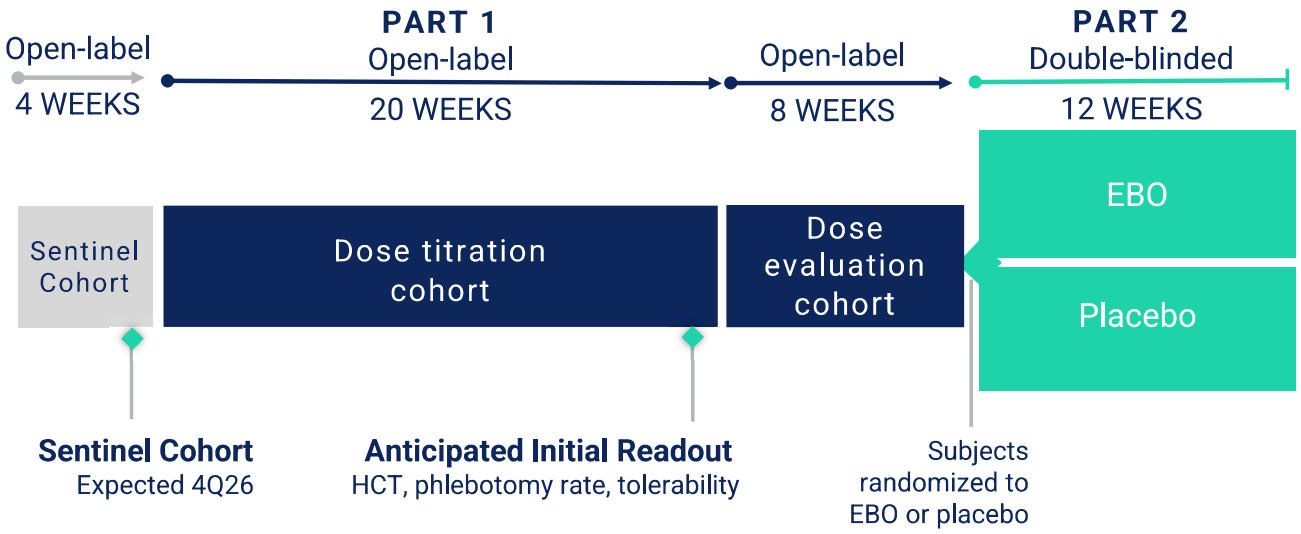


Normal range

Company data on file

Phase 2 design and anticipated early data readout

Study design consistent with prior PV programs, allows for early assessment of key efficacy measures



MAJOR OUTCOME MEASURES

1. Percent of patients maintaining "clinical success" in Part 2 defined as:
   - had HCT control
   - did not undergo phlebotomy after Week 4
   - completed the 12-week regimen
2. PBO-controlled changes in PROMIS, mMPN-SAF patient diary, and PGIC
3. Changes in standard hematological variables, plus erythropoietin, viscosity, serum hepcidin, serum iron, ferritin and transferrin saturation
4. JAK2V617F allele burden will be measured to evaluate whether selective modulation of erythropoiesis influences clonal dynamics

Please refer to forward looking statement regarding timeline uncertainties and regulatory and clinical risks

Anticipated PV timeline

Subject to regulatory review and enrollment rates

3Q26

Phase 2 FPI

4Q26

Initial sentinel group data

2027

Clinical data updates throughout 2027

FPI= First patient initiated

Oral epetraborole modulates red-cell production via a novel MOA

Program Summary

Candidate	Status	Form	Market	Differentiation	Enabling data
Epetraborole	Phase 2	Oral	150,000 (U.S.)	Oral, red-cell targeting	Clinical and preclinical data

Once-daily oral administration

Data from prior preclinical and clinical studies in non-PV patients demonstrated consistent, dose-dependent, and reversible hematocrit reductions

Potential for red-cell selectivity, novel MOA, without additional cytotoxicity, pan-myelosuppression, or drug-drug interactions, with flexible titration

Near-term data readouts

- Beginning late 2026
- Objective endpoints allow for Phase 2 data readouts during open-label phase (HCT, phlebotomy avoidance, tolerability)

AARON T. GERDS, M.D.

Q1 Therapeutic goals in treating PV?

Q2 What do REVEAL and other studies indicate about adequacy of hematocrit control?

Q3 What is the unmet need around current therapies?

Q4 Where would an oral drug like EBO fit into the treatment landscape?

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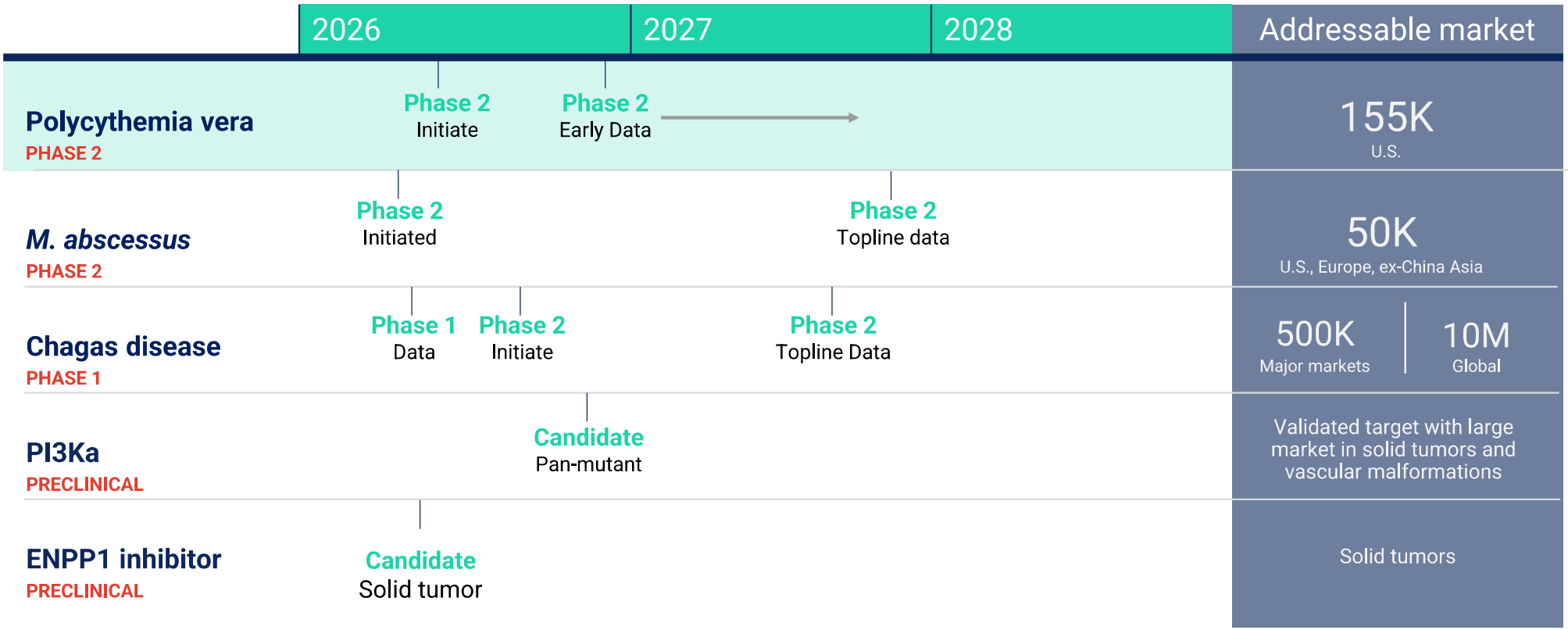
Advancing toward value-creating milestones over next two years

Leveraging proprietary boron chemistry platform to advance pipeline of potentially high-impact programs



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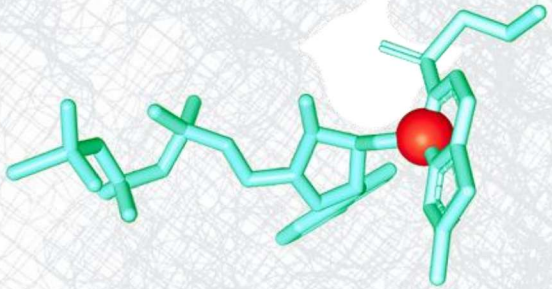
Q&A



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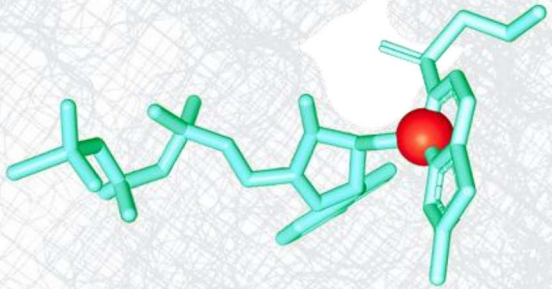
THANK YOU!



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